UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
Washington, D.C. 20549

FORM 20-F

(Mark One)

☐ **Registration statement pursuant to Section 12(b) or 12(g) of the Securities Exchange Act of 1934**

or

☒ **Annual report pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934**

For the fiscal year ended December 31, 2012

or

☐ **Transition report pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934**

For the transition period from __________to __________

or

☐ **Shell company report pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934**

Date of event requiring this shell company report __________

Commission file number 001-15128

United Microelectronics Corporation
(Exact Name of Registrant as Specified in its Charter)

Taiwan, Republic of China
(Jurisdiction of Incorporation or Organization)

No. 3 Li-Hsin Road II, Hsinchu Science Park,
Hsinchu City, Taiwan, Republic of China
(Address of Principal Executive Offices)

Peter Courture, +1 (650) 968-8855, peter@courture.com,
978 Highlands Circle, Los Altos, CA 94024, USA
(Name, Telephone, E-mail and/or Facsimile number and Address of Company Contact Person)

Securities registered or to be registered pursuant to Section 12(b) of the Act:

Title of Each Class	Name of Each Exchange on which Registered
American Depositary Shares, as evidenced by American Depositary Receipts, each representing 5 Common Shares	New York Stock Exchange

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Securities registered or to be registered pursuant to Section 12(g) of the Act:
None

Securities for which there is a reporting obligation pursuant to Section 15(d) of the Act:
None

Indicate the number of outstanding shares of each of the Issuer's classes of capital or common stock as of the close of the period covered by the annual report.

12,951,805,540 Common Shares of Registrant issued as of December 31, 2012 (including 300,000,000 treasury shares)

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes ☒ No ☐

If this report is an annual or transition report, indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934. Yes ☐ No ☒

Indicate by check mark whether the registrant: (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes ☒ No ☐

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T (§ 232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files). Yes ☐ No ☐

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, or a non-accelerated filer. See definition of "accelerated filer and large accelerated filer" in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer ☒ Accelerated filer ☐ Non-accelerated filer ☐

Indicate by check mark which basis of accounting the registrant has used to prepare the financial statements included in this filing: U.S. GAAP ☐

International Financial Reporting Standards as issued by the International Accounting Standards Board ☐ Other ☒

Indicate by check mark which financial statement item the registrant has elected to follow. Item 17 ☐ Item 18 ☒

If this is an annual report, indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Securities Exchange Act of 1934). Yes ☐ No ☒

UNITED MICROELECTRONICS CORPORATION
FORM 20-F ANNUAL REPORT
FISCAL YEAR ENDED DECEMBER 31, 2012

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SUPPLEMENTAL INFORMATION

The references to "United Microelectronics", "we", "us", "our", "our company" and "the Company" in this annual report refer to United Microelectronics Corporation and its consolidated subsidiaries, unless the context suggests otherwise. The references to "Taiwan" and "R.O.C." refer to Taiwan, Republic of China. The references to "shares" and "common shares" refer to our common shares, par value NT$10 per share, and "ADSs" refers to our American depositary shares, each representing five common shares. The ADSs are issued under the Deposit Agreement, dated as of October 21, 2009, as amended, supplemented or modified from time to time, among United Microelectronics, JPMorgan Chase Bank, N.A. and the holders and beneficial owners from time to time of American Depositary Receipts issued thereunder. "R.O.C. GAAP" means the generally accepted accounting principles in the Republic of China and "U.S. GAAP" means the generally accepted accounting principles in the United States. Any discrepancies in any table between totals and sums of the amounts listed are due to rounding.

We publish our financial statements in New Taiwan dollars, the lawful currency of the R.O.C. In this annual report, "NT$" and "NT dollars" mean New Taiwan dollars, "$", "US$" and "U.S. dollars" mean United States dollars, "¥" means Japanese Yen, and "€" means EURO.

FORWARD-LOOKING STATEMENTS IN THIS ANNUAL REPORT MAY NOT BE REALIZED

Our disclosure and analysis in this annual report contain or incorporate by reference some forward-looking statements. Our forward-looking statements contain information regarding, among other things, our financial condition, future expansion plans and business strategy. We have based these forward-looking statements on our current expectations and projections about future events. You can identify these statements by the fact that they do not relate strictly to historical or current facts. Although we believe that these expectations and projections are reasonable, such forward-looking statements are inherently subject to risks, uncertainties and assumptions about us, including, among other things:

- our dependence on frequent introduction of new product services and technologies based on the latest developments;
- the intensely competitive semiconductor, communications, consumer electronics and computer industries and markets;
- risks associated with our international business activities;
- our dependence on key personnel;
- general economic and political conditions, including those related to the semiconductor, communications, consumer electronics and computer industries;
- natural disasters, such as earthquakes and droughts, which are beyond our control;
- possible disruptions in commercial activities caused by natural and human-induced disasters and outbreaks of contagious diseases;
- fluctuations in foreign currency exchange rates;
- additional disclosures we make in our previous and future Form 20-F annual reports and Form 6-K periodic reports to the U.S. Securities and Exchange Commission; and
- those other risks identified in the "Item 3. Key Information-D. Risk Factors" section of this annual report.

The words “may”, “will”, “is/are likely to”, “anticipate”, “believe”, “estimate”, “expect”, “intend”, “plan” and similar expressions are intended to identify a number of these forward-looking statements. We do not and will not undertake the obligation to update or revise any forward-looking statements contained in this annual report whether as a result of new information, future events or otherwise. In light of these risks, uncertainties and assumptions, the forward-looking events discussed in this annual report might not occur and our actual results could differ materially from those anticipated in these forward-looking statements.

GLOSSARY

ASIC	Application Specific Integrated Circuit. A custom-designed integrated circuit that performs specific functions which would otherwise require a number of off-the-shelf integrated circuits to perform.
Cell	Semiconductor structure in an electrical state which can store a bit of information, mainly used as the building block of memory array.
Die	A piece of a semiconductor wafer containing the circuitry of an unpackaged single chip.
DRAM	Dynamic Random Access Memory. A type of volatile memory product that is used in electronic systems to store data and program instructions. It is the most common type of RAM and must be refreshed with electricity hundreds of times per second or else it will fade away.
EUV Lithography	Extreme Ultraviolet Lithography
FinFET	Fin Field-Effect Transistor
FPGA	Field Programmable Gate Array. A programmable integrated circuit.
Integrated Circuit	Entire electronic circuit built on a single piece of solid substrate and enclosed in a small package. The package is equipped with leads needed to electrically integrate the integrated circuit with a larger electronic system. Monolithic and hybrid integrated circuits are distinguished by the type of substrate used.
Interconnect	The conductive path made from copper or aluminum that is required to achieve connection from one circuit element to the other circuit elements within a circuit.
Mask	Photomask. A piece of glass on which an integrated circuit circuitry design is laid out.
Memory	A group of integrated circuits that a computer uses to store data and programs, such as ROM, RAM, DRAM and SRAM.
Micron	A unit of spatial measurement that is one-millionth of a meter.
Nanometer	A unit of spatial measurement that is one-billionth of a meter.
PC	Personal computer.
RAM	Random Access Memory. A type of volatile memory forming the main memory of a computer where applications and files are run.
ROM	Read-Only Memory. Memory that is programmed by the manufacturer and cannot be changed. Typically, ROM is used to provide start-up data when a computer is first turned on.
Scanner	A photolithography tool used in the production of semiconductor devices. This camera-like step-and-scan tool projects the image of a circuit from a master image onto a photosensitized silicon wafer.
Semiconductor	A material with electrical conducting properties in between those of metals and insulators. Essentially, semiconductors transmit electricity only under certain circumstances, such as when given a positive or negative electric charge. Therefore, a semiconductor’s ability to conduct can be turned on or off by manipulating those charges and this allows the semiconductor to act as an electric switch. The most common semiconductor material is silicon, used as the base of most semiconductor chips today because it is relatively inexpensive and easy to create.

SoC	System-on-Chip. A chip that incorporates functions currently performed by several chips on a cost effective basis.
SOI	Silicon-On-Insulator. Silicon wafer consisting of a thin layer of oxide, on top of which semiconductor devices are built.
SRAM	Static Random Access Memory. A type of volatile memory product that is used in electronic systems to store data and program instructions. Unlike the more common DRAM, it does not need to be refreshed.
Transistor	Tri-terminal semiconductor device in which input signal (voltage or current depending on the type of transistor) controls output current. An individual circuit that can amplify or switch electric current. This is the building block of all integrated circuits.
Volatile memory	Memory products which lose their data content when the power supply is switched off.
Wafer	Thin, round, flat piece of silicon that is the base of most integrated circuits.
8-inch wafer equivalents	Standard unit describing the equivalent amount of 8-inch wafers produced after conversion, used to quantify levels of wafer production for purposes of comparison. Figures of 8-inch wafer equivalents are derived by converting the number of wafers of all dimensions (e.g., 6-inch, 8-inch and 12-inch) into their equivalent figures for 8-inch wafers. 100 6-inch wafers are equivalent to 56.25 8-inch wafers. 100 12-inch wafers are equivalent to 225 8-inch wafers.

PART I

ITEM 1. IDENTITY OF DIRECTORS, SENIOR MANAGEMENT AND ADVISERS

Not applicable.

ITEM 2. OFFER STATISTICS AND EXPECTED TIMETABLE

Not applicable.

ITEM 3. KEY INFORMATION

A. Selected Financial Data

The selected balance sheet data as of December 31, 2011 and 2012 and the selected statements of income and cash flow data for the years ended December 31, 2010, 2011 and 2012 are derived from our audited consolidated financial statements included elsewhere in this annual report. The selected balance sheet data as of December 31, 2008, 2009 and 2010 and the selected statements of income and cash flow data for the years ended December 31, 2008 and 2009 are derived from our audited consolidated financial statements not included in this annual report.

Our financial statements have been prepared and presented in accordance with R.O.C. GAAP, which differs in many material respects from U.S. GAAP. For the discussion of these differences, see Note 36 to our audited consolidated financial statements included elsewhere in this annual report. Some of the items in the statements of income, cash flow and balance sheets have been reconciled to U.S. GAAP and are set forth below. The summary financial data set forth below should be read in conjunction with “Item 5. Operating and Financial Review and Prospects” and our financial statements and the notes to those statements included elsewhere in this annual report.

	Years Ended December 31,					
	2008	2009	2010	2011	2012	
	NT$	NT$	NT$	NT$	NT$	US$
	(in millions, except per share and per ADS data)					
Consolidated Statement of Income Data:						
R.O.C. GAAP						
Net operating revenues	96,814	91,390	126,442	116,703	115,675	3,982
Cost of goods sold	(84,102)	(75,975)	(89,518)	(95,417)	(96,263)	(3,314)
Gross profit	12,712	15,415	36,924	21,286	19,412	668
Operating expenses:						
Sales and marketing	(3,483)	(2,800)	(2,566)	(3,369)	(2,749)	(94)
General and administrative	(3,055)	(2,724)	(3,598)	(3,342)	(3,371)	(116)
Research and development	(8,274)	(8,044)	(8,740)	(9,395)	(9,787)	(337)
Total operating expenses	(14,812)	(13,568)	(14,904)	(16,106)	(15,907)	(547)
Operating income (loss)	(2,100)	1,847	22,020	5,180	3,505	121
Net non-operating income (loss)	(19,886)	(174)	3,364	4,200	4,498	154
Income (Loss) before income tax and minority interests	(21,986)	1,673	25,384	9,380	8,003	275
Income tax expense	(997)	(651)	(1,606)	(913)	(2,129)	(73)
Extraordinary gain	—	649	68	—	—	—
Net income (loss)	(22,983)	1,671	23,846	8,467	5,874	202
Attributable to:						
the Company	(22,320)	3,874	23,899	10,610	7,819	269
minority interests	(663)	(2,203)	(53)	(2,143)	(1,945)	(67)
Earnings (Losses) per share: (1)(2)						
Basic	(1.70)	0.31	1.91	0.84	0.62	0.02
Diluted (3)	(1.70)	0.30	1.87	0.81	0.59	0.02
Shares used in earnings (losses) per share calculation: (2)						
Basic	13,111	12,699	12,496	12,561	12,625	12,625
Diluted (3)	13,170	12,786	12,768	13,241	13,456	13,456
Earnings (Losses) per ADS: (2)						
Basic	(8.50)	1.55	9.55	4.20	3.10	0.11
Diluted (3)	(8.50)	1.50	9.35	4.05	2.95	0.10
U.S. GAAP						
Net operating revenues	96,814	91,390	126,442	116,703	115,675	3,982
Cost of goods sold	(85,923)	(76,209)	(89,929)	(95,594)	(96,331)	(3,316)
Operating income (loss)	(22,431)	(2,323)	21,394	2,573	706	24
Net income (loss)	(29,632)	364	23,544	6,605	3,109	107
Attributable to:						
the Company	(28,955)	2,572	23,616	8,746	5,055	174
noncontrolling interests	(677)	(2,208)	(72)	(2,141)	(1,946)	(67)
Other comprehensive income (loss) attributable to the Company	(25,239)	24,540	(8,629)	(9,551)	(6,484)	(223)
Comprehensive income (loss) attributable to the Company	(54,194)	27,112	14,987	(805)	(1,429)	(49)
Earnings (Losses) per share: (1)						
Basic	(2.25)	0.21	1.91	0.71	0.41	0.01
Diluted (3)	(2.25)	0.20	1.90	0.68	0.38	0.01
Shares used in earnings (losses) per share calculation:						
Basic	12,870	12,538	12,335	12,400	12,464	12,464
Diluted (3)	12,870	12,560	12,399	12,859	13,140	13,140
Earnings (Losses) per ADS:						
Basic	(11.25)	1.03	9.57	3.53	2.03	0.07
Diluted (3)	(11.25)	1.02	9.52	3.40	1.92	0.07

	Years Ended December 31,					
	2008	2009	2010	2011	2012	
	NT$	NT$	NT$	NT$	NT$	US$
	(in millions, except per share and per ADS data)					
Consolidated Balance Sheet Data:						
R.O.C. GAAP						
Current assets	68,888	102,363	93,769	84,058	80,918	2,785
Long-term investment	32,441	55,227	47,179	38,574	34,979	1,204
Property, plant and equipment	108,410	89,596	132,762	149,324	158,854	5,468
Total assets	216,399	253,638	280,887	279,832	280,959	9,672
Current liabilities	13,033	35,246	45,445	42,906	40,034	1,378
Long-term debt (excluding current portion)	8,130	767	6,799	21,095	32,155	1,107
Total liabilities	24,740	39,542	55,751	67,707	75,938	2,614
Capital stock (4)	129,877	129,877	129,879	130,845	129,521	4,459
Stockholders' equity	191,659	214,096	225,136	212,125	205,021	7,058
U.S. GAAP						
Cash and cash equivalents	40,017	54,413	51,034	49,062	42,488	1,463
Working capital (5)	55,525	67,162	48,322	41,109	41,066	1,414
Total assets	214,990	252,705	281,387	279,460	279,052	9,606
Total liabilities	24,099	39,465	56,264	68,820	77,423	2,665
Stockholders' equity	190,891	213,240	225,123	210,640	201,629	6,941

	Years Ended December 31,					
	2008	2009	2010	2011	2012	
	NT$	NT$	NT$	NT$	NT$	US$
	(in millions, except per share and per ADS data)					
Other Consolidated Data:						
R.O.C. GAAP						
Cash flow:						
Capital expenditure	11,515	17,618	61,323	53,326	52,186	1,796
Cash provided by operating activities	45,251	32,422	53,495	41,654	40,535	1,395
Cash used in investing activities	(11,423)	(19,229)	(57,779)	(55,120)	(49,148)	(1,692)
Cash provided by (used in) financing activities	(34,380)	4,944	(10,174)	9,923	3,588	124
Net increase (decrease) in cash and cash equivalents	889	17,586	(14,882)	(2,201)	(6,477)	(223)
Gross profit margin	13.1%	16.9%	29.2%	18.2%	16.8%	16.8%
Operating profit (loss) margin	(2.2)%	2.0%	17.4%	4.4%	3.0%	3.0%
Net profit (loss) margin	(23.0)%	4.2%	18.9%	9.1%	6.8%	6.8%
Capacity utilization rate (on an actual basis)	70.7%	69.4%	93.7%	78.6%	78.8%	78.8%
Dividends declared per share (6)	1.2	—	0.5	1.11	0.5	0.02
U.S. GAAP						
Cash flow:						
Capital expenditure	11,515	17,618	61,323	53,326	52,186	1,796
Cash provided by operating activities	44,953	32,422	53,495	41,654	40,535	1,395
Cash used in investing activities	(19,973)	(22,419)	(46,277)	(54,891)	(49,245)	(1,695)
Cash provided by (used in) financing activities	(34,081)	4,944	(10,174)	9,923	3,588	124
Net increase (decrease) in cash and cash equivalents	(7,661)	14,396	(3,379)	(1,971)	(6,574)	(226)
Gross profit margin	11.3%	16.6%	28.9%	18.1%	16.7%	16.7%
Operating profit (loss) margin	(23.2)%	(2.5)%	16.9%	2.2%	0.6%	0.6%
Net profit (loss) margin	(29.9)%	2.8%	18.7%	7.5%	4.4%	4.4%

(1) Earnings (Losses) per share is calculated by dividing net income (loss) by the weighted average number of shares outstanding during the year.
(2) Retroactively adjusted for all subsequent stock dividends.
(3) Diluted securities include convertible bonds and employee stock options, if any.
(4) The changes to the number of the capital shares primarily caused by the acquisition of treasury stocks, subsequent resale of treasury stocks to employees and exercise of employee stock options, if any.
(5) Working capital equals current assets minus current liabilities.
(6) Dividends declared per share are in connection with earnings and accumulated additional paid-in capital.

Currency Translations and Exchange Rates

In portions of this annual report, we have translated New Taiwan dollar amounts into U.S. dollars for the convenience of readers. The rate we used for the translations was NT$29.05 = US$1.00, which was the noon buying rate as certified for customs purposes by the Federal Reserve Bank of New York on December 31, 2012. The translation does not mean that New Taiwan dollars could actually be converted into U.S. dollars at that rate. The following table shows the noon buying rates for New Taiwan dollars expressed in New Taiwan dollar per US$1.00. On April 19, 2012, the noon buying rate was NT$29.77 to US$1.00.

	Average (1)	High	Low	At Period-End
2008	31.51	33.58	29.99	32.76
2009	33.02	35.21	31.95	31.95
2010	31.50	32.43	29.14	29.14
2011	29.38	30.67	28.50	30.27
2012	29.56	30.28	28.96	29.05
October	29.24	29.31	29.15	29.20
November	29.11	29.26	28.96	29.07
December	29.04	29.10	29.00	29.05
2013 (through April 19)	29.57	30.06	28.93	29.77
January	29.10	29.54	28.93	29.54
February	29.63	29.73	29.52	29.67
March	29.74	29.88	29.63	29.81
April (through April 19)	29.91	30.06	29.77	29.77

Source: Federal Reserve Statistical Release, Board of Governors of the Federal Reserve System.

(1) Determined by averaging the rates on the last business day of each month during the relevant period for annual periods and the rates on each business day for monthly periods.

B. Capitalization and Indebtedness

Not applicable.

C. Reasons for the Offer and Use of Proceeds

Not applicable.

D. Risk Factors

Our business and operations are subject to various risks, many of which are beyond our control. If any of the risks described below actually occurs, our business, financial condition or results of operations could be seriously harmed.

Risks Related to Our Business and Financial Condition

Any global systemic political, economic and financial crisis or catastrophic natural disasters (as well as the indirect effects flowing therefrom) could negatively affect our business, results of operations, and financial condition.

In recent times, several major systemic economic and financial crises and natural disasters negatively affected global business, banking and financial sectors, including the semiconductor industry and markets. These types of crises cause turmoil in global markets that often result in declines in electronic products sales from which we generate our income through our goods and services. In addition, these crises may cause a number of indirect effects such as undermining the ability of our customers to remain competitive vis-à-vis the financial and economic challenges created by insolvent countries and companies still struggling to survive in the wake of these crises. For example, there could be in the future knock-on effects from these types of crises on our business, including significant decreases in orders from our customers; insolvency of key suppliers resulting in product delays; inability of customers to obtain credit to finance purchases of our products; customer insolvencies; and counterparty failures negatively impacting our treasury operations. Any future systemic political, economic or financial crisis or catastrophic natural disaster (as well as the indirect effects flowing from these crises or disasters) could cause revenues for the semiconductor industry as a whole to decline dramatically, and if the economic conditions or financial condition of our customers were to deteriorate, additional accounting related allowances may be required in the future and such additional allowances could increase our operating expenses and therefore reduce our operating income and net income. Thus, any future global economic crisis or catastrophic natural disaster (and their indirect effects) could materially and adversely affect our results of operations.

The seasonality and cyclical nature of the semiconductor industry and periodic overcapacity make us particularly vulnerable to significant and sometimes prolonged economic downturns.

The semiconductor industry has historically been highly cyclical and, at various times, has experienced significant downturns. Since most of our customers operate in semiconductor-related industries, variations in order levels from our customers can result in volatility in our revenues and earnings. Because our business is, and will continue to be, largely dependent on the requirements of semiconductor companies for our services, downturns in the semiconductor industry will lead to reduced demand for our services.

Our net operating revenues are also typically affected by seasonal variations in market conditions that contribute to the fluctuation of the average selling prices of semiconductor services and products. The seasonal sales trends for semiconductor services and products closely mirror those for consumer electronics, communication and computer sales. We generally experience seasonal lows in the demand for semiconductor services and products during the first half of the year, primarily as a result of inventory correction by our customers. Any change in the general seasonal variations, which we cannot anticipate, may result in materially adverse effects on our revenues, operations and businesses.

Our operating results fluctuate from quarter to quarter, which makes it difficult to predict our future performance.

Our revenues, expenses and results of operations have varied significantly in the past and may fluctuate significantly from quarter to quarter in the future due to a number of factors, many of which are beyond our control. Our business and operations have at times in the past been negatively affected by, and are expected to continue to be subject to the risk of, the following factors:

- the seasonality and cyclical nature of both the semiconductor industry and the markets served by our customers;
- our customers' adjustments in their inventory;
- the loss of a key customer or the postponement of orders from a key customer;
- the rescheduling and cancellation of large orders;
- our ability to obtain equipment, raw materials, electricity, water and other required utilities on a timely and economic basis;
- outbreaks of contagious diseases, including severe acute respiratory syndrome, avian flu and swine flu;
- environmental events, such as fires and earthquakes, or industrial accidents; and
- technological changes.

Due to the factors noted above and other risks discussed in this section, many of which are beyond our control, you should not rely on quarter-to-quarter comparisons to predict our future performance. Unfavorable changes in any of the above factors may seriously harm our business, financial condition and results of operations. In addition, our operating results may be below the expectations of public market analysts and investors in some future periods. In this event, the price of the shares or ADSs may underperform or fall.

A decrease in demand for or selling prices of communication devices, consumer electronics and computer goods may decrease the demand for our services and reduce our margins.

Our customers generally use the semiconductors produced in our fabs in a wide variety of applications. We derive a significant percentage of our operating revenues from customers who use our manufacturing services to make semiconductors for communication devices, consumer electronics, PCs and other computers. The semiconductor industry experienced several downturns due to recent major financial crises and natural disasters. These downturns resulted in a reduced demand for our services and hence decreased our revenues and earnings. Any significant decrease in the demand for communication devices, consumer electronics, PCs or other computers may further decrease the demand for our services. In addition, if the average selling prices of communication devices, consumer electronics, PCs or other computers decline significantly, we will be pressured to further reduce our selling prices, which may reduce our revenues and, therefore, reduce our margins significantly. As demonstrated by downturns in demand for high technology products in the past, market conditions can change rapidly, without apparent warning or advance notice. In such instances, our customers will experience inventory buildup and/or difficulties in selling their products and, in turn, will reduce or cancel orders for wafers from us. The timing, severity and recovery of these downturns cannot be predicted accurately or at all. When they occur, our business, profitability and price of the shares and ADSs are likely to suffer.

Overcapacity in the semiconductor industry may reduce our revenues, earnings and margins.

The prices that we can charge our customers for our services are significantly related to the overall worldwide supply of integrated circuits and semiconductor products. The overall supply of semiconductor products is based in part on the capacity of other companies, which is outside of our control. For example, in light of the current market conditions, some companies, including our largest competitors, have announced plans to increase capacity expenditures significantly. We believe such plans, if carried out as planned, will increase the industry-wide capacity and are likely to result in overcapacity in the future. In periods of overcapacity, if we are unable to offset the adverse effects of overcapacity through, among other things, our technology and product mix, we may have to lower the prices we charge our customers for our services and/or we may have to operate at significantly less than full capacity. Such actions could reduce our margin and weaken our financial condition and results of operations. We cannot give any assurance that an increase in the demand for foundry services in the future will not lead to overcapacity in the near future, which could materially adversely affect our revenues, earnings and margins.

Any problem in the semiconductor outsourcing infrastructure can adversely affect our net operating revenues and profitability.

Many of our customers depend on third parties to provide mask tooling, assembly and test services. If these customers cannot timely obtain these services on reasonable terms, they may not order any foundry services from us. This may significantly reduce our net operating revenues and negatively affect our profitability.

We may be unable to implement new technology as it becomes available, which may result in our loss of customers and market share.

The semiconductor industry is developing rapidly and the related technology is constantly evolving. If we do not anticipate the technology evolution and rapidly adopt new and innovative technology, we may not be able to produce sufficiently advanced services at competitive prices. There is a risk that our competitors may adopt new technology before we do, resulting in our loss of market share. If we are unable to begin offering advanced services and processes on a competitive and timely basis, we may lose customers to our competitors providing similar technologies, which may cause our net operating revenues to decline unless we can replace lost customers with new customers.

We may be unable to provide leading technology to our customers if we lose the support of our technology partners.

Enhancing our manufacturing process technologies is critical to our ability to provide services for our customers. We intend to continue to advance our process technologies through internal research and development and alliances with other companies. Although we have an internal research and development team focused on developing new and improved semiconductor manufacturing process technologies, we are also dependent on some of our technology partners to advance certain process technology portfolios. In addition, we currently have patent cross-licensing agreements with several companies, including International Business Machines Corporation, or IBM. Some mask and equipment vendors also supply our technology development teams with masks and equipment needed to develop more advanced processing technologies. If we are unable to continue any of our joint development arrangements, patent cross-licensing agreements and other agreements, on mutually beneficial economic terms, if we re-evaluate the technological and economic benefits of such relationships, if we are unable to enter into new technology alliances and arrangements with other leading and specialty semiconductor companies, or if we fail to secure masks and equipment from our vendors in a timely manner sufficient to support our ongoing technology development, we may be unable to continue providing our customers with leading edge mass-producible process technologies and may, as a result, lose important customers, which would have a materially adverse effect on our businesses, results of operations and financial condition.

In addition, some of our customers rely upon third party vendors, or IP Vendors, for the intellectual property they embed into their designs. Although we work and collaborate with IP Vendors with respect to such matters, there can be no guarantee that we will be successful or that the vendors will deliver according to our requirements or the needs of our customers. Failures to meet the targets or to deliver on a timely basis could cause customers to cancel orders and/or shift capacity to other suppliers.

Our business may suffer if we cannot compete successfully in our industry.

The worldwide semiconductor foundry industry is highly competitive. We compete with dedicated foundry service providers such as Taiwan Semiconductor Manufacturing Company Limited, Semiconductor Manufacturing International (Shanghai) Corporation and Globalfoundries Inc., as well as the foundry operation services of some integrated device manufacturers, such as IBM, Intel, Samsung Electronics, or Samsung, and Toshiba Corporation, or Toshiba. Integrated device manufacturers principally manufacture and sell their own proprietary semiconductor products, but may also offer foundry services. Other competitors such as DongbuAnam Semiconductor, Grace Semiconductor Manufacturing Corp., X-FAB Semiconductors Foundries AG and Silterra Malaysia Sdn. Bhd. have initiated efforts to expand and develop substantial additional foundry capacity. New entrants and consolidations in the foundry business, such as the acquisition of Chartered Semiconductor by Globalfoundries in 2009, are likely to initiate a trend of competitive pricing and create potential overcapacity in legacy technology. Some of our competitors have greater access to capital and substantially greater production, research and development, marketing and other resources than we do. As a result, these companies may be able to compete more aggressively over a longer period of time than we can.

The principal elements of competition in the wafer foundry market include:

- technical competence;
- time-to-volume production and cycle time;
- time-to-market;
- research and development quality;
- available capacity;
- manufacturing yields;
- customer service and design support;
- price;

- management expertise; and
- strategic alliances.

Our ability to compete successfully also depends on factors partially outside of our control, including product availability, intellectual property, or IP, including cell libraries that our customers embed in their product designs, and industry and general economic trends. If we cannot compete successfully in our industry, our business may suffer.

We may not succeed in our efforts to acquire operations in China.

R.O.C. law prohibits Taiwan entities from investment in mainland China-based semiconductor manufacturers without government approval. Since 2005, we have entered into several transactions to increase our ownership of Hejian Technology (Suzhou) Co., Ltd., or Hejian, a semiconductor manufacturer owning an 8-inch fab in Suzhou, China. Hejian is a fully owned subsidiary of Infoshine Technology Limited, or Infoshine, and Infoshine is a fully owned subsidiary of Best Elite International Limited, or Best Elite. For more information about the transactions with Hejian and its holding companies, Infoshine and Best Elite, please see "Item 4. Information on the Company—A. History and Development of the Company".

As part of these transactions, we need to obtain approvals from the Investment Commission of the R.O.C. Ministry of Economic Affairs, or the R.O.C. MOEA. Investments made by R.O.C. companies in PRC companies that engage in the semiconductor foundry business are strictly regulated by the R.O.C. government. For example, the investee may only manufacture semiconductor wafers of 8 inches or smaller, and the number of total investment projects in the semiconductor foundry business undertaken by the R.O.C. companies, taken as a whole, is limited by a quota. As of March 31, 2013, our cumulative ownership in Best Elite was 86.88%. While we have received approvals of the Investment Commission, Ministry of Economic Affairs, Executive Yuan for our acquisition of Best Elite's shares, we cannot assure you that we will be able to continue to receive approvals from the R.O.C. government authorities for further acquisitions or transactions in the future.

We compete for business on a global basis, and we believe it is necessary to establish and develop operations in multiple strategic geographic regions. We cannot assure you that the mergers and acquisitions we have undertaken will be closed successfully or that they will be fully closed on the terms we proposed. The failure to close these transactions or the failure to close them on terms as favorable as we have entered into and announced may impair our ability to realize the benefits we intend to achieve and have a material and adverse effect on our operations and business.

We may not be able to implement our planned growth if we are unable to obtain the financing necessary to fund the substantial capital expenditures we expect to incur.

Our business and the nature of our industry require us to make substantial capital expenditures leading to a high level of fixed costs. The costs of facilities, tools and equipment to make semiconductors with advanced technology continue to rise, with each generation typically significantly more expensive than the larger-in-size more mature technologies which preceded. We expect to incur significant capital expenditures in connection with our growth plans. These capital expenditures will be made in advance of any additional sales to be generated by new or upgraded fabs as a result of these expenditures. Given the fixed-cost nature of our business, we have in the past incurred, and may in the future incur, operating losses if our revenues do not adequately offset our capital expenditures. Additionally, our actual expenditures may exceed our planned expenditures for a variety of reasons, including changes in:

- our growth plan;
- our process technology;
- market conditions;

- interest rates;
- exchange rate fluctuations; and
- prices of equipment.

We cannot assure you that additional financing will be available on satisfactory terms, if at all. If adequate funds are not available on satisfactory terms, we may be forced to curtail our expansion plans or delay the deployment of our services, which could result in a loss of customers and limit the growth of our business.

We depend on a small number of customers for a significant portion of our net operating revenues and a loss of some of these customers would result in the loss of a significant portion of our net operating revenues.

We have been largely dependent on a small number of customers for a substantial portion of our business. In 2012, our top ten customers accounted for 64.5% of our net operating revenues. We expect that we will continue to be dependent upon a relatively limited number of customers for a significant portion of our net operating revenues. We cannot assure you that our net operating revenues generated from these customers, individually or in the aggregate, will reach or exceed historical levels in any future period. Loss or cancellation of business from significant changes in scheduled deliveries to, or decreases in the prices of services sold to, any of these customers could significantly reduce our net operating revenues.

Our customers generally do not place purchase orders far in advance, which makes it difficult for us to predict our future revenues, adjust production costs and allocate capacity efficiently on a timely basis.

Our customers generally do not place purchase orders far in advance. In addition, due to the cyclical nature of the semiconductor industry, our customers' purchase orders have varied significantly from period to period. As a result, we do not typically operate with any significant backlog, except in periods of extreme capacity shortage such as that experienced in late 2009 and early 2010. The lack of significant backlog and the unpredictable length and timing of semiconductor cycles make it difficult for us to forecast our revenues in future periods. Moreover, our expense levels are based in part on our expectations of future revenues and we may be unable to adjust costs in a timely manner to compensate for revenue shortfalls. We expect that in the future our net operating revenues in any quarter will continue to be substantially dependent upon purchase orders received in that quarter.

Our inability to obtain, preserve and defend intellectual property rights could harm our competitive position.

Our ability to compete successfully and achieve future growth will depend, in part, on our ability to protect our proprietary technology and to secure critical processing technology that we do not own at commercially reasonable terms. We cannot assure you that in the future we will be able to independently develop, or secure from any third party, the technology required for upgrading our production facilities or for meeting our customer needs. Our failure to successfully obtain such technology may seriously harm our competitive position.

Our ability to compete successfully also depends on our ability to operate without infringing on the proprietary rights of others. We have no means of knowing what patent applications have been filed in the United States or in certain other countries until months after they are filed. The semiconductor industry, because of the complexity of the technology used and the multitude of patents, copyrights and other overlapping intellectual property rights, is characterized by frequent litigation regarding patent, trade secret and other intellectual property rights. It is common for patent owners to assert their patents against semiconductor manufacturers. We have received from time to time communications from third parties asserting patents that cover certain of our technologies and alleging infringement of intellectual property rights of others, and we expect to continue to receive such communications in the future. See "Item 4. Information on the Company—B. Business Overview—Litigation" for more details of our ongoing litigation. In the event any third party was to make a valid claim against us or against our customers, we could be required to:

- seek to acquire licenses to the infringed technology which may not be available on commercially reasonable terms, if at all;

- discontinue using certain process technologies, which could cause us to stop manufacturing certain semiconductors;
- pay substantial monetary damages; and/or
- seek to develop non-infringing technologies, which may not be feasible.

Any one of these developments could place substantial financial and administrative burdens on us and hinder our business. Litigation, which could result in substantial costs to us and diversion of our resources, may also be necessary to enforce our patents or other intellectual property rights or to defend us or our customers against claimed infringement of the rights of others. If we fail to obtain necessary licenses or if litigation relating to patent infringement or other intellectual property matters occurs, it could hurt our reputation as a technology leader in our industry and prevent us from manufacturing particular products or applying particular technologies, which could reduce opportunities to generate revenues.

Our operations and business will suffer if we lose one or more of our key personnel without adequate replacements.

Our future success to a large extent depends on the continued service of our Chairman and key executive officers. We do not carry key person insurance on any of our personnel. If we lose the services of any of our Chairman or key executive officers, it could be difficult to find and integrate replacement personnel in a short period of time, which could harm our operations and the growth of our business.

We may have difficulty attracting and retaining skilled employees, who are critical to our future success.

The success of our business depends upon attracting and retaining experienced executives, engineers and other employees to implement our strategy. The competition for skilled employees is intense. We expect demand for personnel in Taiwan to increase in the future as new wafer fabrication facilities and other businesses are established in Taiwan. We also expect demand for experienced personnel in other locations to increase significantly as our competitors establish and expand their operations. Some of our competitors are willing to offer better compensation than that we do to our executives, engineers and other employees. We do not have long-term employment contracts with any of our employees. If we were unable to retain our existing personnel or attract, assimilate and recruit new experienced personnel in the future, it could seriously disrupt our operations and delay or restrict the growth of our business.

Our transactions with affiliates and stockholders may hurt our profitability and competitive position.

We have provided foundry services to several of our affiliates and stockholders. These transactions were conducted on an arm's-length basis. We currently do not provide any preferential treatment to any of these affiliates and stockholders. However, we may in the future reserve or allocate our production capacity to these companies if there is a shortage of foundry services in the market to enable these companies to maintain their operations and/or to protect our investments in them. This reservation or allocation may reduce our capacity available for our other customers, which may damage our relationships with other customers and discourage them from using our services. This may hurt our profitability and competitive position.

The differences between R.O.C. and U.S. accounting standards affect the amount of our net income.

Our financial statements are prepared under R.O.C. GAAP, which differ in certain significant respects from U.S. GAAP. For a discussion of these differences, see Note 36 to our audited consolidated financial statements included elsewhere in this annual report. As a result, our net income attributable to us in 2010, 2011 and 2012 under U.S. GAAP was NT$23,616 million, NT$8,746 million and NT$5,055 million (US$174 million), respectively, as compared to net income attributable to us under R.O.C. GAAP of NT$23,899 million, NT$10,610 million and NT$7,819 million (US$269 million) in 2010, 2011 and 2012, respectively.

Starting from January 1, 2013, we will prepare consolidated financial statements in accordance with International Financial Reporting Standards ("IFRSs") as issued by the International Accounting Standards Board ("IASB") for our future SEC filing. As such, our 2012 consolidated financial statements under IFRSs to be included in our 2013 Form 20-F may be different from the accompanying 2012 consolidated ones prepared based on the R.O.C. GAAP.

The trend of adopting protectionist measures in certain countries, including the United States, could have a material adverse impact on our results of operations and financial condition.

Governments in the United States, China and certain other countries have implemented fiscal and monetary programs to stimulate economic growth as a result of the recent economic downturn, and many of these programs include protectionist measures that encourage the use of domestic products and labor. Recent policy developments by the governments in China and elsewhere also suggest an increased unwillingness to allow international companies to invest in or acquire local businesses. Since many of our direct customers and other downstream customers in the supply chain are located in or have operations in the countries where protectionist measures were adopted, such protectionist measures may have a material adverse effect on demand for our manufacturing services.

Any future outbreak of contagious diseases may materially and adversely affect our business and operations, as well as our financial condition and results of operations.

Any future outbreak of contagious diseases, such as avian or swine influenza or severe acute respiratory syndrome, may disrupt our ability to adequately staff our business and may generally disrupt our operations. If any of our employees is suspected of having contracted any contagious disease, we may under certain circumstances be required to quarantine such employees and the affected areas of our premises. Therefore, we may have to temporarily suspend part of or all of our operations. Furthermore, any future outbreak may restrict the level of economic activity in affected regions, including Taiwan, and affect the willingness and ability of our employees and customers to travel, which may also adversely affect our business and prospects. As a result, we cannot assure you that any future outbreak of contagious diseases would not have a material adverse effect on our financial condition and results of operations.

Currency fluctuations could increase our costs relative to our revenues, which could adversely affect our profitability.

More than half of our net operating revenues are denominated in currencies other than New Taiwan dollars, primarily in U.S. dollars and Japanese Yen. On the other hand, more than half of our costs of direct labor, raw materials and overhead are incurred in New Taiwan dollars. Although we hedge a portion of the resulting net foreign exchange position through the use of foreign exchange spot transactions, we are still affected by fluctuations in foreign exchange rates among the U.S. dollar, the Japanese Yen, the New Taiwan dollar and other currencies. Any significant fluctuation in exchange rates may impact on our financial condition and the U.S. dollar value of the ADSs and the U.S. dollar value of any cash dividends we distributed, which could have a corresponding effect on the market price of the ADSs.

Risks Relating to Manufacturing

Our manufacturing processes are highly complex, costly and potentially vulnerable to impurities and other disruptions that can significantly increase our costs and delay product shipments to our customers.

Our manufacturing processes are highly complex, require advanced and costly equipment and are continuously being modified to improve manufacturing yields and product performance. Impurities or other difficulties in the manufacturing process or defects with respect to equipment or supporting facilities can lower manufacturing yields, interrupt production or result in losses of products in process. As system complexity has increased and process technology has become more advanced, manufacturing tolerances have been reduced and requirements for precision have become even more demanding. Although we have been enhancing our manufacturing capabilities and efficiency, from time to time we have experienced production difficulties that have caused delivery delays and quality control problems, as is common in the semiconductor industry. In the past we have encountered the following problems:

- capacity constraints due to changes in product mix or the delayed delivery of equipment critical to our production, including scanners, steppers and chemical stations;
- construction delays during expansions of our clean rooms and other facilities;
- difficulties in upgrading or expanding existing facilities;
- manufacturing execution system or automatic transportation system failure;
- unexpected breakdowns in our manufacturing equipment and/or related facilities;
- changing or upgrading our process technologies;
- raw materials shortages and impurities; and
- delays in delivery and shortages of spare parts and in maintenance for our equipment and tools

Should these problems repeat, we may suffer delays in delivery and/or loss of business and revenues. In addition, we cannot guarantee that we will be able to increase our manufacturing capacity and efficiency in the future to the same extent as in the past.

Our profit margin may substantially decline if we are unable to continuously improve our manufacturing yields, maintain high capacity utilization and optimize the technology mix of our silicon wafer production.

Our ability to maintain our profitability depends, in part, on our ability to:

- maintain high capacity utilization, which is defined as the ratio of the wafer-out quantity of 8-inch wafer equivalents divided by our estimated total 8- inch equivalent capacity in a specified period. The estimated capacity figures may vary depending upon equipment delivery schedules, pace of migration to more advanced processing technologies and other factors affecting production ramp-ups;
- maintain or improve our manufacturing yields, which is defined as the percentage of usable devices manufactured on a wafer; and
- optimize the technology mix of our production by increasing the number of wafers manufactured by utilizing different processing technologies.

Our manufacturing yields directly affect our ability to attract and retain customers, as well as the price of our services. Our capacity utilization affects our operating results because a large percentage of our operating costs are fixed. Our technology mix affects utilization of our equipment and process technologies, as well as the prices we can charge, either of which can affect our margins. If we are unable to continuously improve our manufacturing yields, maintain high capacity utilization or optimize the technology mix of our wafer production, our profit margin may substantially decline.

We may have difficulty in ramping up production in accordance with our schedule, which could cause delays in product deliveries and decreases in manufacturing yields.

As is common in the semiconductor industry, we have from time to time experienced difficulties in ramping up production at new or existing facilities or effecting transitions to new manufacturing processes. As a result, we have suffered delays in product deliveries or reduced manufacturing yields. We may encounter similar difficulties in connection with:

- the migration to more advanced process technologies, such as 45/40 and 28-nanometer and more advanced process technology;
- the joint development with vendors for more powerful tools (both in production and inspection) needed in the future to meet advanced process technology requirements; and
- the adoption of new materials in our manufacturing processes.

We may face construction delays, interruptions, infrastructure failure and delays in upgrading or expanding existing facilities, or changing our process technologies, any of which might adversely affect our production schedule. Our failure to achieve our production schedule could delay the time required to recover our investments and seriously affect our profitability.

Our production schedules could be delayed and we may lose customers if we are unable to obtain raw materials and equipment in a timely manner.

We depend on our suppliers for raw materials. To maintain competitive manufacturing operations, we must obtain from our suppliers, in a timely manner, sufficient quantities of quality materials at acceptable prices. Although we source our raw materials from several suppliers, a small number of these suppliers account for a substantial amount of our supply of raw materials because of the consistent quality of these suppliers' goods. For example, in 2012, we purchased a majority of our silicon wafers from four makers, Shin-Etsu Handotai Corporation, or Shin-Etsu, Siltronic AG, MEMC Corporation and Sumco Group (including Sumco Corporation and Formosa Sumco Technology Corporation). We may have long-term contracts with most of our suppliers if necessary. From time to time, our suppliers have extended lead time or limited the supply of required materials to us because of capacity constraints. Consequently, from time to time, we have experienced difficulty in obtaining the quantities of raw materials we need on a timely basis.

In addition, from time to time we may reject materials that do not meet our specifications, resulting in declines in output or manufacturing yields. We cannot assure you that we will be able to obtain sufficient quantities of raw materials and other supplies in a timely manner. If the supply of materials is substantially diminished or if there are significant increases in the costs of raw materials, we may be forced to incur additional costs to acquire sufficient quantities of raw materials to sustain our operations, which may increase our marginal costs and reduce profitability.

We also depend on a limited number of manufacturers and vendors that make and maintain the complex equipment we use in our manufacturing processes. We also rely on these manufacturers and vendors to improve our technology to meet our customers' demands as technology improves. In periods of unpredictable and highly diversified market demand, the lead time from order to delivery of this equipment can be as long as six to twelve months. If there are delays in the delivery of equipment or in the availability or performance of necessary maintenance, or if there are increases in the cost of equipment, it could cause us to delay our introduction of new manufacturing capacity or technologies and delay product deliveries, which may result in the loss of customers and revenues.

We may be subject to the risk of loss due to fire because the materials we use in our manufacturing processes are highly flammable.

We use highly flammable materials such as silane and hydrogen in our manufacturing processes and may therefore be subject to the risk of loss arising from fires. The risk of fire associated with these materials cannot be completely eliminated. We maintain insurance policies to reduce losses caused by fire, including business interruption insurance. While we believe that our insurance coverage for damage to our property and business interruption due to fire is consistent with semiconductor industry practice, our insurance coverage is subject to deductibles and self-insured retention and may not be sufficient to cover all of our potential losses. If any of our fabs were to be damaged or cease operations as a result of a fire, it would temporarily reduce manufacturing capacity and reduce revenues.

We and many of our customers and suppliers are vulnerable to natural disasters and other events outside of our control, which may seriously disrupt our operations.

Most of our assets and many of our customers and suppliers are located in certain parts of Taiwan. Our operations and the operations of our customers and suppliers are vulnerable to earthquakes, floods, droughts, power losses and similar events that affect the locations of our operations. The occurrence of any of these events could interrupt our services and cause severe damages to wafers in process, or cause significant business interruptions. Although we maintain property damage and business interruption insurance for such risks, there is no guarantee that future damages or business loss from earthquakes will be covered by such insurance, that we will be able to collect from our insurance carriers, should we choose to claim under our insurance policies, or that such coverage will be sufficient. In addition, our manufacturing facilities have occasionally experienced insufficient power supplies, and our operations have been disrupted.

Our operations may be delayed or interrupted and our business could suffer if we violate environmental, safety and health, or ESH, regulations.

The semiconductor manufacturing process requires the use of various gases, chemicals, hazardous materials and other substances such as solvents and sulfuric acid which may have an impact on the environment. We are always subject to ESH regulations, and a failure to manage the use, storage, transportation, emission, discharge, recycling or disposal of raw materials or to comply with these ESH regulations could result in (i) regulatory penalties, fines and other legal liabilities, (ii) suspension of production or delays in operation and capacity expansion, (iii) a decrease in our sales, (iv) an increase in pollution cleaning fees and other operation costs, or (v) damage to our public image, any of which could harm our business. In addition, as ESH regulations are becoming more comprehensive and stringent, we may incur a greater amount of capital expenditures in technology innovation and materials substitution in order to comply with such regulations, which may adversely affect our results of operations.

Climate change may negatively affect our business.

There is increasing concern that climate change is occurring and may have dramatic effects on human activity without aggressive remediation steps. A modest change in temperature would result in increased coastal flooding, changing precipitation patterns and increasing risk of extinction for the world’s species. Public expectations for reductions in greenhouse gas emissions could result in increased energy, transportation and raw material costs.

Scientific examination of, political attention to and rules and regulations on issues surrounding the existence and extent of climate change may result in an increase in the cost of production due to increase in the prices of energy and introduction of energy or carbon tax. Various regulatory developments have been introduced that focus on restricting or managing emissions of carbon dioxide, methane and other greenhouse gases. Enterprises may need to purchase at higher costs emission credits, new equipment or raw materials with lower carbon footprints. These developments and further legislation that is likely to be enacted could affect our operations negatively. Changes in environmental regulations, such those on the use of perfluorinated compounds, could increase our production costs, which could adversely affect our results of operation and financial condition.

In addition, more frequent droughts and floods, extreme weather conditions and rising sea levels could occur due to climate change. The impact of such changes could be significant as most of our factories are located in islands including Taiwan and Singapore. For example, transportation suspension caused by extreme weather conditions could harm the distribution of our products. Similarly, our operations depend upon adequate supplies of water, and extended or serious droughts may affect our ability to obtain adequate supplies of water and threaten our production. We cannot predict the economic impact, if any, of disasters or climate change.

Disruptions in the international trading environment may seriously decrease our international sales.

A substantial portion of our net operating revenues is derived from sales to customers located in countries other than Taiwan, Singapore and Japan where our fabs are located, which accounted for 35.5%, 40.2% and 33.4% in 2010, 2011 and 2012, respectively, of our net operating revenues. We expect sales to customers outside of Taiwan, Singapore and Japan to continue to represent a significant portion of our net operating revenues. The success and profitability of our international activities depend on certain factors beyond our control, such as general economic conditions, labor conditions, political stability, tax laws, import duties and foreign exchange controls of the countries in which we sell our products, and the political and economic relationships between Taiwan, Singapore, Japan and these countries. As a result, our manufacturing services will continue to be vulnerable to disruptions in the international trading environment, including adverse changes in foreign government regulations, political unrest and international economic downturns.

These disruptions in the international trading environment affect the demand for our manufacturing services and change the terms upon which we provide our manufacturing services overseas, which could seriously decrease our international sales.

Political, Economic and Regulatory Risks

We face substantial political risks associated with doing business in Taiwan, particularly due to the tense relationship between the R.O.C. and the People's Republic of China, or the PRC, that could negatively affect the value of your investment.

Our principal executive offices and most of our assets and operations are located in Taiwan. Accordingly, our business, financial condition and results of operations and the market price of our shares and the ADSs may be affected by changes in R.O.C. governmental policies, taxation, inflation or interest rates and by social instability and diplomatic and social developments in or affecting Taiwan which are outside of our control. Taiwan has a unique international political status. Since 1949, Taiwan and the Chinese mainland have been separately governed. The PRC claims that it is the sole government in China and that Taiwan is part of China. Although significant economic and cultural relations have been established between the R.O.C. and the PRC in the past few years, such as the adoption of the Economic Cooperation Framework Agreement and memorandum regarding cross-straight financial supervision, we cannot assure you that relations between the R.O.C. and PRC will not become strained again. For example, the PRC government has refused to renounce the use of military force to gain control over Taiwan and, in March 2005, further passed an Anti-Secession Law that authorizes non-peaceful means and other necessary measures should Taiwan move to gain independence from the PRC. Past developments in relations between the R.O.C. and the PRC have on occasions depressed the market prices of the securities of companies in the R.O.C. Such initiatives and actions are commonly viewed as having a detrimental effect to reunification efforts between the R.O.C. and the PRC. Relations between the R.O.C. and the PRC and other factors affecting military, political or economic conditions in Taiwan could materially and adversely affect our financial condition and results of operations, as well as the market price and the liquidity of our securities.

Our business depends on the support of the R.O.C. government, and a decrease in this support may increase our labor costs and decrease our net income after tax.

The R.O.C. government has been very supportive of technology companies such as us. For instance, the R.O.C.'s labor laws and regulations do not require employees of semiconductor companies, including our company, to be unionized, and permit these employees to work shifts of 10 hours each day on a two-days-on, two-days-off basis. We cannot assure you, however, that these labor laws and regulations will not be changed in the future. In the event that the R.O.C. government requires our employees to be unionized or decreases the number of hours our employees may work in a given day, our labor costs may increase significantly which could result in lower margins.

We, like many R.O.C. technology companies, have benefited from substantial tax incentives provided by the R.O.C. government. In 2012, such incentives resulted in a tax credit in the amount of NT$184 million (US$6 million). Among the incentives broadly enjoyed by R.O.C. technology companies, various tax benefits granted under Chapter 2 and Article 70-1 of the Statute for Upgrading Industries expired on December 31, 2009. Despite the fact that we can still enjoy the five-year tax holidays for the relevant investment plans approved by R.O.C. tax authority before the expiration of the Statute for Upgrading Industries, if more incentives are curtailed or eliminated, our net income attributable to us may decrease.

Our future tax obligations may adversely affect our profitability.

The R.O.C. government enacted the R.O.C. Income Basic Tax Act, also known as the "Minimum Income Tax Statute", or the Statute, which became effective on January 1, 2006. This Statute imposes an alternative minimum tax, or AMT. The AMT is designed to remedy the current excessive tax incentives for individuals and businesses. The AMT imposed under the Statute is a supplemental tax which is payable if the income tax payable pursuant to the R.O.C. Income Tax Act is below the minimum amount prescribed under the Statute. For the purpose of calculating the AMT, the taxable income defined under the Statute includes most income that is exempted from income tax under various legislations, such as those providing tax holidays and investment tax credits. For businesses, the incomes which previously enjoyed tax-exemption privileges under relevant tax regulations, such as the Act for the Establishment and Administration of the Science Parks and the Statute for Upgrading Industries, will be subject to the new AMT system for the calculation of business taxpayers' aggregate incomes. The AMT rate for business entities was 10% and will increase to 12% commencing from 2013. Under the Statute, a company will be subject to a 12% AMT if its annual taxable income under the Statute exceeds NT$0.5 million. However, the Statute grandfathered certain tax exemptions granted prior to the enactment of the AMT. For example, businesses already qualified for five-year tax holidays and having obtained the applicable permission issued by the competent authority before December 31, 2005 may continue to enjoy tax incentives, and the income exempted thereunder will not to be added to the taxable income for the purpose of calculating the AMT, so long as the construction of their investment projects breaks ground within one year from January 1, 2006 and is completed within three years commencing from the day immediately following their receipts of the applicable permission issued by the competent authority. As the tax exemption periods expire or in the event of an increase in other taxable income subject to the Statute, such AMT Statute may adversely impact our net income after tax.

Compliance with laws such as the US Conflict Minerals Law may affect our ability or the ability of our suppliers to purchase raw materials at an effective cost.

Many industries rely on materials which are subject to regulation concerning certain minerals sourced from the Democratic Republic of Congo or adjoining countries, including: Sudan; Uganda; Rwanda; Burundi; United Republic of Tanzania; Zambia; Angola; Congo; and Central African Republic. These minerals are commonly referred to as conflict minerals. Conflict minerals which may be used in our industry or by our suppliers include Columbite-tantalite (derivative of tantalum [Ta]), Cassiterite (derivative of tin [Sn]), gold [Au], Wolframite (derivative of tungsten [W]), and Cobalt [Co]. Under present U.S. regulations, we and our customers are required to survey and disclose whether our processes or products use or rely on conflict materials. On August 22, 2012, the U.S. SEC adopted the final rule for disclosing use of conflict minerals that require companies similar to ours to make a report in a type and format similar to Form D to disclose the use of conflict materials on an annual basis on or prior to each May 31, and our first report will be filed by May 31, 2014. In order to comply with the aforementioned rules and regulations promulgated by the U.S. SEC, we will spare no effort to verify with our vendors all relevant factual data and file the required report. Although we expect that we and our vendors will be able to comply with the requirements of any new regulations promulgated by the SEC, there can be no guarantee that we will be able to gather all the information required. In addition, there is increasing public sentiment that companies should avoid using conflict materials from the DRC and adjoining countries. Although we believe our suppliers do not rely on such conflict materials, there can be no guarantee that we will continue to be able to obtain adequate supplies of materials needed in our production from supply chains outside the DRC and adjoining countries. A failure to obtain necessary information or to maintain adequate supplies of materials from supply chains outside the DRC and adjoining countries may delay our production, increasing the risk of losing customers and business.

Similarly, many countries are considering regulations concerning disclosure and enforcement of human rights within supply chains. Although our own operations comply with the employment and employee rights requirements under the laws of the countries where we have operations, such proposals extend to the operations of suppliers, wherever they may be located. While we believe our suppliers comply with applicable human rights requirements, there can be no guarantee that they will continue to do so, or that we will be able to obtain the necessary information on their activities to comply with whatever future requirements may be enacted.

Data security and data privacy considerations and regulations may adversely affect our operations.

Our operations depend upon reliable and uninterrupted information technology services, including the integrity of our web-based and electronic customer service systems. Although we have put in place what we believe are reasonable precautions to prevent accidental and/or malicious disruption of these services, there can be no assurance that our preventive measures will preclude failure of the information technology, web-based and electronic customer service systems upon which our business depends. Disruption of these systems could adversely affect our ability to manufacture and to serve our customers.

In addition, in the course of our operations, we receive confidential information from and about our customers, vendors, employees and partners. Although we take what we believe are reasonable precautions to protect such information from disclosure to or interruption, there are no guarantees our precautions will prevent accidental or malicious access to such information. In the event of such access, our reputation could be adversely affected, customers and others may hesitate to entrust us with their confidential information, which would negatively affect our operations, and we would incur costs to remedy the breach.

Moreover, many jurisdictions have proposed regulations concerning data privacy. Although we have taken measures to comply with existing law and regulations in this regard, future laws may impose requirements that make our operations more expensive and/or less efficient. In addition, should we experience a breakdown in our systems or failure in our precautions that results in a violation of such regulations, we may suffer adverse customer reaction and face governmental penalties.

Changing statutory accounting principle from R.O.C. GAAP to IFRSs may have a difference adjustment of our stockholder's equity.

In May 2009, the R.O.C. government announced that listed, over-the-counter and emerging stock companies should adopt International Financial Reporting Standards ("IFRSs") which is translated and published by Accounting Research and Development Foundation, or ARDF, as the criteria for preparation of financial reports, beginning from January 1, 2013. Compared to our previous reporting standards under R.O.C. GAAP, IFRSs provides for differing reporting requirements with respect to, among others, employee benefits, investment in associate, business combination and measurement of financial instruments, which make a difference adjustment of our stockholder's equity between IFRSs and R.O.C. GAAP. For significant reconciliation of consolidated balance sheet and consolidated statement of comprehensive income, please refer to Note 34 to our audited consolidated financial statements included elsewhere in this annual report.

Risks Related to the Shares and ADSs and Our Trading Markets

Restrictions on the ability to deposit shares into our ADS program may adversely affect the liquidity and price of the ADSs.

The ability to deposit shares into our ADS program is restricted by R.O.C. law. Under current R.O.C. law, no person or entity, including you and us, may deposit shares into our ADS program without specific approval of the R.O.C. FSC except for the deposit of the shares into our ADS program and for the issuance of additional ADSs in connection with:

(1) distribution of share dividends or free distribution of our shares;

(2) exercise of the preemptive rights of ADS holders applicable to the shares evidenced by ADSs in the event of capital increases for cash; or

(3) delivery of our shares which are purchased in the domestic market in Taiwan directly by the investor or through the depositary or are already in the possession of the investor to the custodian for deposit into our ADS program, subject to the following conditions: (a) the re-issuance is permitted under the deposit agreement and custody agreement, (b) the depositary may accept deposit of those shares and issue the corresponding number of ADSs with regard to such deposit only if the total number of ADSs outstanding after the issuance does not exceed the number of ADSs previously approved by the R.O.C. FSC, plus any ADSs issued pursuant to the events described in (1) and (2) above and (c) this deposit may only be made to the extent previously issued ADSs have been withdrawn.

As a result of the limited ability to deposit shares into our ADS program, the prevailing market price of our ADSs on the NYSE may differ from the prevailing market price of the equivalent number of our shares on the Taiwan Stock Exchange.

Holders of our ADSs will not have the same proposal or voting rights as the holders of our shares, which may affect the value of your investment.

Except for treasury shares and shares held by our subsidiaries which meet certain criteria provided under the R.O.C. Company Act, each common share is generally entitled to one vote and no voting discount will be applied. However, except as described in this annual report and in the deposit agreement, holders of our ADSs will not be able to exercise voting rights attached to the shares evidenced by our ADSs on an individual basis. Holders of our ADSs will appoint the depositary or its nominee as their representative to exercise the voting rights attached to the shares represented by the ADSs. The voting rights attached to the shares evidenced by our ADSs must be exercised as to all matters brought to a vote of stockholders collectively in the same manner.

Moreover, holders of the ADSs do not have individual rights to propose any matter for stockholders' votes at our stockholders' meetings. However, holders of at least 51% of the ADS outstanding at the relevant record date may request the depositary to submit to us one proposal per year for consideration at our annual ordinary stockholders' meeting, provided that such proposal meets certain submission criteria and limitations, including the language and the length of the proposal, the time of submission, the required certification or undertakings, and the attendance at the annual ordinary stockholders' meeting. A qualified proposal so submitted by the depositary will still be subject to review by our board of directors and there is no assurance that the proposal will be accepted by our board of directors for inclusion in the agenda of our annual ordinary stockholders' meeting. Furthermore, if we determine, at our discretion, that the proposal submitted by the depositary does not qualify, we have no obligation to notify the depositary or to allow the depositary to modify such proposal.

Furthermore, if holders of at least 51% of the ADSs outstanding at the relevant record date instruct the depositary to vote in the same manner regarding a resolution, including election of directors, the depositary will appoint our Chairman, or his designee, to represent the ADS holders at the stockholders' meetings and to vote the shares represented by the ADSs outstanding in the manner so instructed. If by the relevant record date the depositary has not received instructions from holders of ADSs holding at least 51% of the ADSs to vote in the same manner for any resolution, then the holders will be deemed to have instructed the depositary to authorize and appoint our Chairman, or his designee, to vote all the shares represented by ADSs at his sole discretion, which may not be in your interest.

The rights of holders of our ADSs to participate in our rights offerings may be limited, which may cause dilution to their holdings.

We may from time to time distribute rights to our stockholders, including rights to acquire our securities. Under the deposit agreement, the depositary will not offer those rights to ADS holders unless both the rights and the underlying securities to be distributed to ADS holders are either registered under the Securities Act or exempt from registration under the Securities Act. We are under no obligation to file a registration statement with respect to any such rights or underlying securities or to endeavor to cause such a registration statement to be declared effective. Accordingly, holders of our ADSs may be unable to participate in our rights offerings and may experience dilution in their holdings.

Changes in exchange controls that restrict your ability to convert proceeds received from your ownership of ADSs may have an adverse effect on the value of your investment.

Your ability to convert proceeds received from your ownership of ADSs depends on existing and future exchange control regulations of the Republic of China. Under the current laws of the Republic of China, an ADS holder or the depositary, without obtaining further approvals from the R.O.C. Central Bank of China, or the CBC, or any other governmental authority or agency of the Republic of China, may convert NT dollars into other currencies, including U.S. dollars, in respect of:

- the proceeds of the sale of shares represented by ADSs or received as share dividends with respect to the shares and deposited into the depositary receipt facility; and
- any cash dividends or distributions received from the shares represented by ADSs.

In addition, the depositary may also convert into NT dollars incoming payments for purchases of shares for deposit in the depositary receipt facility against the creation of additional ADSs. If you withdraw the shares underlying your ADSs and become a holder of our shares, you may convert into NT dollars subscription payments for rights offerings. The depositary may be required to obtain foreign exchange approval from the CBC on a payment-by-payment basis for conversion from NT dollars into foreign currencies of the proceeds from the sale of subscription rights of new shares. Although it is expected that the CBC will grant approval as a routine matter, required approvals may not be obtained in a timely manner, or at all.

Under the Republic of China Foreign Exchange Control Law, the Executive Yuan of the Republic of China may, without prior notice but subject to subsequent legislative approval, impose foreign exchange controls or other restrictions in the event of, among other things, a material change in international economic conditions.

Our public stockholders may have more difficulty protecting their interests than they would as stockholders of a U.S. corporation.

Our corporate affairs are governed by our articles of incorporation and by laws governing R.O.C. corporations. The rights of our stockholders to bring stockholders' suits against us or our board of directors under R.O.C. law are much more limited than those of the stockholders of U.S. corporations. Therefore, our public stockholders may have more difficulty protecting their interests in connection with actions taken by our management, members of our board of directors or controlling stockholders than they would as stockholders of a U.S. corporation. Please refer to "Item 10. Additional Information—B. Memorandum and Articles of Association—Rights to Bring Stockholders' Suits" included elsewhere in this annual report for a detailed discussion of the rights of our stockholders to bring legal actions against us or our directors under R.O.C. law.

Holders of our ADSs will be required to appoint several local agents in Taiwan if they withdraw shares from our ADS program and become our stockholders, which may make ownership burdensome.

Non-R.O.C. persons wishing to withdraw shares represented by their ADSs from our ADS program and hold our shares represented by those ADSs are required to, among other things, appoint a local agent or representative with qualifications set forth by the R.O.C. FSC to open a securities trading account with a local brokerage firm, pay R.O.C. taxes, remit funds and exercise stockholders' rights. In addition, the withdrawing holders are also required to appoint a custodian bank with qualifications set forth by the R.O.C. FSC to hold the securities in safekeeping, make confirmations, settle trades and report all relevant information. Without making this appointment and opening of the accounts, the withdrawing holders would not be able to subsequently sell our shares withdrawn from a depositary receipt facility on the Taiwan Stock Exchange. Under R.O.C. law and regulations, except under limited circumstances, PRC persons are not permitted to withdraw the shares underlying the ADSs or to register as a stockholder of our company. Under the Regulations Governing Securities Investment and Futures Trading in Taiwan by Mainland Area Investors promulgated by the R.O.C. Executive Yuan on April 30, 2009, as amended, only qualified domestic institutional investors, or QDIIs and limited entities or individuals, are permitted to withdraw the shares underlying the ADSs, subject to compliance with the withdrawal relevant requirements, and only QDIIs, and limited entities or individuals who meet the qualification requirements set forth therein are permitted to own shares of an R.O.C. company listed for trading on the Taiwan Stock Exchange, provided that among other restrictions generally applicable to investments made by PRC persons, their shareholdings are subject to certain restrictions as set forth in the abovementioned regulations and that such mainland area investors shall apply for a separate approval if their investment, individually or in aggregate, amounts to or exceeds 10 percent of the shares of any R.O.C. listing company.

You may not be able to enforce a judgment of a foreign court in the R.O.C.

We are a company limited by shares incorporated under the R.O.C. Company Act. Most of our assets and most of our directors and executive officers and experts named in the registration statement are located in Taiwan. As a result, it may be difficult for you to enforce judgments obtained outside Taiwan upon us or such persons in Taiwan. We have been advised by our R.O.C. counsel that any judgment obtained against us in any court outside the R.O.C. arising out of or relating to the ADSs will not be enforced by R.O.C. courts if any of the following situations shall apply to such final judgment:

- the court rendering the judgment does not have jurisdiction over the subject matter according to R.O.C. law;
- the judgment or the court procedure resulting in the judgment is contrary to the public order or good morals of the R.O.C.;
- the judgment was rendered by default, except where the summons or order necessary for the commencement of the action was legally served on us within the jurisdiction of the court rendering the judgment within a reasonable period of time or with judicial assistance of the R.O.C.; or
- judgments of R.O.C. courts are not recognized in the jurisdiction of the court rendering the judgment on a reciprocal basis.

We may be considered a passive foreign investment company, which could result in adverse U.S. tax consequences for U.S. investors.

We do not believe that we were a passive foreign investment company, or PFIC, for 2012 and we do not expect to become one in the future, although there can be no assurance in this regard. Based upon the nature of our business activities, we may be classified as a passive foreign investment company for U.S. federal income tax purposes. Such characterization could result in adverse U.S. tax consequences to you if you are a U.S. investor.

For example, if we are a PFIC, our U.S. investors may become subject to increased tax liabilities under U.S. tax laws and regulations and will become subject to burdensome reporting requirements. The determination of whether or not we are a PFIC is made on an annual basis and will depend on the composition of our income and assets from time to time. Specifically, for any taxable year we will be classified as a PFIC for U.S. tax purposes if either (i) 75% or more of our gross income in a taxable year is passive income or (ii) the average percentage of our assets (which includes cash) by value in a taxable year which produce or are held for the production of passive income is at least 50%. The calculation of the value of our assets will be based, in part, on the quarterly market value of shares and ADSs, which is subject to change. In addition, the composition of our income and assets will be affected by how, and how quickly, we spend the cash we have raised in prior offerings. See "Taxation—U.S. Federal Income Tax Considerations For U.S. Persons—Passive Foreign Investment Company."

The trading price of the shares and ADSs may be adversely affected by the general activities of the Taiwan Stock Exchange and U.S. stock exchanges, the trading price of our shares, increases in interest rates and the economic performance of Taiwan.

Our shares are listed on the Taiwan Stock Exchange. The trading price of our ADSs may be affected by the trading price of our shares on the Taiwan Stock Exchange and the economic performance of Taiwan. The Taiwan Stock Exchange is smaller and, as a market, more volatile than the securities markets in the United States and some European countries. The Taiwan Stock Exchange has experienced substantial fluctuations in the prices and volumes of sales of listed securities, and there are currently limits on the range of daily price movements on the Taiwan Stock Exchange. The Taiwan Stock Exchange is particularly volatile during times of political instability, such as when the relationship between Taiwan and the PRC becomes tense. Moreover, the Taiwan Stock Exchange has experienced disturbance caused by market manipulation, insider trading and payment defaults, and the government of Taiwan has from time to time intervened in the stock market by purchasing stocks listed on the Taiwan Stock Exchange. The recurrence of these or similar events could deteriorate the price and liquidity of our shares and ADSs.

The market price of the ADSs may also be affected by general trading activities on the U.S. stock exchanges, which recently have experienced significant price volatility with respect to shares of technology companies. Fluctuation in interest rates and other general economic conditions may also influence the market price of the ADSs.

ITEM 4. INFORMATION ON THE COMPANY

A. History and Development of the Company

Our legal and commercial name is United Microelectronics Corporation, commonly known as “UMC”. We were incorporated under the R.O.C. Company Law as a company limited by shares in May 1980 and our shares were listed on the Taiwan Stock Exchange in 1985. Our principal executive office is located at No. 3 Li-Hsin Road II, Hsinchu Science Park, Hsinchu, Taiwan, Republic of China, and our telephone number is 886-3-578-2258. Our Internet website address is www.umc.com. The information on our website does not form part of this annual report. Our ADSs have been listed on the NYSE under the symbol “UMC” since September 19, 2000.

We are one of the world’s largest independent semiconductor foundries and a leader in semiconductor manufacturing process technologies. Our primary business is the manufacture, or “fabrication”, of semiconductors, sometimes called “chips” or “integrated circuits”, for others. Using our own proprietary processes and techniques, we make chips to the design specifications of our many customers. Our company maintains a diversified customer base across industries, including communication, consumer electronics, computer, and others, while continuing to focus on manufacturing for high growth, large volume applications, including networking, telecommunications, internet, multimedia, PCs and graphics. We sell and market mainly wafers which in turn are used in a number of different applications by our customers. Percentages of our net wafer sales derived from our products used in communication devices, consumer electronics, computer and other applications were 49.4%, 28.3%, 18.9% and 3.4%, respectively, in 2012.

We focus on the development of leading mass-producible manufacturing process technologies. We were among the first in the foundry industry to go into commercial operation with such advanced capabilities as producing integrated circuits with line widths of 0.25, 0.18, 0.15, 0.13 micron and 90, 65, 45/40, and 28 nanometer. Advanced technologies have enabled electronic products, especially in relation to computer, communication and consumer products, to integrate their functions in new and innovative methods. Networking capabilities have allowed electronic products such as computers, tablets, cell phones, televisions, PDAs, CD-ROMs and digital cameras to communicate with each other to exchange information. More powerful semiconductors are required to drive multimedia functions (e.g. processing visual data) and to resolve network bandwidth issues. At the same time, the trend toward personal electronic devices has resulted in products that are becoming physically smaller and consume less power. Process technology must also shrink the volumes of products aggressively to cater to this trend of integrating multiple functions, reducing the size of components needed for operation and lowering IC power consumption. Dedicated semiconductor foundries need to achieve this process improvement and at the same time develop multiple process technologies to satisfy the varying needs of computer, communication and consumer products. We believe our superior process technologies will enable us to continue to offer our customers significant performance benefits for their products, faster time-to-market production, cost savings and other competitive advantages.

We provide high quality service based on our performance. In today’s marketplace, we believe it is important to make available not only the most manufacturable processes, but also the best solutions to enable customers to design integrated circuits that include entire systems on a chip. Through these efforts, we intend to be the foundry solution for SoC customer needs. To achieve this goal, we believe it is necessary to timely develop and offer the intellectual property and design support that customers need to ensure their specific design blocks work with the other design blocks of the integrated circuit system in the manner intended. Accordingly, we have a dedicated intellectual property and design support team which focuses on timely development of the intellectual property and process specific design blocks our customers need in order to develop products that operate and perform as intended. Our design service team actively cooperates with our customers and vendors of cell libraries and intellectual property offerings to identify, early in the product/market cycle, the offerings needed to ensure that these coordinated offerings are available to our customers in silicon verified form in a streamlined and easy-to-use manner. As a result, we are able to ensure the timely delivery of service offerings from the earliest time in the customer design cycle, resulting in a shorter time-to-volume production. We also provide our customers with real-time online access to their confidential production data, resulting in superior communication and efficiency. We further address our customers’ needs using our advanced technology and proven methodology to achieve fast cycle time, high yield, production flexibility and close customer communication. For example, we select and configure our clean rooms and equipment and develop our processes to maximize the flexibility in meeting and adapting to rapidly changing customer and industry needs. As a result, our cycle time, or the period from customer order to wafer delivery, and our responsiveness to customer request changes are among the fastest in the dedicated foundry industry. We also provide high quality service and engineering infrastructure.

Our production capacity is comparable to that of certain largest companies in the semiconductor industry, and we believe our leading edge and high volume capability is a major competitive advantage.

Our technology and service have attracted two principal types of foundry industry customers: fabless design companies and integrated device manufacturers. Fabless design companies design, develop and distribute proprietary semiconductor products but do not maintain internal manufacturing capacity. Instead, these companies depend on outside manufacturing sources. Integrated device manufacturers, in contrast, traditionally have integrated internally all functions—manufacturing as well as design, development, sales and distribution.

Our primary customers, in terms of our sales revenues, include premier integrated device manufacturers, such as Texas Instruments, Intel Mobile and STMicroelectronics, and leading fabless design companies, such as Xilinx, Broadcom, MediaTek, Realtek and Novatek. In 2012, our company's top ten customers accounted for 64.5% of our net operating revenues. We believe our success in attracting these customers is a direct result of our commitment to high quality service and our intense focus on customer needs and performance.

On March 16, 2011, our Board of Directors proposed an offer to the stockholders of Best Elite International Limited, a British Virgin Islands corporation, or Best Elite, to acquire up to an additional 30% equity interest of Best Elite. Hejian is a wholly owned subsidiary of Infoshine, which is a wholly owned subsidiary of Best Elite. Hejian engages in the semiconductor foundry business and owns an 8- inch fab in Suzhou, China. We received approval from the Investment Commission, Ministry of Economic Affairs, Executive Yuan on November 1, 2011, and as of December 31, 2012, we held a 35.03% equity stake in Best Elite, which included the 15.34% equity stake held by the trustee that was originally offered to us in March 2005, plus an additional 19.69% equity stake that was purchased from shareholders pursuant to the March 2011 offer. In order to further integrate and increase our ownership of Best Elite, on April 25, 2012, our Board of Directors proposed a new offer to the shareholders of Best Elite to acquire up to 64.97% of the shares of Best Elite. We received approval from the Investment Commission, Ministry of Economic Affairs, Executive Yuan on December 21, 2012 and acquired an additional 51.85% of the shares of Best Elite which we purchased through the April 25, 2012 offer. As of March 31, 2013, our cumulative ownership in Best Elite was 86.88%.

We and Alpha Wisdom Limited, or AWL, together held 94.79% of UMCJ shares as of December 31, 2009 and UMCJ then delisted from the Jasdaq Securities Exchange in accordance with its listing rules on March 19, 2010. Since not all of the outstanding equity securities of UMCJ were acquired, we initiated certain squeeze-out procedures as provided in the Japanese Companies Act. Pursuant to such procedures, as of the end of 2010, we, together with AWL, owned 100% of UMCJ. On May 19, 2011, we acquired the remaining shares of UMCJ from AWL, and AWL filed for liquidation on August 30, 2011.

On August 21, 2012, our Board of Directors approved the dissolution and liquidation of UMCJ. We decided to close our foundry operations in Japan to focus on our manufacturing facilities in Taiwan and Singapore and reduce operating expenses. We believe that we can still serve our Japanese customers with our manufacturing capacity in Taiwan and Singapore along with our global logistics and customer service networks.

Please refer to "Item 5. Operating and Financial Review and Prospects-B. Liquidity and Capital Resources" for a discussion of our capital expenditures in the past three years and the plan for the current year.

Our Strategy

To maintain and enhance our position as a market leader, we have adopted a business strategy with a focus on a partnership business model designed to accommodate our customers' business needs and objectives and to promote their interests as our partners. We believe that our success and profitability are inseparable from the success of our customers. The goal in this business model is to create a network of partnerships or alliances among integrated device manufacturers, intellectual property and design houses, as well as foundry companies. We believe that we and our partners will benefit from the synergy generated through such long-term partnerships or alliances and the added value to be shared among the partners. The key elements of our strategy are:

Operate as a Customer-Driven Foundry. We plan to operate as a customer-driven foundry. The increasing complexity of 40-nanometer and more advanced technologies has impacted the entire chip industry, as ICs can now be designed with greater gate density and higher performance while incorporating the functions of an entire system. These advanced designs have created a new proliferating market of advanced mobile digital devices such as smart phones, which have decreased in size but greatly increased in functionality. We collaborate closely with our customers as well as partners throughout the entire supply chain, including equipment, electronic design automation tool and intellectual property, or IP, vendors to work synergistically toward each customer's SoC solution. We also possess experience and know-how in system design and architecture to integrate customer designs with advanced process technologies and IP. We believe the result is a higher rate of first-pass silicon success for our SoC solutions. Our customer-driven foundry solutions begin with a common logic-based platform, where designers can choose the process technologies and transistor options that best fit their specific application. From there, technologies such as radio frequency complementary metaloxide-semiconductor, or RF CMOS, and embedded Flash memories can be used to further fine-tune the process for customers' individual needs. Furthermore, as IP has become critical resources for SoCs, our portfolio includes basic design building blocks as well as more complex IP of optimized portability and cost, developed both internally and by third-party partners. With advanced technology, a broad IP portfolio, system knowledge and advanced 300-millimeter manufacturing, we offer comprehensive solutions that help customers deliver successful results in a timely fashion.

Build up Customer-focused Partnership Business Model. We have focused on building partnership relationships with our customers, and we strive to help our customers achieve their objectives through close cooperation. Unlike the traditional buy-and-sell relationship between a foundry and its customers, we believe our partnership business model will help us understand our customers' requirements and, accordingly, better accommodate our customers' needs in a number of ways, such as customized processes and services that optimize the entire value chain (not just the foundry portion) and intellectual property-related support. We believe that this business model will enable us to deliver our products to our customers at the earliest time our customers require for their design cycle, resulting in shorter time-to-market and time-to-volume production. Furthermore, we believe we will render more cost-effective services by focusing our research and development expenditures on the specific requirements of our customers. We believe our partnership business model will help us not only survive a market downturn, but also achieve a better competitive position.

Continue to Focus on High Growth Applications and Customers. We believe one measure of a successful foundry company is the quality of its customers. We focus our sales and marketing on customers who are established or emerging leaders in industries with high growth potential. Our customers include industry leaders such as Broadcom, MediaTek, Realtek, Texas Instruments, and Xilinx. We seek to maintain and expand our relationships with these companies. We strive to demonstrate to these customers the superiority and flexibility of our manufacturing, technology and service capabilities and to provide them with production and design assistance. We are also making efforts to further diversify our customer portfolio in order to maintain a balanced exposure to different applications and different customers. We believe these efforts strengthen our relationships with our customers and enhance our reputation in the semiconductor industry as a leading foundry service provider.

Maintain Our Leading Position in Mass-Producible Semiconductor Technology and Selectively Pursue Strategic Investments in New Technologies. We believe that maintaining and enhancing our leadership in mass-producible semiconductor manufacturing technology is critical to attract and retain customers. Our reputation for technological excellence has attracted both established and emerging leaders in the semiconductor industries who work closely with us on technology development. In addition, we believe our superior processing expertise has enabled us to provide flexible production schedules to meet our customers' particular needs. We plan to continue building internal research and development expertise, to focus on process development and to establish alliances with leading and specialty semiconductor companies to accelerate access to next-generation and specialized technologies. For example, we introduced our 28-nanometer technology to customers in 2011 to significantly increase the competitive advantages of our customers by providing better device performance in a smaller die size. In 2011, we achieved more than 10 customers and tapeouts for our 28-nanometer technology in 2011 and delivered pilot production on this generation to our lead customer. We believe our progress in developing more advanced process technologies has benefited our customers in the fields of computers, communications, consumer electronics and others with special preferences in certain aspects of the products, such as the ultimate performance, density and power consumption.

We also recognize that every company has limited resources and that the foundry industry is ever-evolving. Accordingly, we believe we should invest in new research and development technology intelligently and in a cost-effective manner to achieve the ultimate output of the resulting technology. In doing so, we balance the rate of return of our research and development with the importance of developing a technology at the right time to enhance our competitive edge without unduly diluting our profitability. We intend to avoid investments in technologies that do not present a commercial potential for volume production. We believe that to develop the earliest and most advanced semiconductor technology without regard to its potential for near term volume production may prove costly to our operations and would not strengthen our competitive position. We perceive a benefit to defer investment in the premature equipment needed to claim the earliest advanced technology and instead to purchase a more advanced and less expensive version of equipment from vendors who design such equipment based on pre-production lessons learned from the earliest technology.

Maintain Scale and Capacity Capabilities to Meet Customer Requirements, with a Focus on 12-inch Wafer Facilities for Future Expansion. We believe that maintaining our foundry capacity with advanced technology and facilities is critical to the maintenance of our industry leadership. Our production capacity is currently among the largest of all semiconductor foundries in the world. We intend to increase our 12-inch wafer production capacity to meet the needs of our customers and to fully capitalize on the expected growth of our industry. We expect our future capacity expansion plans will focus on 12-inch wafer facilities in order to maintain our technology leadership. 12-inch wafers offer manufacturing advantages over 8-inch wafers due to, among other reasons, the greater number of chips on each wafer and the advantages only offered on newer 12-inch capable equipment. In addition, 12-inch wafer facilities present a more cost-effective solution in achieving an economic scale of production. We intend to carefully monitor current market conditions in order to optimize the timing of our capital spending.

B. Business Overview

Manufacturing Facilities

To maintain a leading position in the foundry business, we have placed great emphasis on achieving and maintaining a high standard of manufacturing quality. As a result, we seek to design and implement manufacturing processes that produce consistent, high manufacturing yields to enable our customers to estimate, with reasonable certainty, how many wafers they need to order from us. In addition, we continuously seek to enhance our production capacity and process technology, two important factors that characterize a foundry's manufacturing capability. Our large production capacity and advanced process technologies enable us to provide our customers with volume production and flexible and quick-to-market manufacturing services. All of our fabs operate 24 hours per day, seven days per week. Substantially all maintenance at each of the fabs is performed concurrently with production.

As a step in our continuing expansion of our manufacturing complex in the Tainan Science Park in southern Taiwan, we completed the construction of our second 300mm fab in Taiwan in May 2009, and moved the equipment into this fab in July 2010.

The following table sets forth operational data of each of our manufacturing facilities as of December 31, 2012.

	Fab 6A	Fab 8A	Fab 8C	Fab 8D	Fab 8E	Fab 8F	Fab 8S	Fab 12A	Fab 12i	UMCJ
Commencement of volume production	1989	1995	1998	2000	1998	2000	2000	2002	2004	1996
Estimated full capacity (1)(2)	37,500 wafers per months	68,000 wafers per months	30,000 wafers per months	31,000 wafers per months	37,500 wafers per months	32,500 wafers per months	29,000 wafers per months	52,801 wafers per months	44,782 wafers per months	20,000 wafers per months
Wafer size	6-inch (150mm)	8-inch (200mm)	8-inch (200mm)	8-inch (200mm)	8-inch (200mm)	8-inch (200mm)	8-inch (200mm)	12-inch (300mm)	12-inch (300mm)	8-inch (200mm)

(1) Measured in stated wafer size.
(2) The capacity of a fab is determined based on the capacity ratings given by manufacturers of the equipment used in the fab, adjusted for, among other factors, actual output during uninterrupted trial runs, expected down time due to set up for production runs and maintenance and expected product mix.

The following table sets forth the size and primary use of our facilities and whether such facilities, including land and buildings, are owned or leased. Our land in the Hsinchu and Tainan Science Parks is leased from the R.O.C. government.

Location	Size (Land/Building) (in square meters)	Primary Use	Land (Owned or Leased)	Building (Owned or Leased)
Fab 6A, 10 Innovation 1st Rd., Hsinchu Science Park, Hsinchu, Taiwan 30076, R.O.C.	27,898/34,609 6-inch wafer production	6-inch wafer production	Leased (expires in December 2026)	Owned
Fab 8A, 3, 5 Li-Hsin 2nd Rd., Hsinchu Science Park, Hsinchu, Taiwan 30078, R.O.C.	43,468/83,699 8-inch wafer production	8-inch wafer production	Leased (expires in March 2014)	Owned
Fab 8C, 6 Li-Hsin 3rd Rd., Hsinchu Science Park, Hsinchu, Taiwan 30078, R.O.C.	24,678/71,427 8-inch wafer production	8-inch wafer production	Leased (expires in March 2016)	Owned
Fab 8D, 8 Li-Hsin 3rd Rd., Hsinchu Science Park, Hsinchu, Taiwan 30078, R.O.C.	8,036/29,181 8-inch wafer production	8-inch wafer production	Leased (expires in March 2016)	Owned
Fab 8E, 17 Li-Hsin Rd., Hsinchu Science Park, Hsinchu, Taiwan 30078, R.O.C.	35,000/76,315 8-inch wafer production	8-inch wafer production	Leased (expires in February 2016)	Owned
Fab 8F, 3 Li-Hsin 6th Rd., Hsinchu Science Park, Hsinchu, Taiwan 30078, R.O.C.	24,180/65,736 8-inch wafer production	8-inch wafer production	Leased (expires in February 2018)	Owned
Fab 8S, 16 Creation 1st Rd., Hsinchu Science Park, Hsinchu, Taiwan 30077, R.O.C.	20,404/65,614 8-inch wafer production	8-inch wafer production	Leased (expires in December 2023)	Owned

Location	Size (Land/Building) (in square meters)	Primary Use	Land (Owned or Leased)	Building (Owned or Leased)
Fab 12A, 18, 20 Nan-Ke 2nd Rd., Tainan Science Park, Sinshih, Tainan, Taiwan 74147, R.O.C.	113,661/350,597 12-inch wafer production	12-inch wafer production	Leased (expires in November 2030)	Owned
Fab 12i, 3 Pasir Ris Drive 12 Singapore 519528	85,737/142,169 12-inch wafer production	12-inch wafer production	Leased (expires in March 2031)	Owned
UMCJ, 1580, Yamamoto, Tateyama-City, Chiba, Japan	385,650/58,600 8-inch wafer production	8-inch wafer production	83% owned, 17% leased (expires in June 2049)	Owned
United Tower, 3 Li-Hsin 2nd Rd., Hsinchu Science Park, Hsinchu, Taiwan 30078, R.O.C.	8,818/85,224 Administration office	Administration office	Leased (expires in March 2014)	Owned
Neihu Rd. office, 8F,68.Sec. 1,Neihu Rd., Taipei Taiwan 11493, R.O.C.	626/4,817 Administration office	Administration office	Owned	Owned
Testing Building, 1, Chin-Shan, St. 7, Hsinchu, Taiwan 30080, R.O.C.	10,762/41,318 Leased to several companies	Leased to several companies	Owned	Owned
R&D Building, 18 Nan-Ke 2nd Rd., Tainan Science Park, Sinshih, Tainan, Taiwan 74147, R.O.C.	42,000/47,501 Research and development	Research and development	Leased (expires in December 2023)	Owned
Nexpower, No.2, Houke S.Rd., Houli District, Taichung, Taiwan 42152, R.O.C.	94,016/82,699 Solar PV modules production	Solar PV modules production	Leased (expires in December 2026)	Owned
Topcell, No. 1560, Sec. 1 Zhongshan Rd., Guanyin Township,Taoyuan, Taiwan 32852, R.O.C.	16,873/35,643 6-inch cell production	6-inch cell production	Leased (expires in March 2018)	Leased (expires in March 2018)

Process Technology

Process technology is a set of specifications and parameters that we implement for manufacturing the critical dimensions of the patterned features of the circuitry of semiconductors. Our process technologies are currently among the most advanced in the foundry industry. These advanced technologies have enabled us to provide flexible production schedules to meet our customers' particular needs.

The continued enhancement of our process technologies has enabled us to manufacture semiconductor devices with smaller geometries, allowing us to produce more dice on a given wafer. We pioneered the production of semiconductor products with 0.25 and 0.18 micron process technology in 1997 and 1999, respectively, and used copper interconnect metallurgic to allow better reliability and higher conductibility than traditional aluminum interconnects. We began volume production using 0.13-micron process technology in 2002. Our extensive experience in the 0.13-micron process technology has helped smooth our transition to 90-nanometer pilot production. Our 90-nanometer process marks further advance in our technology achievements, incorporating up to nine copper metal layers, triple gate oxide and other advanced features and using chrome-less phase-shift masks. This technology has been in volume production since the second quarter of 2004 after passing several product certifications. In 2005, our research and development teams continued to work closely with the manufacturing staff to finalize our 90-nanometer technology portfolio. These collaborative efforts, performed in our best-in-class 300mm facilities, contributed to the improvement of high density 6T-SRAM yield to the maturity level of more than 90%. Our accomplishments led to multiple design awards followed by first silicon success, including a PC graphic IC and the world's first 90-nanometer Wireless Local Area Network (WLAN) RF chip featuring a unique and specially developed inductor scheme. In addition, we were able to develop, within 6 months, several customized 90-nanometer processes tailored to our customers' device specifications, and demonstrated product success by delivering record high yield for the first product lots. Our first fully-functional 65-nanometer wireless digital baseband customer IC was produced in July of 2005, after only a year since this research and development project began at this facility.

Since the third quarter of 2006, we have begun the mass production of a next-generation 65-nanometer FPGA product, which features a 65% logic capacity increase over previous generation of FPGAs with triple gate oxide and 11 copper metal layers. Our 65/55- nanometer development team is not only independently developing our technologies in-house but is also bringing up customized process technologies to match customer specific needs. Furthermore, our 45/40-nanometer process technologies, which are jointly developed by us and our strategic partners have been in production since the first half of 2009, significantly increasing the competitive advantages of our customers by providing better device performance in a smaller die size. UMC's 28nm process technology is developed for applications that require the highest performance process technology. In October 2008, we were the first foundry to deliver fully functional 28nm SRAM chips, and have proven in customer silicon the High-k/metal gate solution used for this technology node. UMC's 28nm progress was also recognized by the industry with the foundry being selected to present at the 2009 IEDM on a hybrid High-k/metal gate approach. Currently, we are already working with several customers to adopt their products on UMC's 28nm technology.

The table below sets forth our actual process technology range, categorized by line widths, or the minimum physical dimensions of the transistor gate of integrated circuits in production by each fab, in 2012, and the estimated annual full capacity of each fab, actual total annual output and capacity utilization rates in 2010, 2011 and 2012:

Fab	Years of Commencement of Operation	Year ended December 31, 2012 Range of Process Technologies (in microns)	Years Ended December 31, 2010	2011	2012
			(in thousands of 8-inch wafer equivalents, except percentages		
Fab 6A	1989	0.5	332	303	271
Fab 8A	1995	0.5 to 0.25	816	813	815
Fab 8C	1998	0.35 to 0.13	366	359	360
Fab 8D	2000	0.13 to 0.09	314	364	371
Fab 8E	1998	0.5 to 0.18	410	469	449
Fab 8F	2000	0.18 to 0.13	387	388	389
Fab 8S	2000	0.18 to 0.13	303	307	348
Fab 12A	2002	0.18 to 0.028	842	1,128	1,304
Fab 12i	2004	0.13 to 0.040	1,022	1,192	1,207
UMCJ	1996	0.35 to 0.15	240	240	240
Total estimated capacity	—	—	5,031	5,563	5,754
Total output (actual)	—	—	4,713	4,370	4,533
Average capacity utilization	—	—	93.7%	78.6%	78.8%

The table below sets forth a breakdown of number and percentage of wafer output by process technologies in 2010, 2011 and 2012.

Technology	Years Ended December 31, 2010		2011		2012	
	(in thousands of 8-inch wafer equivalents, except percentages)					
40 nanometers and under	65	1.3%	159	3.6%	349	7.7%
65 nanometers	696	14.8	980	22.4	1,296	28.6
90 nanometers	584	12.4	333	7.6	225	5.0
0.13 micron	997	21.2	1,049	24.0	799	17.6
0.15 micron	367	7.8	134	3.1	112	2.5
0.18 micron	611	13.0	510	11.7	432	9.4
0.25 micron	144	3.0	165	3.8	176	3.9
0.35 micron	766	16.3	621	14.2	742	16.4
0.50 micron or higher	483	10.2	419	9.6	402	8.9
Total	4,713	100.0%	4,370	100.0%	4,533	100.0%

Capacity and Utilization

The fabs in Taiwan that we own directly are named Fab 6A, Fab 8A, Fab 8C, Fab 8D, Fab 8E, Fab 8F and Fab 8S, all of which are located in the Hsinchu Science Park in Taiwan, and Fab 12A, which is located in the Tainan Science Park in Taiwan. The fab in Singapore is named Fab 12i. The fab in Japan is named UMCJ.

Our average capacity utilization rate was 93.7% in 2010, 78.6% in 2011, and 78.8% in 2012.

Equipment

Considering the performance and productivity of our manufacturing capability highly rely on the quality of our capital equipment, we generally purchase equipment that cannot only meet the demand of our existing process technology, but also has the capability to be upgraded to match our future needs. The principal equipment we use to manufacture semiconductor devices are scanners/steppers, cleaners and track equipment, inspection equipment, etchers, furnaces, wet stations, strippers, implanters, sputters, CVD equipment, probers, testers and so on. We own all of the production equipment except for a few demonstration tools.

Our policy is to purchase high-quality equipment that demonstrates stable performance from vendors with dominate market share to ensure our continued competitiveness in the semiconductor field.

Some of the equipment is available from a limited number of qualified vendors and/or is manufactured in relatively limited quantities, and some equipment has only recently been developed. We believe that our relationships with equipment suppliers are strong enough that we can leverage our position as a major purchaser to purchase equipment on better terms, including shorter lead time, than the terms received by several other foundries.

Although we face the challenge of procuring the right equipment in sufficient quantity necessary for ramp-up or expansion of our fabrication facilities under constraint of short lead times, we have not in the past experienced any material problems in procuring the latest generation equipment on a timely basis even in periods of unpredictably high market demand. We manage the risks in the procurement process through timely internal communications among different divisions, efficient market information collection, early reservation of appropriate delivery slots and constant communications with our suppliers as well as by utilizing our good relationships with the vendors.

Raw Materials

Our manufacturing processes use many raw materials, primarily silicon wafers, chemicals, gases and various types of precious sputtering targets. These raw materials are generally available from several suppliers. Our policy with respect to raw material purchases, similar to that for equipment purchases, is to select only a small number of qualified vendors who have demonstrated quality and reliability on delivery time of the raw materials. We may have any long-term supply contracts with our vendors if necessary.

Our general inventory policy is to maintain sufficient stock of each principal raw material for production and rolling forecasts of near-term requirements received from customers. In addition, we have agreements with several key material suppliers under which they hold similar levels of inventory in their warehouses for our use. However, we are not under any obligation to purchase raw material inventory that is held by our vendors for our benefit until we actually order it. We typically work with our vendors to plan our raw material requirements on a quarterly basis, with indicative pricing generally set on a quarterly basis. The actual purchase price is generally determined based on the prevailing market conditions. In the past, prices of our principal raw materials have not been volatile to a significant degree. Although we have not experienced any shortage of raw materials that had a material effect on our operations, and supplies of raw materials we use currently are adequate, shortages could occur in various critical materials due to interruption of supply or an increase in industry demand.

The most important raw material used in our production processes is silicon wafer, which is the basic raw material from which integrated circuits are made. The principal makers for our wafers are Shin-Etsu, Siltronic AG, MEMC Corporation and Sumco Group. We have in the past obtained and believe that we will continue to be able to obtain a sufficient supply of silicon wafers. We believe that we have close working relationships with our wafer suppliers. Based on such long-term relationships, we believe that these major suppliers will use their best efforts to accommodate our demand.

We use a large amount of water in our manufacturing process. We obtain water supplies from government-owned entities and recycle approximately 85% of the water that we use during the manufacturing process. We also use substantial amounts of dual loop electricity supplied by Taiwan Power Company in the manufacturing process. We maintain back-up generators that are capable of providing adequate amounts of electricity to maintain the required air pressure in our clean rooms in case of power interruptions. We believe our back-up devices are adequate in preventing business interruptions caused by power outages and emergency situations.

Quality Management

We believe that our advanced process technologies and reputation for high quality and reliable services and products have been important factors in attracting and retaining leading international and domestic semiconductor companies as customers.

We structure our quality management system in accordance with the latest international quality standards and our customers' strict quality and reliability requirements. Our quality management system incorporates comprehensive quality control programs into the entire business flow of foundry operation including, among others, new process development management, production release control, incoming raw material inspection, statistical process control and methodology development, process change management, technical documentation control, product final inspection, metrology tool calibration and measurement system analysis, quality audit program, nonconformity management, customer complaint disposition, eight-discipline problem solving and customer satisfaction monitoring.

We set a high quality goal to ensure consistent high yielding and reliable product performance. Our quality program is continually enhanced through top-down annual Business Policy Management and bottom-up Total Quality Management activities. In addition, our efforts to observe best practices among fabs in the foundry industry have also contributed to the improvement of our overall quality management system.

Many of our customers perform physical production site qualification process in the early development phase and routine quality conformance audits in the volume production phase. These audits include both quality system review and physical fabrication area inspection for verification of conformity with the international quality standard and customers' quality requirement. Our quality management system and quality control programs have been qualified and routinely audited by numerous customers who are recognized as world-class semiconductor companies with best-in-class quality standards.

Our Quality Assurance Division and Reliability Technology and Assurance Division collaborate to provide quality and reliability performance to customers. With our wafer processing quality and reliability conformance monitor program, we monitor the product quality and reliability at various stages of the entire manufacturing process before shipment to customers.

All our fabs are certified in compliance with ISO/TS 16949 and QC080000 IECQ HSPM standards. ISO/TS 16949 sets the criteria for developing a fundamental quality management system emphasizing on customer satisfaction in quality management, continual improvement, defect prevention and variation and waste reduction. QC080000 IECQ HSPM sets the criteria for developing a process management system for hazardous substances and focuses on developing environmentally friendly manufacturing processes. We are committed to continuously improve our quality management system and to deliver high quality product to our customers.

Services and Products

We primarily engage in wafer fabrication for foundry customers. To optimize fabrication services for our customers, we work closely with them as they finalize circuit design and contract for the preparation of masks to be used in the manufacturing process. We also offer our customers turnkey services by providing subcontracted assembly and test services. We believe that this ability to deliver a variety of foundry services in addition to wafer fabrication enables us to accommodate the needs of a full array of integrated device manufacturers, system companies and fabless design customers with different in-house capabilities.

Wafer manufacturing requires many distinct and intricate steps. Each step in the manufacturing process must be completed with precision in order for finished semiconductor devices to work as intended. The processes require taking raw wafers and turning them into finished semiconductor devices generally through five steps: circuit design, mask tooling, wafer fabrication, assembly and test. The services we offer to our customers in each of these five steps are described below.

Circuit Design. At this initial design stage, our engineers generally work with our customers to ensure that their designs can be successfully and cost-effectively manufactured in our facilities. We have assisted an increasing number of our customers in the design process by providing them with access to our partners' electronic design analysis tools, intellectual property and design services as well as by providing them with custom embedded memory macro-cells. In our Silicon Shuttle program, we offer customers and intellectual property providers early access to actual silicon samples with their desired intellectual property and content in order to enable early and rapid use of our advanced technologies. The Silicon Shuttle program is a multi-chip test wafer program that allows silicon verification of intellectual property and design elements. In the Silicon Shuttle program, several different vendors can test their intellectual property using a single mask set, greatly reducing the cost of silicon verification for us and the participating vendors. The high cost of masks for advanced processes makes this program attractive to intellectual property vendors. ARM Limited, Faraday Technology Corp., or Faraday Technology, MIPS Technologies International, Virage Logic Corporation (acquired by Synopsys) and Synopsys Inc. have utilized our Silicon Shuttle program. In our Alliance Program, we coordinate with leading suppliers of intellectual property, design and ASIC services to ensure their offerings are available to our customers in an integrated, easy to use manner which matches customers' need to our technologies. With a view to lowering customer design barriers, we expanded our design support functions from conventional design support to adding intellectual property development to complement third-party intellectual properties and to provide customers with the widest range of silicon-verified choices. Our offerings range from design libraries to basic analog mixed-mode intellectual properties which, together, have helped shorten our customer's design cycle time.

Mask Tooling. Our engineers generally assist our customers to design and/or obtain masks that are optimized for our advanced process technologies and equipment. Actual mask production is usually provided by independent third parties specializing in mask tooling.

Wafer Fabrication. As described above, our manufacturing service provides all aspects of the wafer fabrication process by utilizing a full range of advanced process technologies. During the wafer fabrication process, we perform procedures in which a photosensitive material is deposited on the wafer and exposed to light through the mask to form transistors and other circuit elements comprising a semiconductor. The unwanted material is then etched away, leaving only the desired circuit pattern on the wafer. As part of our wafer fabrication services, we also offer wafer probing services, which test, or probe, individual die on the processed wafers and identify dice that fail to meet required standards. We prefer to conduct wafer probing internally to obtain speedier and more accurate data on manufacturing yield rates.

Assembly and Testing. We offer our customers turnkey services by providing the option to purchase finished semiconductor products that have been assembled and tested. We outsource assembly and test services to leading assembly and test service providers, including Siliconware Precision Industries Co., Ltd., or Siliconware, and Advanced Semiconductor Engineering Inc. in Taiwan. After final testing, the semiconductors are shipped to our customers' designated locations.

Customers and Markets

Our primary customers, in terms of our sales revenues, include premier integrated device manufacturers, such as Texas Instruments, Intel Mobile and STMicroelectronics, and leading fabless design companies, such as Xilinx, Broadcom, MediaTek, Realtek and Novatek. Although we are not dependent on any single customer, a significant portion of our net operating revenues have been generated from sales to a few customers. Our top ten customers accounted for approximately 64.5% of our net operating revenues in 2012. Set forth below is a geographic breakdown of our operating revenues in 2010, 2011 and 2012 by the location of our customers.

Region	Years Ended December 31, 2010	2011	2012
Taiwan	33.6%	33.1%	36.4%
Singapore	28.8	24.8	27.7
China (includes Hong Kong)	3.4	4.2	5.3
Japan	2.1	1.9	2.5
USA	16.9	17.9	13.3
Others	15.2	18.1	14.8
Total	100.0%	100.0%	100.0%

We believe our success in attracting these end customers is a direct result of our commitment to high quality service and our intense focus on customer needs and performance. Because we are an independent semiconductor foundry, most of our operating revenue is generated by our sales of wafers. For 2012, net wafer sales represents 91.1% of our net operating revenue, and excludes revenue from testing, mask and other services. The following table presents the percentages of our net wafer sales by types of customers during the last three years.

Customer Type	Years Ended December 31, 2010	2011	2012
Fabless design companies	78.1%	75.8%	83.6%
Integrated device manufacturers	21.9	24.2	16.4
Total	100.0%	100.0%	100.0%

We focus on providing a high level of customer service in order to attract customers and maintain their ongoing loyalty. Our culture emphasizes responsiveness to customer needs with a focus on flexibility, speed and accuracy throughout our manufacturing and delivery processes. Our customer-oriented approach is especially evident in two types of services: customer design development services and manufacturing services. We believe that our large production capacity and advanced process technology enable us to provide better customer service than many other foundries through shorter turn-around time, greater manufacturing flexibility and higher manufacturing yields.

We work closely with our customers throughout the design development and prototyping processes. Our design support team closely interacts with customers and intellectual property vendors to facilitate the design process and to identify their specific requirements for intellectual property offerings. We are responsive to our customers' requirements in terms of overall turn-around time and production time-to-market by, for example, helping our customers streamline their IP offering processes and delivering prototypes in a timely and easy-to-use fashion. We also maintain flexibility and efficiency in our technical capability and respond quickly to our customers' design changes.

For IP offerings, we work with several leading IP vendors from digital, memory and analog fields in the semiconductor industry, such as Faraday Technology Corp., Synopsys Inc., ARM Limited, Silicon Image Inc. Sidense Corp., and Kilopass Technology, to deliver quality IP blocks that have been silicon validated using our advanced processes. Our alliance programs with major electronic design automation vendors, such as Cadence, Magma, Mentor and Synopsys Inc., provide our customers with digital/analog reference design procedures and easy-to-use design solutions. By continuously enhancing our IP offerings, reference design procedures and design services through collaboration with major vendors, we aim to provide complete, accurate and user-friendly design solutions to our customers.

As a design moves into manufacturing production, we continue to provide ongoing customer support through all phases of the manufacturing process. The local account manager works with our customer service representative to ensure the quality of our services, drawing upon our marketing and customer engineering support teams as required.

We offer an online service, "MyUMC", which gives our customers easy access to our foundry services by providing a total online supply chain solution. MyUMC offers 24-hour access to detailed account information such as manufacturing, engineering and design support documents through each customer's own customized start page. The features that are available to customers through MyUMC include (i) viewing the status of orders from the start of production to the final shipping stages; (ii) designing layouts to shorten customers' tape out time; (iii) collecting customer engineering requests; (iv) gathering and downloading documents for design purposes and (v) and accessing online in real-time the same manufacturing data used by our fab engineers. In addition, we have a system-to-system connecting services to provide direct data exchange between our system and our customers' systems. These services, which include our "UMC Design View Room Cloud Service", facilitate our design collaborations with our customers to help reduce the cost of chip designs and reduce the time to market. In order to continue to improve our information security management, our Information Technology Division received the certification of ISO/IEC 27001:2005 in March 2008.

We price our products on a per die or per wafer basis, taking into account the complexity of the technology, the prevailing market conditions, the order size, the cycle time, the strength and history of our relationship with the customer and our capacity utilization. Our main sales office is located in Taiwan, which is in charge of our sales activities in Asia. United Microelectronics (Europe) BV, our wholly-owned subsidiary based in Amsterdam, assists our sales to customers in Europe. Our sales in North America are made through UMC Group (USA), our subsidiary located in Sunnyvale, California.

We typically designate a portion of our wafer manufacturing capacity to some of our customers primarily under two types of agreements: reciprocal commitment agreements and deposit agreements. Under a reciprocal commitment agreement, the customer agrees to pay for, and we agree to supply, a specified capacity at a specified time in the future. Under a deposit agreement, the customer makes in advance a cash deposit for an option on a specified capacity at our fabs for a stated period of time. Option deposits are credited to wafer purchase prices as shipments are made. If this customer does not use the specified capacity, it will forfeit the deposit but, in certain circumstances and with our permission, the customer may arrange for a substitute customer to utilize such capacity. In some cases, we also make available capacity to customers under other types of agreements, such as capacity commitment arrangements with technology partners.

We advertise in trade journals, organize technology seminars, hold a variety of regional and international sales conferences and attend a number of industry trade fairs to promote our products and services. We also publish a corporate newsletter for our customers.

Competition

The worldwide semiconductor foundry industry is highly competitive, particularly during periods of overcapacity and inventory correction. We compete internationally and domestically with dedicated foundry service providers as well as with integrated device manufacturers and final product manufacturers which have in-house manufacturing capacity or foundry operations. Some of our competitors have substantially greater production, financial, research and development and marketing resources than we have. As a result, these companies may be able to compete more aggressively over a longer period of time than we can. In addition, several new dedicated foundries have commenced operations and compete directly with us. Any significant increase in competition may erode our profit margins and weaken our earnings.

We believe that our primary competitors in the foundry services market are Taiwan Semiconductor Manufacturing Company Limited, Semiconductor Manufacturing International (Shanghai) Corporation and Globalfoundries Inc., as well as the foundry operation services of some integrated device manufacturers such as IBM, Samsung, Intel and Toshiba. Other competitors such as DongbuAnam Semiconductor, Grace Semiconductor Manufacturing Corp., X-FAB Semiconductors Foundries AG and Silterra Malaysia Sdn. Bhd. have initiated efforts to develop substantial new foundry capacity, although much of such capacity involves less cost-effective production than the 12-inch fabs for which we possess technical know-how. New entrants in the foundry business are likely to initiate a trend of competitive pricing and create potential overcapacity in legacy technology. The principal elements of competition in the semiconductor foundry industry include technical competence, production speed and cycle time, time-to-market, research and development quality, available capacity, manufacturing yields, customer service and price. We believe that we compete favorably with the new competitors on each of these elements, particularly our technical competence and research and development capabilities.

Intellectual Property

Our success depends in part on our ability to obtain patents, licenses and other intellectual property rights covering our production processes and activities. To that end, we have acquired certain patents and patent licenses and intend to continue to seek patents on our production processes. As of December 31, 2012, we held 3,930 U.S. patents and 6,275 patents issued outside of the United States.

Our ability to compete also depends on our ability to operate without infringing on the proprietary rights of others. The semiconductor industry is generally characterized by frequent claims and litigation regarding patent and other intellectual property rights. As is the case with many companies in the semiconductor industry, we have from time to time received communications from third parties asserting patents that allegedly cover certain of our technologies and alleging infringement of certain intellectual property rights of others. We expect that we will receive similar communications in the future. Irrespective of the validity or the successful assertion of such claims, we could incur significant costs and devote significant management resources to the defense of these claims, which could seriously harm our company. See “Item 3. Key Information—D. Risk Factors—Our inability to obtain, preserve and defend intellectual property rights could harm our competitive position.”

In order to minimize our risks from claims based on our manufacture of semiconductor devices or end-use products whose designs infringe on others' intellectual property rights, we in general accept orders only from companies that we believe enjoy satisfactory reputation and for products that are not identified as risky for potential infringement claims. Furthermore, we obtain indemnification rights from customers. We also generally obtain indemnification rights from equipment vendors to hold us harmless from any losses resulting from any suit or proceedings brought against our company involving allegation of infringement of intellectual property rights on account of our use of the equipment supplied by them.

We have entered into various patent cross-licenses with major technology companies, including a number of leading international semiconductor companies, such as IBM and LSI. Our cross licenses may have different terms and expiry dates. Depending upon our competitive position and strategy, we may or may not renew our cross licenses and further, we may enter into different and/or additional technology and/or intellectual property licenses in the future.

Research and Development

We spent NT$8,740 million, NT$9,395 million and NT$9,787 million (US$337 million) in 2010, 2011, and 2012, respectively, on research and development, which represented 6.9%, 8.0% and 8.5% respectively, of our net operating revenues for these periods. Our research and development efforts are mainly focused on delivering SoC foundry solutions that consist of the world's leading process technologies, customer support services and manufacturing techniques. These resources provide our foundry customers with improved opportunities to develop SoC products that supply the global market. Our commitment to research and development can be illustrated by our 2012 research and development expenditures, which reached approximately 8.5% of net operating revenues. In June 2007, we completed the construction of a research and development center for nanometer technologies in the Tainan Science Park. The research and development center allows for seamless application of advanced process technology in the research and development phase to the manufacturing phase.

As of March 31, 2013, we employed 1,127 professionals in our research and development activities. In addition, other management and operational personnel are also involved in research and development activities but are not separately identified as research and development professionals.

Our Investments

Depending on the market conditions, we intend to gradually reduce our investments through exchangeable bond offerings and other measures available to our company.

In December 2009, we issued two tranches of zero coupon exchangeable bonds due 2014. The two exchangeable bond offerings consist of $127.2 million bonds exchangeable into common shares of Unimicron Technology Corporation, or Unimicron, and $80 million bonds exchangeable into common shares of Novatek Microelectronics Corp., Ltd., or Novatek. As of December 31, 2011, no bonds had been exchanged into common shares of Unimicron and Novatek, respectively. As of December 31, 2012, certain bondholders have exercised their rights to exchange their bonds with the total principal amount of US$43 million into Novatek shares. Gains arising from the exercise of exchange rights during the year ended December 31, 2012 amounted NT$1,522 million (US$52 million) and was recognized as gain on disposal of investment.

In 2010, we sold 96 million common shares of Mega Financial Holding Company for NT$1,903 million.

In 2011, we sold 1 million, 1 million, 6 million, 5 million and 7 million common shares of Maxlinear, Inc., Alpha & Omega Semiconductor Ltd., Coretronic Corp., Epistar Corp., and Davicom Semiconductor , Inc. for NT$330 million, NT$305 million, NT$292 million, NT$277 million and NT$205 million, respectively.

In 2012, we sold 33 million, 10 million, 2 million, 2 million, 5 million and 2 million common shares of Novatek Microelectronics Corp., Epistar Corp., Parade Technologies, Ltd., Sandforce, Inc., Pixart Imaging, Inc. and Simplo Technology Co., Ltd. for NT$3,490 million (US$120 million), NT$671 million (US$23 million), NT$549 million (US$19 million), NT$498 million (US$17 million), NT$448 million (US$15 million) and NT$360 million (US$12 million), respectively.

Environmental, Safety and Health Matters

UMC implemented extensive ESH management systems since 1996. These systems enable our operations to identify applicable ESH regulations, assist in evaluating compliance status and timely establish loss preventive and control measures. The systems we implemented in all our fabs have been certified as meeting the ISO 14001 and OHSAS 18001 standards. ISO 14001 consists of a set of standards that provide guidance to the management of organizations to achieve an effective environmental management system. Procedures are established at manufacturing locations to ensure that all accidental spills and discharges are properly addressed. OHSAS 18001 is a recognizable occupational health and safety management system standard, which may be applied to assess and certify our management systems. Our goal in implementing ISO 14001 and OHSAS 18001 systems is to continually improve our ESH management, comply with ESH regulations and to be a sustainable green foundry. UMC's major ESH policies include:

Environmental Protection Aspects:

- To be an environmentally friendly enterprise characterized by continual improvement with a goal of pollution-free production;
- To incorporate our environmental management system into the general organizational management system;
- To take initiatives to reduce waste production and prevent pollution by introducing and developing environmentally friendly technology for design, production and operation;
- To conserve energy and recycle resources in order to be a model of environmental protection for the international community;
- To fulfill corporate social responsibilities by playing an active role in public and community affairs to improve and protect the environment; and
- To educate employees about environmentally sound ethics and practices.

Safety and Health Aspects:

- To achieve a goal of zero accidents and comply with all applicable safety and regulatory requirements to ensure safety is the top priority for UMC's sustainable development;
- To reinforce best safety and health management practice to reach international ESH and risk management standards;
- To adopt risk control advanced ESH management and rescue technologies to enhance company's standards;
- To provide safe work environment and operation through preventive management and audit;
- To eliminate hazard factors and prevent incidents through each and every ownership of responsibilities in safety and health; and
- To encourage all employees to actively participate in safety and health training and promotional activities.

As a member of the global community and a semiconductor industry leader, we have implemented measures to deal with environmental problems and mitigate climate change. We have introduced green concepts in our operations, including green commitment, management, procurement, production, products, recycling, office, education and marketing.

In order to conquer the green barrier formed by the RoHS (the Restriction of the Use of Certain Hazardous Substances in Electrical and Electronic Equipment) Directive, we established a cross-division HSPM (Hazardous Substances Process Management) committee to manage all development and implementation of related work. We completed the final system audit for QC 080000 ICEQ HSPM qualification, a certification for having a hazardous substance process management system that meets the RoHS Directive, on June 9, 2006 and became the first semiconductor manufacturer worldwide to achieve HSPM certification for all fabs. In 2009, we completed the report on the carbon footprint verification for integrated circuit wafers produced at our facilities, the first such report in the foundry industry. In 2010, UMC completed water footprint verification for our 200 mm and 300 mm wafers. These verifications provide scientific and reliable statistics on the carbon and water information of products manufactured in our fabs as well as self-reviews of environmental impact.

With respect to safety and health management, we realized that lowering the risks in equipment and processes can reduce accidents, but cannot guarantee the safety of all employees. In order to achieve the goal of “zero-accident”, we intend to promote the concept of “safety is my responsibility”. We have educated the employees with the concepts of “be aware of your own safety well as the safety of others” and “safety is everyone’s responsibility, and my personal accountability.”

Furthermore, we have implemented the FMEA method to foster employees’ capabilities in risk analysis. Therefore, we established a channel for communication to encourage and ensure the employees to fully express their opinions for professional response and assistance. By doing so, we hope to establish a working attitude of “Safety and health first” to further improve the quality of our working environment, and eventually to become a good example of global safety and hygiene management.

The following list sets forth some of the important awards that we received in environmental protection, safety and health.

- Selected as a member of Dow Jones Sustainability Indexes for 5 years since 2008;
- Awarded “Taiwan Green Classics Award” by Taiwan Ministry of Economic Affairs . (2012);
- Awarded “Taiwan Corporate Sustainability Report Award” by Taiwan Institute for Sustainable Energy. (2008-2012);
- Awarded “Enterprises Environmental Award of the Republic of China” by the Environmental Protection Administration of Executive Yuan, R.O.C. (totally 13 times since 2001);
- Awarded “The Best Participation of Green Procurement for Enterprises” by the Environmental Protection Administration of Executive Yuan, R.O.C.(2012);
- Awarded “Workplace Safety & Health Performance Awards- Silver Award” by Ministry of Manpower. (2012); and
- Awarded “Excellent Industrial Safety and Health Executive Organization of Hsinchu Science Park” by The Science Park Administration. (2012).

Climate Change

We hope to contribute to energy saving and carbon reduction through breakthroughs in green technology development and applications and establish our company as a leader in the green technology industry by injecting fresh enthusiasm for sustainable development.

We announced the climate change policy and carbon emission reduction plans on April 22, 2010. The new plans included a reduction of 33% for normalized perfluorinated compounds, or PFC, emissions and 3% for electricity usage by 2012 compared with the base year 2009. Our climate change policies during this post-Kyoto Protocol period includes: (i) achieving carbon neutral status via carbon management, (ii) becoming a comprehensive low-carbon solution provider, and (iii) leveraging corporate resources to cultivate a low-carbon economy.

We were the leader in the foundry industry to complete the replacement of C3F8 with C4F8 in 2011. UMC has made significant progress in reaching the voluntary reduction goals. It was estimated to bring the total relative CO2 emission reduction by approximately 0.55 million tons during 2010 to 2012. Currently, UMC reduces carbon emissions through the following two aspects: 1. UMC continues to implement a greenhouse gas emissions reduction plan to assist customers in establishing a low-carbon supply chain, and 2. UMC continues its research and development in advanced processes to provide low power products and reduce carbon emissions at the consumer level.

We also support timely disclosure of carbon information and ensuring data quality. Since 2006, we have participated in the Carbon Disclosure Project formed by global institutional investors and disclosed our annual greenhouse gas emission volume, reduction goals and results. Moreover, we engage third-party verifiers to ensure the quality of the data. We completed verification on greenhouse gas emission and reduction records during 2000 to 2011 for all of our fabs in Taiwan. We plan to complete the 2012 GHG emissions data verification within this year.

In addition, our environmental efforts include the establishment of our New Business Development Center which promotes a low carbon economy by investing across the entire supply chain of the green technology industry, including renewable energy, solar energy, and new generation LEDs. The New Business Development Center focus its primary investments on the LED and solar energy industries.

Risk Management

Risk and safety matters are administered by our Group's Risk Management and Environmental Safety Health Division, or the GRM & ESH, established in 1998. We are pursuing the goal of a highly protected risk status in the semiconductor industry through the implementation of strict engineering safety procedures, regular enforcement of safety codes and standards, and compliance of detailed industry safety guidelines.

Our hazards risk management slogans are set forth below:

- Uniqueness in risk management,
- Maturity in property loss control; and
- Continuous improvement in BCP.

We have also adopted the Triple Star Ranking System of Chartis Insurance, a global leader in risk management and insurance, since 1999. All fabs have been ranked as top-class following Chartis's risk evaluation and risk improvement recommendations. The ranking system focuses on 20 items, including ten Physical Protection Elements and ten Human Elements. Our latest 12-inch lines, Fab 12A P1/2, 12A P3/4 and 12i, obtained triple-stars in all 20 elements in the very first Triple Star Audit.

We have also implemented proactive efforts in earthquake risk prevention. We believe our efforts contributed to our quick and exemplary recovery from two major earthquakes in Taiwan on September 21, 1999 and March 4, 2010, respectively. Our Hsinchu fabs and Fab 12A in Tainan sustained only minor impact to their operations from the earthquake without interruption to the power system or water service. Normal operations resumed shortly after the incidents.

Besides, we are fully aware of the impact posed by business interruption. We are also devoted in the pursuit of corporate resilience and continuity by committing non-interrupted services to satisfy our valued customers and important stakeholders. In 2011, we announced our Business Continuity Management policy, objective and management organization. In 2012, we follow the most update standard, ISO22301 and established Business Continuity Management System to ensure UMC's ability to minimize any impact from incidents that may affect operation and to provide resilience to the UMC's business continuity with minimal loss.

Insurance

We maintain industrial all risk insurance for our buildings, facilities, equipment and inventories as well as third party properties. The insurance for fabs and their equipment covers losses from physical damage and business interruption up to their respective policy limits except for policy exclusions. We purchase directors and officers liability insurance for our board directors and executive officers, covering the liabilities incurred in relation to his/her/its operation of business and legally responsible for. We also maintain public liability insurance for losses to third parties arising from our business operations. We believe that our insurance arrangement is adequate to cover all major types of losses relevant to the semiconductor industry practice. However, significant damage to any of our production facilities, whether as a result of fire or other causes, could seriously harm our business.

C. Organizational Structure

The following list shows our corporate structure as of December 31, 2012:

Company	Jurisdiction of Incorporation	Percentage of Ownership as of December 31, 2012
UMC Group (USA)	California, U.S.A.	100.00%
United Microelectronics (Europe) B.V.	The Netherlands	100.00%
UMC Capital Corp.	Cayman Islands	100.00%
TLC Capital Co., Ltd.	Taiwan, R.O.C.	100.00%
UMC New Business Investment Corp.	Taiwan, R.O.C.	100.00%
Green Earth Limited	Samoa	100.00%
Fortune Venture Capital Corp.	Taiwan, R.O.C.	100.00%
UMC Japan	Japan	100.00%
UMC Investment (Samoa) Limited	Samoa	100.00%
Unitruth Investment Corp.	Taiwan, R.O.C.	100.00%
UMC Capital (U.S.A)	California, U.S.A.	100.00%
ECP VITA PTE. LTD.	Singapore	100.00%
Soaring Capital Corp.	Samoa	100.00%
Unitruth Advisor (Shanghai) Co., Ltd.	China	100.00%
Tera Energy Development Co., Ltd.	Taiwan, R.O.C.	100.00%
Nexpower Technology Corp.	Taiwan, R.O.C.	57.33%
Wavetek Microelectronics Corporation	Taiwan, R.O.C.	74.69%
Everrich Energy Corp.	Taiwan, R.O.C.	89.38%
Everrich Energy Investment (HK) Limited	China	89.38%
Everrich (Shandong) Energy Co., Ltd.	China	89.38%
Unistars Corp.	Taiwan, R.O.C.	72.04%
Topcell Solar International Co. Ltd.	Taiwan, R.O.C.	69.91%
Smart Energy Enterprises Limited	China	89.38%
Smart Energy ShanDong Corporation	China	89.38%
Wavetek Microelectronics Investment (HK) Limited	China	74.69%
NPT Holding Limited	Samoa	57.33%
NLL Holding Limited	Samoa	57.33%
SOCIALNEX ITALIA 1 S.R.L.	Italy	57.33%
TERA ENERGY USA INC.	U.S.A.	100.00%
UMC (BEIJING) LIMITED	China	100.00%

D. Property, Plants and Equipment

Please refer to "—B. Business Overview—Manufacturing Facilities" for a discussion of our property, plants and equipment.

ITEM 4A. UNRESOLVED STAFF COMMENTS

Not applicable.

ITEM 5. OPERATING AND FINANCIAL REVIEW AND PROSPECTS

Unless stated otherwise, the discussion and analysis of our financial condition and results of operations in this section apply to our financial information as prepared in accordance with R.O.C. GAAP. You should read the following discussion of our financial condition and results of operations together with the consolidated financial statements and the notes to such statements included in this annual report. This discussion may contain forward-looking statements based upon current expectations that involve risks and uncertainties. Our actual results may differ materially from those anticipated in these forward-looking statements as a result of various factors, including those set forth under "Item 3. Key Information-D. Risk Factors" or in other parts of this annual report on Form 20-F. R.O.C. GAAP varies in certain significant respects from U.S. GAAP. These differences and their effects on our financial statements are described in Note 36 to our audited consolidated financial statements included in this annual report.

For the convenience of readers, NT dollar amounts used in this section for, and as of, the year ended December 31, 2012 have been translated into U.S. dollar amounts using US$1.00 = NT$29.05, the noon buying rate as certified for customs purposes by the Federal Reserve Bank of New York on December 31, 2012. The U.S. dollar translation appears in parentheses next to the relevant NT dollar amount.

Overview

We are one of the world's leading independent semiconductor foundries, providing comprehensive wafer fabrication services and technologies to our customers based on their designs.

Cyclicality of the Semiconductor Industry

As the semiconductor industry is highly cyclical, revenues varied significantly over this period. It can take several years to plan and construct a fab and bring it to operations. Therefore, during periods of favorable market conditions, semiconductor manufacturers often begin building new fabs or acquiring existing fabs in response to anticipated demand growth for semiconductors. In addition, after commencement of commercial operations, fabs can increase production volumes rapidly. As a result, large amounts of semiconductor manufacturing capacity typically become available during the same time period. Absent a proportional growth in demand, this increase in supply often results in semiconductor manufacturing overcapacity, which has led to a sharp decline in semiconductor prices and significant capacity under-utilization. Our average capacity utilization rate was 93.7%, 78.6% and 78.8% for the years ended December 31, 2010, 2011 and 2012, respectively. We believe that our results in 2010, 2011 and 2012 reflect the ongoing uncertainty in the global economy, conservative corporate information technology spending and low visibility with respect to end market demand.

Pricing

We price our products on either a per die or a per wafer basis, taking into account the complexity of the technology, the prevailing market conditions, the order size, the cycle time, the strength and history of our relationship with the customer and our capacity utilization. Because semiconductor wafer prices tend to fluctuate frequently, we in general review our pricing on a quarterly basis. As a majority of our costs and expenses are fixed or semi-fixed, fluctuations in our products' average selling prices historically have had a substantial impact on our margins. Our average selling price decreased approximately 3.2% in 2012 compared to 2011, primarily due to nominal price erosion.

We believe that our current level of pricing is comparable to that of other leading foundries in each respective geometry. We believe that our ability to provide a wide range of advanced foundry services and process technologies as well as large manufacturing capacity will enable us to compete effectively with other leading foundries at a comparable price level.

Capacity Utilization Rates

Our operating results are characterized by relatively high fixed costs. In 2010, 2011 and 2012, approximately 61.5%, 63.8% and 65.7%, respectively, of our manufacturing costs consisted of depreciation, a portion of indirect material costs, amortization of license fees and indirect labor costs.

If our utilization rates increase, our costs would be allocated over a larger number of units, which generally leads to lower unit costs. As a result, our capacity utilization rates can significantly affect our margins. Our utilization rates have varied from period to period to reflect our production capacity and market demand. Our average capacity utilization rate was 93.7%, 78.6% and 78.8% for the years ended December 31, 2010, 2011 and 2012, respectively. Utilization rates were primarily affected by global macroeconomic factors. Other factors affecting utilization rates are efficiency in production facilities, product flow management, the complexity and mix of the wafers produced, overall industry conditions, the level of customer orders, mechanical failure, disruption of operations due to expansion of operations, relocation of equipment or disruption of power supply and fire or natural disaster.

Our production capacity is determined by us based on the capacity ratings given by manufacturers of the equipment used in the fab, adjusted for, among other factors, actual output during uninterrupted trial runs, expected down time due to set up for production runs and maintenance, expected product mix and research and development. Because these factors include subjective elements, our measurement of capacity utilization rates may not be comparable to those of our competitors.

Change in Product Mix and Technology Migration

Because the price of wafers processed with different technologies varies significantly, the mix of wafers that we produce is among the primary factors that affect our revenues and profitability. The value of a wafer is determined principally by the complexity and performance of the processing technology used to produce the wafer, as well as by the yield and defect density. Production of devices with higher levels of functionality and performance, with better yields and lower defect density as well as with greater system-level integration requires better manufacturing expertise and generally commands higher wafer prices. The increase in price generally has more than offset associated increases in production cost once an appropriate economy of scale is reached.

Prices for wafers of a given level of technology generally decline over the processing technology life cycle. As a result, we have continuously been migrating to increasingly sophisticated technologies to maintain the same level of profitability. We began our volume production with 90-nanometer and 65-nanometer technologies in 2004 and 2006, respectively. We started 40-nanometer production in the first half of 2009. These types of technology migration require continuous capital and research and development investment. Because developing and acquiring advanced technologies involve substantial capital investment, we expect to continue to spend a substantial amount of capital on upgrading our technologies and capabilities. We introduced our 28-nanometer technology to customers in 2011 to significantly increase the competitive advantages of our customers by providing better device performance in a smaller die size.

Manufacturing Yields

Manufacturing yield per wafer is measured by the number of functional dice on that wafer over the maximum number of dice that can be produced on that wafer. A small portion of our products is priced on a per die basis, and our high manufacturing yields have assisted us in achieving higher margins. In addition, with respect to products that are priced on a per wafer basis, we believe that our ability to deliver high manufacturing yields generally has allowed us to either charge higher prices per wafer or attract higher order volumes, resulting in higher margins.

We continually upgrade our process technologies. At the beginning of each technological upgrade, the manufacturing yield utilizing the new technology is generally lower, sometimes substantially lower, than the yield under the current technology. The yield is generally improved through the expertise and cooperation of our research and development personnel and process engineers, as well as equipment and at times raw material suppliers. Our policy is to offer customers new process technologies as soon as the new technologies have passed our internal reliability tests.

Investments

Most of our investments were made to improve our market position and for strategy considerations, a significant portion of which are in foundry-related companies including fabless design customers, raw material suppliers and intellectual property vendors. In addition, we also invest in non-foundry-related businesses, such as Cathay Financial Holding Co. Ltd. We have established the New Business Development Center to identify and make strategic investments in high growth industries such as solar and LED.

In recent years many developed and developing countries have listed energy saving and carbon reduction as primary administrative policies to tackle the challenge of potential energy shortages in future. Technologies for renewable energy and energy saving are expected to become a focus in future technology development and the growth of green energy related industries is predictable. On August 24, 2009, our Board of Directors approved the establishment of our New Business Development Center and its 100% owned subsidiary, UMC New Business Investment Corporation. We established the New Business Development Center to capitalize on high growth and high profit in potential industries such as solar, light-emitting diode, LED, and semiconductor through timely strategic investment. Although our revenues from the solar and LED section have been adversely affected by short-term market conditions, we believe that the long-term potential of solar and LED sectors still appears promising. We believe that these two sectors have great potential for growth and have invested an additional NT$3 billion to our UMC New Business Investment Corporation in 2011 that was allocated to research and development and capital expenditures for the solar and LED sectors. However, the solar and LED markets were adversely affected by over-supply in 2012, so we focused on improving the operational efficiency of our subsidiaries instead of making additional investments into these subsidiaries. We continue to remain committed to further developing our investments in the solar and LED sectors and believe that such investments will position us well for future growth.

We have from time to time disposed of investments for financial, strategic or other purposes in recent years. See “Item 4. Information on the Company—B. Business Overview—Our Investments” for a description of our investments.

Treasury Share Programs

We have from time to time announced plans, none of which was binding on us, to buy back up to a fixed amount of our shares on the Taiwan Stock Exchange at the price range set forth in the plans. In 2010, 2011, and 2012, we purchased an aggregate of 300 million, nil and nil, respectively, of our shares under these plans. From February 3, 2010 to April 2, 2010, we purchased 300 million of our shares at an average price of NT$16.15 per share to transfer to employees. In addition, on March 13, 2013, the Board of Directors resolved to purchase up to 200 million shares on the Taiwan Stock Exchange at a price between NT$7.80 and NT$16.90 per share during the period from March 14, 2013 to May 13, 2013 to transfer to employees.

Critical Accounting Policies

General

Our discussion and analysis of our financial condition and results of operations are based upon our consolidated financial statements included in the annual report, which have been prepared in accordance with R.O.C. GAAP, which varies in certain respects from U.S. GAAP. These differences and their effects on our financial statements are described in Note 36 to our audited consolidated financial statements included elsewhere in this annual report. The preparation of our consolidated financial statements requires us to make estimates and judgments that affect the reported amounts of assets, liabilities, revenues and expenses, and related disclosure of contingent assets and liabilities. We evaluate our estimates on an ongoing basis and base our estimates on historical experience and on various other assumptions that are believed to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from these estimates under different assumptions or conditions.

We believe the following critical accounting policies involve significant judgments and estimates used in the preparation of our consolidated financial statements.

Revenue Recognition

We recognize revenue when persuasive evidence of an arrangement exists, the product or service has been delivered, the seller's price to the buyer is fixed or determinable and collectability is reasonably assured. Most of our sales transactions have shipping terms of Free Carrier, or FCA, by which title and the risk of loss or damage for the shipment are transferred to the customer upon delivery of the product to a carrier approved by the customer.

Allowance for sales returns and discounts are estimated based on the information of customer complaints, historical experiences, management judgment and any other known factors that might significantly affect collectability. Such allowances are recorded in the same period in which sales are made. Shipping and handling costs are included in sales expenses.

Allowance for Doubtful Accounts

Prior to December 31, 2010, recognition of an allowance for doubtful accounts was based on historical experience in analyzing the aging and determining the collectability of notes, accounts and other receivables as of the balance sheet date. Effective January 1, 2011, we first assess as of balance sheet date whether objective evidence of impairment exists for notes, accounts and other receivables that are individually significant. If there is objective evidence that an impairment loss has occurred, the amount of impairment loss is assessed individually. For notes, accounts and other receivables other than those mentioned above, we group those assets with similar credit risk characteristics and collectively assess them for impairment. If, in a subsequent period, the amount of the impairment loss decreases, and the decrease can be related objectively to an event occurring after the impairment was recognized, the previously recognized impairment loss is reversed and recognized through profit or loss. The reversal shall not result in a carrying amount of notes, accounts and other receivables that exceeds what the amortized cost would have been had the impairment not been recognized at the date the impairment is reversed. Considerable judgment is required in assessing the ultimate realization of these receivables including the current credit worthiness and the past collection history of each customer. A deterioration of economic conditions either in the R.O.C. or in other major overseas markets may contribute to the deterioration of financial conditions of our customers, resulting in an impairment of their ability to make payments.

Inventory

Inventories are accounted for on a perpetual basis. Raw materials are recorded at actual purchase costs, while the work in process and finished goods are recorded at standard costs and subsequently adjusted to costs using the weighted-average method at the end of each month. The cost of work in progress and finished goods comprises raw materials, direct labor, other direct costs and related production overheads. Allocation of fixed production overheads to the costs of conversion is based on the normal capacity of the production facilities. Cost associated with underutilization of capacity is expensed as incurred.

Inventories are valued at the lower of cost and net realizable value item by item. Net realizable value is the estimated selling price in the ordinary course of business less the estimated costs of completion and the estimated costs necessary to make the sale. Net realizable value of the Company's work in progress and finished goods is measured at the contractual sales price less predictable costs of completion, while that of the raw materials is the replacement cost by purchase. Costs of completion include direct labor and overhead, including depreciation and maintenance of production equipment, indirect labor costs, indirect material costs, supplies, utilities and royalties that is expected to be incurred at normal production level. The Company estimates normal production level taking into account the loss of capacity resulting from planned maintenance, based on historical experience and current production capacity.

Inventories are reduced for the estimated losses arising from excess, obsolescence, and the decline in value. This reduction is determined by estimating market value based on future customer demand. The losses on inventory obsolescence are recorded as a part of cost of sales.

Income Taxes

Most of our existing tax benefits arise from investment tax credits, and others from net operating loss carry-forward and temporary differences. We recognize these tax benefits as deferred tax assets. Income tax expense or benefit is recognized when there is a net change in deferred tax assets and liabilities. A valuation allowance is recorded to reduce our deferred tax assets to the extent that we believe it is more likely than not that the tax benefits will not be realized. The assessment of the valuation allowance involves subjective assumptions and estimates as it principally depends on the estimation of future taxable income. If future taxable income is lower than expected due to future market conditions or other reasons or in the event we determine that we will not be able to realize all or part of our net deferred tax assets in the future, an adjustment to our deferred tax assets valuation allowance may be required with the adjusting amount charged to income in this period. Likewise, should future taxable income be higher than expected due to future market conditions or other reasons or in the event we determine that we would be able to realize our deferred tax assets in the future in excess of our net recorded amount, an adjustment to our deferred tax assets valuation allowance would increase income in this period.

Long-lived Assets Impairment

We review the long-lived assets for impairment whenever events or changes in circumstances indicate that the carrying value of the long-lived assets might not be recoverable. Such review may include assessing whether there is a significant decrease in market values of long-lived assets or significant deterioration of market conditions to indicate the carrying value of such assets may not be recovered through future cash flows, any change in the use of long-lived assets to negatively affect their fair values, and any obsolescence issues that would lead to a lower fair value determination. If there is an indication that an asset might be impaired, we proceed with a further impairment test, which is performed for asset groups related to the lowest level of identifiable independent cash flows. We compare the carrying amount with the recoverable amount derived from discounted cash flow analysis to determine whether the asset is impaired and recognize impairment loss to the extent that its carrying amount exceeds its recoverable amount. If there is evidence that impairment losses recognized previously no longer exists, or has diminished, and the recoverable amount of the long-lived assets increases because of an increase in the asset's estimated service potential, the amount of loss may be reversed to the extent that the resulting carrying value should not exceed the carrying value had no impairment loss been recognized in prior years.

Due to our asset usage model and the interchangeable nature of our semiconductor manufacturing capacity, we must make subjective judgments and estimates in determining the independent cash flows that can be related to specific asset groups, including the service potential of long-lived assets through its estimated useful life, cash flow generating capacity, physical output capacity, potential fluctuation of economic cycle in the semiconductor industry and our operating situation.

Goodwill Impairment

Goodwill is subject to impairment tests on an annual basis, or more frequently whenever events occur or circumstances change indicating that goodwill might be impaired. The assessment on impairment of goodwill is subject to significant judgment. Such judgment includes identifying the cash generating unit, or CGU, making assumptions for discounted cash flow analysis to derive the fair value of the CGU and properly assigning relevant assets, liabilities and goodwill to the CGU. Ultimately, we compare the fair value of goodwill to its carrying value and determine the impairment loss, if any. If the relevant assumptions and estimates change in the future, they will impact our goodwill impairment test.

Pension

Under the defined benefit pension plan of the Labor Standards Law, we have significant pension benefit costs and liabilities that are developed from actuarial valuations. Inherent in these valuations are key assumptions including discount rates and expected return on plan assets. We consider current market conditions, including changes in interest rates, in selecting these assumptions. In addition to changes resulting from fluctuations in our related headcount, changes in the related pension costs or liabilities may also occur in the future due to changes in assumptions. Under the defined contribution pension plan of the R.O.C. Labor Pension Act, we are required to make monthly contributions to employees' individual pension accounts and recognize expenses in the periods in which the contributions become due.

Net pension costs of the defined benefit plan are recorded based on an independent actuarial valuation. Pension cost components such as service cost, interest cost, expected return on plan assets, the amortization of net obligation at transition, pension gain or loss, and prior service cost, are all taken into consideration. We recognize expenses from the defined contribution pension plan in the period in which the contribution becomes due.

Investments in Debt and Equity Securities

In accordance with R.O.C. GAAP, equity securities over which we exercise no significant influence or control and with readily determinable fair values and debt securities are to be classified as financial assets at fair value through profit or loss, or FVTPL, available-for-sale or held-to-maturity securities. Debt securities that we have the intent and ability to hold to maturity are classified as held-to-maturity securities and reported at their amortized cost. Debt and equity securities that are bought and traded for short-term profit are classified as FVTPL and reported at fair value, with unrealized gains and losses included in earnings. Debt and equity securities not classified as either held-to-maturity or FVTPL are classified as available-for-sale securities and reported at fair value, with unrealized gains and losses reported in other comprehensive income under stockholders' equity. Unrealized losses that are deemed to be other than temporary are charged to earnings. For individual securities classified as either available-for-sale or held-to-maturity, we consider, among other factors, information concerning significant adverse changes in market conditions in which the investee operates and operating issues specific to the investee in determining whether a decline in value is temporary. In general, we consider a decline in market value below cost for a continuous period of six months to be other than temporary unless there is persuasive evidence to the contrary. If the decline in fair value is judged to be other than temporary, the cost basis of the individual security is written down to fair value with a charge against earnings.

Derivative Instruments

The embedded derivative features contained in exchangeable bonds are bifurcated and separately accounted for if the economic characteristics and risks of the embedded derivative instruments are not clearly and closely related to those of the host contracts. Those bifurcated embedded derivatives are fair valued at the end of each reporting period by using the option pricing model with the changes in fair value included in earnings. The valuation model uses the market-based observable inputs including share price, volatility, credit spread and swap rates.

We also hold certain freestanding derivative instruments such as interest rate swap and forward contracts, which are fair valued at each reporting period end. The fair values of these instruments are determined using market established valuation techniques, which involve certain key inputs such as the expected interest forward rate, expected volatility in interest rates, and spot exchange rate. Any change in such key inputs could materially impact the determination of fair value of these derivative instruments.

Employee Stock Options

Under R.O.C. GAAP, for stock options granted to our employees, we recognize compensation cost using the Black-Scholes option- pricing model in accordance with R.O.C. SFAS No. 39 "Accounting for Share-Based Payment", or R.O.C. SFAS 39. The Black-Scholes option-pricing model requires the use of input assumptions, including expected volatility, expected life, expected dividend rate and expected risk-free rate of return. We applied the historical realized volatility, which calculates volatility based on the historical stock price volatility over the time period equal to the expected term of the employee stock option, in estimating expected volatility because our shares have been publicly traded for a long time. We determined the expected term based on historical stock option exercise data and we used the historical pattern of dividend yield for estimating the expected dividend of the underlying employee stock options. For entities based in jurisdictions outside the United States, the risk-free interest rate is the implied yield of zero-coupon government bonds currently available in the market in which the shares are primarily traded. Hence, we use the average yield of Taiwan Government Bond with the remaining term similar to the expected option term as the risk-free interest rate. We adjust employee stock option expenses on an annual basis for changes in expected forfeitures based on the examination of latest employee stock option forfeiture activity. The effect of adjusting the forfeiture rate used for expense amortization is recognized in the corresponding period in which the expected forfeiture rate is changed.

Transition to IFRSs in 2013

Starting from January 1, 2013, we will prepare consolidated financial statements in accordance with International Financial Reporting Standards ("IFRSs") as issued by the International Accounting Standards Board ("IASB") for our future SEC filing. Our transition date to IFRSs is January 1, 2012. As such, our 2012 consolidated financial statements under IFRSs to be included in our 2013 Form 20-F may be different from the accompanying 2012 consolidated ones prepared based on the R.O.C. GAAP.

A. Operating Results

Net Operating Revenues

We generate our net operating revenues primarily from fabricating semiconductor devices. We also derive a small portion of our net operating revenues from wafer probe services that we perform internally as well as mask tooling services and assembly and test services that we subcontract out.

Cost of Goods Sold

Our costs of goods sold consist principally of:

- overhead, including depreciation and maintenance of production equipment, indirect labor costs, indirect material costs, supplies, utilities and royalties;
- wafer costs;
- direct labor costs; and
- service charges paid to subcontractors for mask tooling, assembly and test services.

Our total depreciation expenses were NT$29,951 million, NT$31,915 million and NT$35,011 million (US$1,205 million) in 2010, 2011 and 2012, respectively.

Operating Expenses

Our operating expenses consist of the following:

- Sales and marketing expenses. Sales and marketing expenses consist primarily of intellectual property development expenses, salaries and related personnel expenses, wafer sample expenses and related marketing expenses. Wafer samples are actual silicon samples of our customers' early design ideas made with our most advanced processes and provided to those customers;
- General and administrative expenses. General and administrative expenses consist primarily of salaries for our administrative, finance and human resource personnel, fees for professional services, and cost of computer and communication systems to support our operations; and

- Research and development expenses. Research and development expenses consist primarily of research testing related expenses, salaries and related personnel expenses and depreciation on the equipment used for our research and development.

Non-operating Income and Expenses

Our non-operating income principally consists of:

- interest income, which has been primarily derived from time deposits;
- investment income accounted for under the equity method, which has been primarily derived from the recognition of investee companies' net income based on the percentage of their ownership we hold;
- gain on disposal of investments, which has been primarily derived from our disposal of long-term investments accounted for under the equity method, available-for-sale financial assets and financial assets measured at cost;
- gain on disposal of property, plant and equipment;
- dividend income, which has been primarily derived from the financial instruments of financial assets at fair value through profit or loss, available-for-sale financial assets and financial assets measured at cost;
- gain on valuation of financial assets and liabilities, which have been primarily derived from disposal of and changes in the values of financial assets and liabilities classified as FVTPL according to R.O.C. SFAS No. 34 "Financial Instruments: Recognition and Measurement", or R.O.C. SFAS 34; and
- other income, which has been primarily derived from our branch's grant income received from the government in Singapore and donation income from our equity investee.

Our non-operating expenses principally consist of:

- loss on valuation of financial assets and liabilities, which have been primarily derived from disposal of and changes in the values of financial assets and liabilities classified as FVTPL according to R.O.C. SFAS 34;
- investment loss accounted for under the equity method, which has been primarily derived from the recognition of investee companies' net loss based on the percentage of their ownership we hold; and
- impairment loss, which have been primarily derived from the loss recognized in long-term investments and long-lived assets.

Taxation

Based on our status as a company engaged in the semiconductor business in Taiwan, we have been granted exemptions from income taxes in Taiwan with respect to income attributable to capital increases for the purpose of purchasing equipment related to the semiconductor business for a period of four or five years following each such capital increase. This tax exemption resulted in tax savings of approximately NT$990 million, NT$292 million and NT$55 million (US$2 million) in 2010, 2011 and 2012, respectively. Our tax rate was 17% in 2012, the same rate applicable to companies outside the Hsinchu Science Park, and the statutory tax rate was changed from 25% to 17% effective January 1, 2010.

We also benefit from other tax incentives generally available to technology companies in Taiwan, including tax credits applicable against corporate income tax that range from 30% to 50% of the amount of certain research and development and employee training expenses and 5% to 20% of the amount of investment in certain qualified equipment and technology. These tax incentives resulted in tax savings of approximately NT$947 million, NT$301 million and NT$343 million (US$12 million) in 2010, 2011 and 2012, respectively.

After taking into account the tax exemptions and tax incentives discussed above, we recorded NT$1,606 million, NT$913 million and NT$2,129 million (US$73 million) of tax expenses in 2010, 2011 and 2012, respectively. Our effective income tax rate in 2012 was 26.60%.

In 1997, the R.O.C. Income Tax Law was amended to integrate corporate income tax and stockholder dividend tax to eliminate the double taxation effect for resident stockholders of Taiwan companies. Under the amendment, all retained earnings generated from January 1, 1998 and not distributed to stockholders as dividends in the following year will be assessed a 10% retained earnings tax.

See "Item 10. Additional Information-E. R.O.C. Tax Considerations-Dividends". As a result, if we do not distribute all of our annual retained earnings generated beginning January 1, 1998 as either cash and/or stock dividends in the following year, these earnings will be subject to the 10% retained earnings tax. In addition, the R.O.C. government enacted the R.O.C. Income Basic Tax Act, also known as the "Minimum Income Tax Statute", or the Statute, which became effective on January 1, 2006 and imposes an alternative minimum tax, or AMT. The AMT imposed under the Statute is a supplemental tax which is payable if the income tax payable pursuant to the R.O.C. Income Tax Act is below the minimum amount prescribed under the Statute. In accordance with the Statute, a company will be subject to a 10% AMT if its annual taxable income under the Statute exceeds NT$2 million. According to R.O.C. "Minimum Income Tax Statute" amended on August 8, 2012, effective January 1, 2013, the statutory tax rate was increased form 10% to 12%, if its annual taxable income under the Statute exceeds NT$0.5 million.

Comparisons of Results of Operations

The following table sets forth some of our results of operations data as a percentage of our net operating revenues for the periods indicated.

	Years Ended December 31,		
	2010	**2011**	**2012**
Net operating revenues	100.0%	100.0%	100%
Cost of goods sold	(70.8)	(81.8)	(83.2)
Gross profit	29.2	18.2	16.8
Operating expenses:			
Sales and marketing	(2.0)	(2.9)	(2.4)
General and administrative	(2.9)	(2.9)	(2.9)
Research and development	(6.9)	(8.0)	(8.5)
Operating income	17.4	4.4	3.0
Net non-operating income	2.7	3.6	3.9
Income before income tax and minority interests	20.1	8.0	6.9
Income tax expense	(1.3)	(0.7)	(1.8)
Extraordinary gain	0.1	—	—
Net income	18.9	7.3	5.1
Attributable to:			
the Company	18.9	9.1	6.8
minority interests	(0.0)	(1.8)	(1.7)

Year Ended December 31, 2012 Compared to Year Ended December 31, 2011

Net operating revenues. Net operating revenues decreased by 0.9% from NT$116,703 million in 2011 to NT$115,675 million (US$3,982 million) in 2012 primarily due to the decrease in average selling price.

Cost of goods sold. Cost of goods sold increased by 0.9% from NT$95,417 million in 2011 to NT$96,263 million (US$3,314 million) in 2012 primarily due to the increase in fixed costs, such as depreciation expenses and electricity prices.

Gross profit and gross margin. Gross margin decreased from 18.2% in 2011 to 16.8% in 2012 primarily due to the decrease in average selling price.

Operating income and operating margin. Operating income decreased from NT$5,180 million in 2011 to NT$3,505 million (US$121 million) in 2012. Our operating margin decreased from 4.4% in 2011 to 3.0% in 2012. The decrease in operating margin is largely due to the decrease in gross margin. Operating expenses decreased by 1.2% from NT$16,106 million in 2011 to NT$15,907 million (US$547 million) in 2012.

Sales and marketing expenses. Our sales and marketing expenses decreased by 18.4% from NT$3,369 million in 2011 to NT$2,749 million (US$94 million) in 2012. The decrease in sales and marketing expenses was mainly due to a decrease in sample expenses and bad debt expenses. Our sales and marketing expenses as a percentage of our net operating revenues decreased from 2.9% in 2011 to 2.4% in 2012.

General and administrative expenses. Our general and administrative expenses increased by 0.9% from NT$3,342 million in 2011 to NT$3,371 million (US$116 million) in 2012 primarily as a result of an increase in personnel expenses. Our general and administrative expenses as a percentage of our net operating revenues was equal to 2.9% in 2011 and 2012, respectively.

Research and development expenses. Our research and development expenses increased by 4.2% from NT$9,395 million in 2011 to NT$9,787 million (US$337 million) in 2012. The increase in research and development expenses resulted primarily from an increase in computer usage expenses and mask expenses. Our research and development expenses as a percentage of our net operating revenues increased from 8.0% in 2011 to 8.5% in 2012.

Net non-operating income. Net non-operating income increased by 7.1% from income of NT$4,200 million in 2011 to NT$4,498 million (US$154 million) in 2012, mainly due to an increase in gain on disposal of investments from NT$1,688 million in 2011 to NT$5,346 million (US$184 million) in 2012, offset by an increase in loss on valuation of financial liabilities from gain of NT$1,341 million in 2011 to loss of NT$667 million (US$23 million) in 2012 and a decrease in other income from NT$2,055 million in 2011 to NT$815 million (US$28 million) in 2012.

Net income attributable to the Company. Due to the factors described above, our net income decreased by 26.3% from NT$10,610 million in 2011 compared to NT$7,819 million (US$269 million) in 2012.

Year Ended December 31, 2011 Compared to Year Ended December 31, 2010

Net operating revenues. Net operating revenues decreased by 7.7% from NT$126,442 million in 2010 to NT$116,703 million in 2011 primarily due to a decrease in volume of products shipped.

Cost of goods sold. Cost of goods sold increased by 6.6% from NT$89,518 million in 2010 to NT$95,417 million in 2011 primarily due to the decrease of the utilization rate from 93.7% in 2010 to 78.6% in 2011 as a result of decreased customer demand.

Gross profit and gross margin. Gross margin decreased from 29.2% in 2010 to 18.2% in 2011 primarily due to the lower utilization rate in 2011.

Operating income and operating margin. Operating income decreased from NT$22,020 million in 2010 to NT$5,180 million in 2011. Our operating margin decreased from 17.4% in 2010 to 4.4% in 2011. The decrease in operating margin is largely due to a decrease in gross margin. Operating expenses increased by 8.1% from NT$14,904 million in 2010 to NT$16,106 million in 2011.

Sales and marketing expenses. Our sales and marketing expenses increased by 31.3% from NT$2,566 million in 2010 to NT$3,369 million in 2011. The increase in sales and marketing expenses was mainly due to an increase in sample expenses and bad debt expenses. Our sales and marketing expenses as a percentage of our net operating revenues increased slightly from 2.0% in 2010 to 2.9% in 2011.

General and administrative expenses. Our general and administrative expenses decreased by 7.1% from NT$3,598 million in 2010 to NT$3,342 million in 2011 primarily as a result of a decrease in personnel expenses. Our general and administrative expenses as a percentage of our net operating revenues was equal to 2.9% in 2010 and 2011, respectively.

Research and development expenses. Our research and development expenses increased by 7.5% from NT$8,740 million in 2010 to NT$9,395 million in 2011. The increase in research and development expenses resulted primarily from an increase in research and development wafer expenses and mask expenses. Our research and development expenses as a percentage of our net operating revenues increased from 6.9% in 2010 to 8.0% in 2011.

Net non-operating income. Net non-operating income increased by 24.9% from income of NT$3,364 million in 2010 to NT$4,200 million in 2011, mainly due to an increase in gain on valuation of financial liabilities from loss of NT$(665) million in 2010 to gain of NT$1,341 million in 2011, an increase in other income from NT$1,019 million in 2010 to NT$2,055 million in 2011 and an increase in impairment loss from NT$114 million in 2010 to NT$2,246 million in 2011.

Net income attributable to the Company. Due to the factors described above, we incurred a net income of NT$23,899 million in 2010, compared with a net income of NT$10,610 million in 2011.

B. Liquidity and Capital Resources

The foundry business is highly capital intensive. Our development over the past three years has required significant investments. Additional expansion for the future generally will continue to require significant cash for acquisition of plant and equipment to support increased capacities, particularly for the production of 12-inch wafers, although our expansion program will be adjusted from time to time to reflect market conditions. In addition, the semiconductor industry has historically experienced rapid changes in technology. To maintain competitiveness at the same capacity, we are required to make adequate investments in plant and equipment. In addition to our need for liquidity to support the large fixed costs of capacity expansion and the upgrading of our existing plants and equipment for new technologies, as we ramp up production of new plant capacity, we require significant working capital to support purchases of raw materials for our production and to cover variable operating costs such as salaries until production yields provide sufficiently positive margins for a fabrication facility to produce operating cash flows.

We have financed our capital expenditure requirements in recent years with cash flows from operations as well as from bank borrowings, the issuance of bonds and equity-linked securities denominated in NT dollars and U.S. dollars. We incurred capital expenditures of NT$61,323 million, NT$53,326 million and NT$52,186 million (US$1,796 million) in 2010, 2011 and 2012, respectively, requiring a significant amount of funding from financing activities. Once a fab is in operation at acceptable capacity and yield rates, it can provide significant cash flows. Cash flows significantly exceed operating income, reflecting the significant non-cash depreciation expense. We generated cash flows from operations of NT$53,495 million and NT$41,654 million and NT$40,535 million (US$1,395million) in 2010, 2011 and 2012, respectively.

On May 24, 2011, we issued US$500 million aggregate principal amount of currency linked zero coupon convertible bonds due 2016. Each bond, at the option of the holder, will be convertible into our ADS. The proceeds of this offering will be used for purchasing machinery and equipment. As of December 31, 2011 and 2012, no bonds had been converted into our ADS, and we have repurchased and cancelled US$64 million and US$5 million principal amount of these bonds in the open market transactions for the years ended December 31, 2011 and 2012, respectively.

In early June, 2012, we issued five-year and seven-year domestic unsecured corporate bonds totaling NT$10,000 million, with a face value of NT$1 million per unit. The five-year domestic unsecured corporate bond was issued in the amount of NT$7,500 million. Interest will be paid annually at 1.43%, and the principal will be repayable in June 2017 upon maturity. The seven-year domestic unsecured corporate bond was issued in the amount of NT$2,500 million. Interest will be paid annually at 1.63%, and the principal will be repayable in June 2019 upon maturity. The proceeds of this offering will be used for purchasing machinery and equipment. As of December 31, 2012, NT$10 billion aggregate principal amount of these bonds were outstanding.

In mid March, 2013, we issued another five-year and seven-year domestic unsecured corporate bonds totaling NT$10,000 million, with a face value of NT$1 million per unit. The five-year domestic unsecured corporate bond was issued in the amount of NT$7,500 million. Interest will be paid annually at 1.35%, and the principal will be repayable in March 2018 upon maturity. The seven-year domestic unsecured corporate bond was issued in the amount of NT$2,500 million. Interest will be paid annually at 1.50%, and the principal will be repayable in March 2020 upon maturity. The proceeds of this offering will be used for purchasing machinery and equipment.

As of December 31, 2012, we had NT$42,593 million (US$1,466 million) of cash and cash equivalents and NT$656 million (US$23 million) of FVTPL, current. Cash equivalents included reverse repurchase agreements collateralized by government bonds, or other highly secure assets for short-term liquidity management. These agreements bore interest rates ranging from 0.25% to 0.41%; 0.45% to 0.62%; and 0.46% to 0.60% in 2010, 2011 and 2012, respectively. The terms of these agreements were typically less than two weeks. As of December 31, 2010, 2011, and 2012, we held reverse repurchase agreements in the amount of NT$3,757 million, NT$3,532 million and NT$4,585 million (US$158 million), respectively.

We believe that our working capital, cash flow from operations and unused lines of credit are sufficient for our present requirements.

At our 2012 annual general meeting, our stockholders authorized the Board to raise capital from private placement, through issuing instruments such as common shares, depositary receipts (including but not limited to ADS), or Euro/Domestic convertible bonds (including secured or unsecured corporate bonds), based on market conditions and our needs. The amount of shares issued or convertible is proposed to be no more than 10% of our total shares issued (i.e., no more than 1,292,640,716 shares). According to Item 6, Article 43-6 of the R.O.C. Security and Exchange Act, any private placement of our shares must be conducted separately within one year after approval at the annual general meeting of stockholders. The approval to conduct a private placement of our shares will expire on June 11, 2013. Considering market conditions, the Board has resolved to terminate any plans for a private placement of our shares under the 2012 general meeting authorization..

Operating Activities

Our operating activities generated cash of NT$40,535 million (US$1,395 million) in 2012. Cash generated from our operating activities for 2012 significantly exceeded net income due to the add-back of non-cash items, such as depreciation and amortization in the amount of NT$35,738 million (US$1,230 million). Cash generated by operating activities decreased from NT$41,654 million in 2011 to NT$40,535 million (US$1,395 million) in 2012, primarily due to a decrease in cash collected from our customers.

Investment Activities

Net cash used in our investment activities was NT$49,148 million (US$1,692 million) in 2012. In 2012, we used cash of NT$52,186 million (US$1,796 million) to purchase equipment primarily used at our fabs. This was offset by the net cash provided by acquisition and disposal of available-for-sale financial assets of NT$4,288 million (US$148 million).

Financing Activities

Net cash provided by our financing activities was NT$3,588 million (US$124 million) in 2012. We drew down bank loans of NT$13,518 million (US$465 million), issued domestic bonds of NT$10,000 million (US$344 million), paid cash dividends of NT$6,316 million (US$217 million) and repaid long-term loans of NT$13,942 million (US$480 million).

We had NT$5,773 million (US$199 million) outstanding short-term loans as of December 31, 2012. We had total availability under existing short-term lines of credit of NT$8,293 million (US$285 million) as of December 31, 2012.

We had bonds payable of NT$26,224 million (US$903 million) in the aggregate as of December 31, 2012.

As of December 31, 2012, our outstanding long-term debts primarily consisted of NT$463 million unsecured and NT$1,618 million secured long-term bank loans due in 2013, NT$600 million secured long-term bank loans due in 2014, NT$3,692 million unsecured and NT$1,293 million secured long-term bank loans due in 2015, NT$3,500 million unsecured and NT$2,447 million secured long-term bank loans due in 2016, and NT$1,000 million unsecured and NT$208 million secured long-term bank loans due in 2017. The interest rates of our long-term bank loans range from 1.24% to 2.51%.

As of December 31, 2012, the current portion of bonds due within one year was NT$4,292 million (US$148 million), and the current portion of long-term bank loans due within one year was NT$4,595 million (US$158 million).

Capital Expenditures

We have continued to expand our manufacturing capacity, especially our 40 nanometer and 28 nanometer technology processes. As a result, our capital expenditures have been used for expanding our factory space and purchasing equipment for both research and development and production purposes. We have entered into several construction contracts for the expansion of our factory space in both Taiwan and Singapore. As of December 31, 2012, these construction contracts amounted to NT$7,810 million (US$269 million) with an unaccrued portion of the contracts of NT$4,722 million (US$163 million). In 2011 and 2012, we spent approximately NT$53,326 million and NT$52,186 million (US$1,796 million), respectively, primarily to purchase equipment for research and development and production purposes.

We continue to maintain high levels of capital expenditures as we believe there are promising opportunities for 28 – nanometer and 40 – nanometer technologies. We continue to devote most of our capital expenditure to improvement of advanced technology within 12-inch fabs. We will focus on our addressable markets (i.e., 40 & 28 – nanometer) and continue to build up our production capacity. We believe our 28—nanometer technology progress will propel our advanced process growth, strengthen our future competitiveness, and enhance our portfolio of comprehensive foundry solutions available to our customers.

We believe that our existing cash and cash equivalents and short-term investments will be sufficient to meet our working capital and capital expenditure requirements at least through the end of 2013. Due to rapid changes in technology in the semiconductor industry, however, we have frequent demand for investment in new manufacturing technologies. We cannot assure you that we will be able to raise additional capital, should that become necessary, on terms acceptable to us, or at all. If financing is not available on terms acceptable to us, management intends to reduce expenditures so as to delay the need for additional financing. To the extent that we do not generate sufficient cash flows from our operations to meet our cash requirements, we may rely on external borrowings and securities offerings to finance our working capital needs or our future expansion plans. The sale of additional equity or equity-linked securities may result in additional dilution to our stockholders. Our ability to meet our working capital needs from cash flow from operations will be affected by the demand for our products and change in our product mix, which in turn may be adversely affected by several factors. Many of these factors are beyond our control, such as economic downturns and declines in the average selling prices of our products. The average selling prices of our products have been subjected to downward pressure in the past and are reasonably likely to be subject to further downward pressure in the future. We have not historically relied, and we do not plan to rely in the foreseeable future, on off-balance sheet financing arrangements to finance our operations or expansion.

Transactions with Related Parties

Our transactions with related parties have been conducted on arm's-length terms. See "Item 7. Major Stockholders and Related Party Transactions-B. Related Party Transactions" and Note 27 to our audited consolidated financial statements included in this annual report.

Inflation/Deflation

We do not believe that inflation in the R.O.C. has had a material impact on our results of operations.

U.S. GAAP Reconciliation

Our consolidated financial statements are prepared in accordance with R.O.C. GAAP, which differs in certain significant respects from U.S. GAAP. Such differences include methods for measuring the amounts shown in the financial statements and additional disclosures required by U.S. GAAP. Note 36 to our audited financial statements, included in this annual report, provides a discussion and quantification of the differences between R.O.C. GAAP and U.S. GAAP as they related to us. We provide a summary of material differences included therein below.

The following table sets forth a comparison of our net income and stockholders' equity in accordance with R.O.C. GAAP and U.S. GAAP for the periods indicated.

	Years Ended December 31,			
	2010	2011	2012	
	NT$	NT$	NT$	US$
	(in millions)			
Consolidated net income				
Consolidated net income, R.O.C. GAAP	23,846	8,467	5,874	202
U.S. GAAP adjustments				
Compensation	(397)	(106)	(10)	—
Equity investees	(42)	(11)	3	—
Investments in debt and equity securities	(234)	(210)	(1,957)	(67)
Convertible bond liabilities	—	21	27	1
Goodwill and business combinations	452	(1,308)	—	—
Treasury stock and related disposal	(81)	(179)	(80)	(3)
Capital reduction and return from foreign operation	—	—	(233)	(8)
Tax effect of U.S. GAAP adjustments	—	(69)	(515)	(18)
Consolidated net income, U.S. GAAP	23,544	6,605	3,109	107
Stockholders' equity				
Stockholders' equity, R.O.C. GAAP	225,136	212,125	205,021	7,058
Compensation	32	4	1	—
Equity investees	(142)	(261)	131	4
Investments in debt and equity securities	1,765	1,669	(247)	(8)
Convertible bond liabilities	—	(522)	(489)	(17)
Goodwill and business combinations	1,301	(8)	(8)	—
Treasury stock and related disposal	(2,624)	(2,044)	(1,883)	(65)
Pension	(345)	(254)	(722)	(25)
Tax effect of U.S. GAAP adjustments	—	(69)	(175)	(6)
Stockholders' equity, U.S. GAAP	225,123	210,640	201,629	6,941

The differences between R.O.C. GAAP and U.S. GAAP that have a material effect on our net income and stockholders' equity under R.O.C. GAAP were described as follows:

Compensation expenses

Pursuant to our articles of incorporation, we are required, under certain circumstances, to distribute a certain percentage of unappropriated earnings as employee bonus and remuneration to directors. Please refer to “Item 10. Additional Information-B. Memorandum and Articles of Association-Dividends and Distributions”. Remuneration to directors is settled in cash. Our Articles of Incorporation specifies that employee bonus can be settled in cash or shares or a combination of both. Under both R.O.C. and U.S. GAAP, employee bonus is charged to compensation expense and accrued based on management’s estimate. The employee bonus is initially accrued during the current year based on management’s estimate according to our Article of Association with adjustment in the subsequent year after stockholders’ approval. Compensation expense relating to stock bonus is determined based on the fair market value of our common stock on the grant date. According to the R.O.C. ARDF Interpretation 96-052, “Accounting for Employee Bonus and Remunerations to Directors and Supervisors”, compensation expense relating to stock bonus is determined based on the fair value of our common stock at the date before the stockholders’ meeting. Under U.S. GAAP, compensation expense relating to stock bonus is measured at the fair market value on the date of stock distribution.

Under R.O.C. GAAP, we apply the intrinsic value method to recognize compensation cost for employee stock options granted before January 1, 2008. For stock options granted on or after January 1, 2008, we adopted R.O.C. SFAS 39 to recognize compensation cost using the fair value method, which is consistent with U.S. GAAP. We amortized share-based compensation expense over the vesting period based on the grant-date fair value. The fair value of liability awards is re-measured at each reporting date with fair value changes charged to compensation expenses accordingly. Compensation expense is recognized on a graded-vesting basis over the requisite service period of the options.

Investments in debt and equity securities

Under R.O.C. GAAP, investment in restricted stock, for which sale is restricted by governmental or contractual requirement is accounted for as an available-for-sale security, or a cost method investment and its fair value should be adjusted for the effect of restriction. Under U.S. GAAP, however, a restricted investment with restricted period over one year does not meet the definition of an equity security with readily determinable fair value, and therefore, it is accounted for as a cost method investment. In 2011, certain investments were reclassified from cost method investment under R.O.C. GAAP to available-for-sale securities under U.S. GAAP as the restricted period of these investments terminates within one year from the reporting date. These restricted investments were also classified as available-for-sale securities under R.O.C. GAAP at December 31, 2012, because the restriction expired in 2012.

When we lose our significant influence on an investment accounted for under the equity method and reclassify it as an available-for-sale security, the proportionate share of an investee’s equity adjustments for other comprehensive income should remain as a part of the carrying amount of the investment under R.O.C. GAAP and the dividends received from the available-for-sale security which were declared from pre-acquisition profits are deducted from the cost of the security. However, under U.S. GAAP, all of the investee’s equity adjustments for other comprehensive income should be offset against the carrying amount of the investment at the time significant influence is lost, and the dividends received from the available-for-sale security are accounted for as dividend income.

Our ownership interest in a subsidiary or equity investee may change, for example, (1) when an equity investee or a subsidiary issues additional shares and we subscribe for these shares at a percentage higher or lower than its current ownership percentage in the equity investees or subsidiaries, (2) when the employees of our subsidiaries or equity investees exercise their stock options, or (3) when the convertible bondholders of our subsidiaries or equity investees exercise their conversion rights. Under R.O.C. GAAP, the change in our proportionate share in the net assets of our equity investees or subsidiaries resulting from the issuance of additional shares of the investee’s stock, at the rate not proportionate to our existing equity ownership in such investees, is recorded to the additional paid-in capital and long-term investments account for an equity method investee, or noncontrolling interest for a subsidiary. Under U.S. GAAP, pursuant to ASC 810-10-45, *Changes in a Parent’s Ownership Interest in a Subsidiary*, a change in our ownership interest while the Company retains its controlling financial interest in its subsidiary shall be accounted for as equity transactions. Nevertheless, a dilution of ownership interest in an equity-method investee is recognized as a gain or loss, while an increase of ownership interest is accounted for as additional acquisition interest in an equity method investee, with the difference between the total cost of the additional investment and the proportionate share of the fair value of net assets treated as equity method goodwill.

In June 2010, we acquired additional ownership interests in one of our subsidiaries. Under R.O.C. GAAP, the acquisition was accounted for using the purchase method of accounting. However, under U.S. GAAP, the acquisition was accounted for as an equity transaction. The difference between the fair value of the consideration paid and the book value of the noncontrolling interests is adjusted against stockholders' equity.

In June 2010, a non-affiliated company invested for newly issued shares of one of our consolidated entities, reducing our ownership interest from 100% to 50%. Due to this transaction, we jointly controlled the entity and accounted for the entity as a joint venture. Under R.O.C. GAAP, the reduction of equity interest is adjusted against additional paid-in capital. However, under U.S. GAAP, we accounted for the transaction as a deconsolidation of a subsidiary and remeasured the remaining holding interests by recognizing a loss in net income attributable to us.

Under R.O.C. GAAP, if the carrying amount of non-current asset or disposal group will be recovered principally through sale rather than through continuing use and the asset or disposal group meets the criteria to be available for immediate sale in its present condition subject only to terms that are usual and customary for a sale and the sale is highly probable, the asset or disposal group would be classified as held-for-sale asset measured at the lower of carrying amount and fair value less costs to sell and separately presented in the balance sheet. For the sale to be highly probable, the management must be committed to a plan to sell the asset completely within one year, and the asset must be actively marketed for sale at a price that is reasonable compared to its current fair value. Equity-method investment shall be classified as held-for-sale asset if it meets all the above criteria. Under U.S. GAAP, ASC 360-10 *Property, Plant, and Equipment*, the criteria to classify long-lived asset or disposal group to held-for-sale asset is similar to R.O.C. GAAP. However, ASC 360-10 does not apply to financial instruments including investments in equity securities accounted for under the cost or equity method. As such, equity method investments are not classified as held-for-sale assets but shall continue to be accounted for under equity method until the significance influence is lost. In 2012, there is reclassification between R.O.C. GAAP and U.S. GAAP of one of our equity-method investments based on the above difference. The proportional equity pick up from the equity investment was insignificant for the year ended December 31, 2012.

Under R.O.C. GAAP, when an investor company holds 20% or more of an investee company's outstanding voting securities but without the controlling power, unless it is evidenced that the investor company does not have significant influence over the investee company, the investor's investment in the investee company's equity securities, including preferred shares, shall be accounted for using the equity method. When an investor company invests in preferred stock of an investee company, equity method accounting is necessary if the investor has the ability to exercise its significant influence over the investee. Therefore, when determining the excess of cost of investment over underlying equity in net assets of the investee, and recognizing subsequent pick up of equity method gains or losses, we take these preferred shareholdings into consideration. In addition, excess of investment cost over the underlying net assets will be treated as equity-method goodwill as a component of the carrying value of the equity-method investment. If, however, there is excess of underlying net assets over the investment cost, the investee's non-current assets, as components of the equity-method investment balance, will be subject to pro rata reduction with the remaining unallocated bargain purchase recognized immediately as an extraordinary gain.

Under U.S. GAAP, however, equity-method accounting generally applies only to investments in common stock and in-substance common stock that give the investor the ability to exercise significant influence over operating and financial policies of an investee. Unless when the investment in common stock and in-substance common stock is reduced to zero, at which time the Company's other forms of investment, including preferred shares, may be required to report losses up to the Company's investment carrying amount. Pursuant to ASC 323-10-15-13, in-substance common stock is an investment in an entity that has risk and reward characteristics that are substantially similar to that entity's common stock. An investor shall consider all of the characteristics of the securities: subordination, risks and rewards of ownership and obligation to transfer value, when determining whether an investment in an entity is substantially similar to an investment in the entity's common stock.

In December 2011, after considering all the above mentioned characteristics, we conclude that our investment in an investee's preferred shares is not in-substance common stock. Therefore, under U.S. GAAP the investment of preferred shares was reclassified from long-term investment accounted for under the equity method to financial assets measured at cost. We also reversed the effects of the pro rata reduction for the bargain purchase recognized, and recognized an equity-method goodwill as a component of the equity-method investment balance for our investment in common stocks. Additionally, we reversed the investment gain from the preferred shares recognized under R.O.C. GAAP.

Convertible bond liabilities

We issued convertible bonds in May 2011. Under R.O.C. GAAP, the bonds contain both a liability component and an equity component. The conversion right is classified in stockholders' equity at its fair value at issuance. Under U.S. GAAP, the conversion right was determined to be a contract indexed to our own stock and, if it existed on a freestanding basis, would be classified in stockholders' equity, meeting the scope exception described in ASC 815-10-15-74. As such, the conversion right is not considered to be a derivative instrument that is required to be bifurcated from the host contract.

In addition, under R.O.C. GAAP, the issuance costs are allocated proportionally to the equity and liability components. The amount allocated to the equity components is accounted for as a reduction of equity as well as the amount allocated to the liability component is accounted for as a bond discount. The issuance costs allocated to the liability component are amortized over the contractual life of the bonds using the effective interest rate method. Under U.S. GAAP, however, the entire issuance costs are reported as deferred charges and amortized over the contractual life of the bonds using the effective interest rate method.

Based on the above differences, we reclassified the equity component under R.O.C. GAAP to bonds payable under U.S. GAAP, and reclassified the issuance costs which are allocated to the liability and equity component under R.O.C. GAAP to deferred charges under U.S. GAAP. We also adjusted the differences resulting from the subsequent amortization of the bond discount and deferred charges as well as the subsequent redemption of the bonds.

Goodwill and business combinations

In accordance with R.O.C. GAAP, goodwill is measured separately on each acquisition, and it excludes goodwill in non-controlling interest. In a step acquisition, the acquirer does not re-measure its previously held equity interest in the acquiree, therefore, the acquisition does not result in gains or losses from re-measurements. Goodwill is not amortized and is subject to annual impairment tests or whenever events and circumstances change indicating goodwill may be impaired. The assessment of impairment includes identifying the goodwill-allocated cash generating unit (CGU), determining the recoverable amount of CGU by using a discounted cash flow analysis, and ultimately comparing the recoverable amount with the carrying amount of CGU including goodwill. If the CGU's carrying amount is greater than its recoverable amount, an impairment loss is recognized. The impairment of goodwill cannot be reversed. When the fair value of identifiable net assets acquired exceeds the cost, the difference should be assigned to non-current assets acquired (except for financial assets not under equity method, assets to be disposed, deferred tax assets, prepaid pension or other retirement benefits cost) proportionate to their respective fair values. If these assets are all reduced to zero value, the remaining excess should be recognized as extraordinary gain.

Under U.S. GAAP, in a business combination achieved in stages, the acquirer shall re-measure its previously held equity interest in the acquiree at its acquisition-date fair value and recognize the resulting gain or loss. The acquirer shall recognize goodwill as of the acquisition date measured as the excess of (a) the aggregate of: (i) the consideration transferred, (ii) the fair value of any non-controlling interest in the acquiree, and (iii) the fair value of any previously held equity interest in the acquiree; over (b) the fair value of identifiable assets acquired and the liabilities assumed on the acquisition date; or gain on bargain purchase in which the amount as the excess of (b) exceeds the aggregate of the amounts specified in (a), after performing required reassessment of measurement procedures. Goodwill is not amortized and is subject to an annual impairment test or more frequently when events and circumstances indicate a possible impairment may exist. The first step of the impairment test is to compare the fair value of the reporting unit with its carrying value, including goodwill. If the carrying value of the reporting unit exceeds its fair value, the second step of the impairment test is to compare the implied fair value of the reporting unit goodwill with its carrying value. If the carrying amount of goodwill exceeds its fair value, the excess is recognized as impairment loss on the consolidated statements of income. Impairment of goodwill cannot be subsequently reversed.

On November 30, 2010, we acquired additional stocks issued by one of our equity investee, which increased our ownership interest from 45.79% to 57.67%. Prior to the acquisition date, we accounted for its 45.79% interest as an equity-method investment. As a result of the acquisition, we obtained control over the acquiree and the results of the acquiree's operations have been included in the consolidated financial statements since that date.

Under R.O.C. GAAP, a change in our proportionate share in the net assets of an equity investee resulting from our acquisition of additional stock issued by the equity investee at a rate not proportionate to our existing equity ownership is charged to the additional paid-in capital and long-term investments accounts. However, under U.S. GAAP, the acquisition of a controlling interest in acquiree is regarded as a business combination. The sum of the fair value of the consideration transferred, non-controlling interests and equity interest previously held by the acquirer exceeding the fair value of identifiable net assets is recorded as goodwill.

In September 2011, due to operating profits and cash flows were lower than expected since November 2010, given sharp deterioration in market condition, the acquiree determined some of its long lived assets were impaired pursuant to ASC360. The impairment loss also served as an indicator that goodwill might also be impaired. Accordingly, we conducted a two-step process to identify and measure the amount of impairment loss, if any. As the carrying amount of the subsidiary exceeded its fair value which was estimated by using the discounted cash flow based on earnings forecasts, its goodwill was considered to be impaired. To calculate the implied fair value of goodwill, we allocated the fair value to each asset and liability account as described in Note 36(7) of our audited financial statements. The excess of the reporting unit's fair value over the total amounts allocated to each asset (except goodwill) and liability account would be the implied fair value of goodwill. As the carrying amount exceeded the implied fair value of the subsidiary's goodwill, we recognized a goodwill impairment loss of in 2011 under U.S. GAAP. While the impairment assessment resulted in a full write down of goodwill under both R.O.C. GAAP and U.S. GAAP, the amount of the charge was different due to the difference in carrying values of goodwill under each GAAP.

Treasury stock and related disposal

Some of our subsidiaries and equity method investees also hold our shares as investments. Under R.O.C. GAAP, reciprocal shareholdings held by subsidiaries, but not equity investees, are recorded as treasury stocks on our books. Under U.S. GAAP, however, reciprocal shareholdings, whether being held by subsidiaries or equity investees, are recorded as treasury stocks on our books. Accordingly, we recognized treasury stocks for reciprocal shareholdings held by equity-method investees and eliminated the related unrealized gain (loss) or investment gain (loss) as they are accounted for as treasury stock under U.S. GAAP.

Pension

Under R.O.C. GAAP, a minimum pension liability should be measured as the excess of accumulated benefit obligation over the fair value of the plan assets and allowed the unrecognized items, including prior service costs and credits, gains or losses, and transition obligations or assets to be reported in disclosure shown as a plan's funded status. Under U.S. GAAP, ASC 715-30, *Defined Benefit Plans-Pension*, requires an employer to recognize an asset for a plan's overfunded status or a liability for a plan's underfunded status with an offsetting adjustment to accumulated other comprehensive income.

Impairment of long-lived assets (excluding goodwill and other indefinite lived assets)

Under R.O.C. GAAP and U.S. GAAP, long-lived assets are evaluated for impairment at each balance sheet date or whenever events and changes in circumstances indicate that an asset or asset group may be impaired and the carrying amounts of these assets may not be recoverable. Under R.O.C. GAAP, the Company determines whether an asset is impaired by comparing the carrying amount to its recoverable amount, which is the higher of the asset's fair value less costs to sell or the value in use determined by the future discounted cash flows to be generated by the asset and recognize an impairment loss, if any, to the extent that its carrying amount exceeds its recoverable amount.

Under U.S. GAAP, pursuant to ASC 360, a two-step impairment test is required if impairment is indicated and the measurement model is as follows:

1. The carrying amount is first compared with the undiscounted cash flows. If the carrying amount is lower than the undiscounted cash flows, no impairment loss is recognized.

2. If the carrying amount is higher than the undiscounted cash flows, an impairment loss in measured as the difference between the carrying amount and fair value.

In 2011 and 2012, given the sharp deterioration in market condition, two of our subsidiaries had lower expected operating profits and cash flows and revised its earnings forecast for the next five years and determined that some of its long lived assets were impaired pursuant to ASC360. While the impairment assessment resulted in a adjusted carrying amount as fair value of long-lived assets under both R.O.C. GAAP and U.S. GAAP, the amount of the charge was different due to the difference in carrying values of long-lived assets under each GAAP as described in Note 36(3) for difference in application of equity accounting.

Additionally, under R.O.C. GAAP, for previously recognized losses, if there is evidence that impairment losses recognized no longer exists or has diminished, and the recoverable amount of the long-lived assets increase because of an increase in the assets' estimated service potential, the losses may be reversed to the extent that the resulting carrying value of the assets do not exceed the carrying value had no impairment loss been recognized in prior years. Whereas impairment losses recognized cannot be reversed under U.S. GAAP. There were no reversal of impairment recognized on long-lived assets under R.O.C. GAAP for the years ended December 31, 2010, 2011 and 2012.

Inventory

Under R.O.C. GAAP, the write down of inventory for the lower of cost or net realizable value may be reversed in subsequent periods if market conditions improve. Under U.S. GAAP, the write down to lower of cost or market creates a new cost basis that subsequently cannot be marked up. Upon the sale of the related inventory, the difference between these two GAAPs is resolved.

Under R.O.C. GAAP, inventory is stated at the lower of cost or net realizable value, while under U.S. GAAP, inventory is stated at the lower of cost or market. ASC 330-10-20 defines "market" as current replacement cost (by purchase or reproduction) provided it meets both of the following conditions: (1) market should not exceed the net realizable value; and (2) market should not be less than net realizable value reduced by an allowance for an approximately normal profit margin. Net realizable value is defined as the estimated selling price in the ordinary course of business less reasonably predictable costs of completion and disposal. The market value of the Company's work in progress and finished goods is measured at the contractual sales price less predictable costs of completion, while that of the raw materials is the replacement cost by purchase. Normally, the market floor of net realizable value reduced by an allowance for a normal profit margin is not applicable because the Company's inventory is manufactured by contract, serving the specific requirements of its customers. Additionally, as the rule of lower of cost or market is intended to provide a means of measuring the residual usefulness of an inventory expenditure and the term "market" may be thought of in terms of the equivalent expenditure which would have to be made in the ordinary course at that date to procure corresponding utility, in the event when the estimated selling price, reduced by the costs of completion, is lower than current replacement cost, net realizable value would be determined to be the more appropriate measurement of utility. Therefore, the accounting for inventory at the lower of cost or net realizable value under R.O.C. GAAP is not materially different from the accounting for inventory at the lower of cost or market under U.S. GAAP.

Capital reduction and return from foreign subsidiaries

Under R.O.C. GAAP, as the Company decreases its equity interests in a foreign operation through capital reduction and return of capital, the proportional difference of the accumulated currency translation adjustments before and after the capital reduction is recognized in profit or loss. However, under U.S. GAAP, foreign currency translation gains and losses that have been recorded as a component of other comprehensive income during the period for which settlement was not planned or anticipated remain in that account until partial or complete sale or complete or substantially complete liquidation of the investment in the foreign entity. In 2012, two of the Company's foreign subsidiaries returned part of its capital by cash. Under R.O.C. GAAP, the difference of the accumulated currency translation adjustments before and after the capital reduction was recognized as exchange gain. Given the capital return was not made in connection with the sale or substantially complete liquidation of these foreign subsidiaries, the Company reversed the exchange gain under R.O.C. GAAP, and recorded as cumulative translation adjustment under U.S. GAAP.

Tax effect of U.S. GAAP adjustments

According to ASC 740-10, *Income Taxes*, our uncertain tax positions are accounted for based on a two-step process. The first step is to evaluate the tax position for recognition by determining if it is more likely than not that the position will be sustained based on the technical merits. The second step requires us to estimate and measure the tax benefit as the largest amount that is more than 50% likely to be realized upon ultimate settlement. Although ASC 740-10 provides further clarification of the accounting for uncertainty in income taxes recognized in the financial statements, significant management judgment must be made and used in connection with the recognition threshold and measurement attribute. Determination of our uncertain tax positions involves the legal and factual interpretation with respect to the application of relevant tax laws and regulations, along with our assessment of other factors including changes in facts or circumstances, changes in tax law, and/or effectively settled issues under audit. As mentioned above, the application of tax laws and regulations is inherently subject to legal and factual interpretation, judgment and uncertainty. In addition, tax laws and regulations themselves are subject to change as a result of changes in fiscal policy, changes in legislation, the evolution of regulations and court rulings. Therefore, the final settlement of these uncertain tax positions might be materially different from our estimates, which could result in the need to record additional tax liabilities or potentially reverse previously recorded tax liabilities. Unlike ASC 740-10, R.O.C. SFAS 22 contained no guidance on uniform criteria for an enterprise to recognize and measure potential tax benefits associated with uncertain tax positions.

Under R.O.C. GAAP, the 10% tax on undistributed earnings is recorded as an expense at the time shareholders resolve that its earnings shall be retained. Under U.S. GAAP, 10% income tax impact is provided in the period the income is earned, assuming that no earnings are distributed. Any reduction in the liability will be recognized when the income is distributed upon the stockholders' approval in the subsequent year. Tax on undistributed earnings may be offset by the Company's available tax credits carried forward, where applicable. As such, the incremental tax accrued on undistributed earnings may be offset by a corresponding reduction in valuation allowance, where applicable.

Moreover, additional tax benefit (expense) and deferred tax assets or liabilities would be adjusted for the reconciled items between R.O.C. GAAP and U.S. GAAP due to temporary difference in connection with the recognition of the book-to-tax basis difference of the Company's investment in UMCJ, immediately following its decision to dissolve and liquidate UMCJ. While R.O.C. GAAP requires subsequent changes in deferred tax balances as of the beginning of the year to be recorded in equity, if the deferred tax is related to an equity classified item, ASC 740, Income Taxes, requires all such changes to be recognized as current income tax expense.

Recent Accounting Pronouncements

In December 2011, the FASB issued ASU 2011-11 *Balance Sheet* (Topic 210) Disclosures about Offsetting Assets and Liabilities. The new requirement is about disclosure of the nature of an entity's rights of setoff and related arrangements associated with its financial instruments and derivative instruments. The Update is designed to make financial statements that are prepared under U.S. GAAP more comparable to those prepared under IFRSs. The ASU is effective for annual reporting periods beginning on or after January 1, 2013, and interim periods within those annual periods, with retrospective application required. This standard is not expected to have a material impact on our future consolidated financial statements.

In July 2012, the FASB issued ASU 2012-02 *Intangibles—Goodwill and Other* (Topic 350) Testing Indefinite-Lived Intangible Assets for Impairment. The amendment is intended to simplify testing of indefinite-lived intangible assets for impairment providing the option to perform "qualitative" assessments first. If, after assessing the totality of events and circumstances, an entity concludes that it is not more likely than not that the indefinite-lived intangible asset is impaired, the requirement to perform quantitative impairment test is eliminated by this standard. The amendment is effective for annual and interim impairment tests performed for fiscal years beginning after September 15, 2012, with early adoption permitted. This standard is not expected to have a material impact on our consolidated financial statements.

In January 2013, the FASB issued ASU 2013-01 *Balance Sheet* (Topic 210) Clarifying the Scope of Disclosures about Offsetting Assets and Liabilities. The amendments in this Update clarify that the scope of the disclosures under U.S. GAAP is limiting the scope of the new balance sheet offsetting disclosures to derivatives, repurchase agreement and reverse repurchase agreement, and securities lending and securities borrowing transactions to the extent that they are (1) offset in the financial statements or (2) subject to an enforceable master netting arrangement or similar agreement. The ASU is effective for fiscal years beginning on or after January 1, 2013, and interim periods within those annual periods, with retrospective for all comparative periods presented required. This standard is not expected to have a material impact on our consolidated financial statements.

In February 2013, the FASB issued ASU 2013-02 *Comprehensive Income* (Topic 220) Reporting of Amounts Reclassified Out of Accumulated Other Comprehensive Income. The amendment requires an entity to provide information about reclassification adjustments out of accumulated other comprehensive income by component, either on the face of the statement where net income is presented or in the notes, based on its source and the income statement line items affected by the reclassification. If a component is not required to be reclassified to net income in its entirety (e.g., the net periodic pension cost), we would instead cross reference to the related footnote for additional information (e.g., the pension footnote). The amendment is effective prospectively for reporting periods beginning after December 15, 2012. We are currently evaluating the impact that the adoption of ASU 2013-02 will have on our consolidated financial statements.

In February 2013, the FASB issued ASU 2013-04 *Liabilities* (Topic 405) Obligations Resulting from Joint and Several Liability Arrangements for Which the Total Amount of the Obligation Is Fixed at the Reporting Date. This Update requires an entity to measure obligations resulting from joint and several liability arrangements for which the total amount of the obligation within the scope of this guidance is fixed at the reporting date, as the sum of (a) the amount the reporting entity agreed to pay on the basis of its arrangement among its co-obligors and (b) any additional amount the reporting entity expects to pay on behalf of its co-obligors. It also requires an entity to disclose the nature and amount of the obligation as well as other information about those obligations. The ASU is effective for fiscal years beginning after December 15, 2013 with early adoption permitted. This standard is not expected to have a material impact on our consolidated financial statements.

In February 2013, the FASB issued ASU 2013-05 *Foreign Currency Matters* (Topic 830) Parent's Accounting for the Cumulative Translation Adjustment upon Derecognition of Certain Subsidiaries or Groups of Assets within a Foreign Entity or of an Investment in a Foreign Entity. The amendments in this Update clarify the applicable guidance for the release of the cumulative translation adjustment under current U.S. GAAP. The amendment clarifies the cumulative translation adjustment should be released into net income when the sale of an investment in a foreign entity includes both (1) events that result in the loss of a controlling financial interest in a foreign entity and (2) events that result in an acquirer obtaining control of an acquiree in which it held an equity interest immediately before the acquisition date. The ASU is effective for fiscal years beginning after December 15, 2013. The amendments should be applied prospectively to derecognition events occurring after the effective date. Prior periods should not be adjusted. An entity is permitted to early adopt the amendments, and should apply them as of the beginning of the entity's fiscal year of adoption. We are currently evaluating the potential impact, if any, that the adoption of ASU 2013-05 will have on our consolidated financial statements.

C. Research, Development, Patents and Licenses, Etc.

The semiconductor industry is characterized by rapid changes in technology, frequently resulting in obsolescence of process technologies and products. As a result, effective research and development is essential to our success. We invested approximately NT$8,740 million, NT$9,395 million and NT$9,787 million (US$337 million) in 2010, 2011 and 2012, respectively, in research and development, which represented 6.9%, 8.0% and 8.5%, respectively, of net operating revenues for such years. We believe that our continuous spending on research and development will help us maintain our position as a technological leader in the foundry industry. As of March 31, 2013, we employed 1,127 professionals in our research and development division.

Our current research and development activities seek to upgrade and integrate manufacturing technologies and processes, as well as to drive 28 nanometer technology in mass production, and to develop 14 nanometer technology including EUV (Extreme Ultraviolet) lithography, and FinFET (Fin Field-Effect Transistor). Although we emphasize firm-wide participation in the research and development process, we maintain central research and development teams primarily responsible for developing cost-effective technologies that can serve the manufacturing needs of our customers. Monetary incentives are provided to our employees if projects result in successful patents. We believe we have a strong foundation in research and development and intend to continue our efforts on technology developments. Our top management believes in the value of continued support of research and development efforts and intends to continue our foundry leadership position by providing customers with comprehensive technology and SoC solutions in the industry.

D. Trend Information

Please refer to "Item 5. Operating and Financial Review and Prospects—Overview" for a discussion of the most significant recent trends in our production, sales, costs and selling prices. In addition, please refer to discussions included in this Item for a discussion of known trends, uncertainties, demands, commitments and events that we believe are reasonably likely to have a material effect on our net operating revenues, income from continuing operations, profitability, liquidity or capital resources, or that would cause reported financial information not necessarily to be indicative of future operating results or financial condition.

E. Off-balance Sheet Arrangements

We do not generally provide letters of credit to, or guarantees for, or engage in any repurchase financing transactions with any entity other than our consolidated subsidiaries. We have, from time to time, entered into foreign currency forward contracts to hedge our existing assets and liabilities denominated in foreign currencies and identifiable foreign currency purchase commitments. We do not engage in any speculative activities using derivative instruments. See "Item 11. Quantitative and Qualitative Disclosure About Market Risk".

F. Tabular Disclosure of Contractual Obligations

The following table sets forth our contractual obligations and commitments with definitive payment terms on a consolidated basis which will require significant cash outlays in the future as of December 31, 2012.

	Payments Due by Period				
	Total	Less than 1 Year	1-3 Years	4-5 Years	After 5-Years
	(in NT$ millions)				
Long-term debt (1)					
Unsecured bonds	26,930	—	4,651	12,279	10,000
Long-term loans	14,821	4,595	5,315	4,911	—
Operating lease obligations (2)	4,178	466	786	657	2,269
Purchase obligations (3)	390	152	238	—	—
Other long-term obligations (4)	3,357	3,088	251	7	11
Total contractual cash obligations	49,676	8,301	11,241	17,854	12,280

(1) Assuming the exchangeable bonds, convertible bonds and domestic bonds are paid off upon maturity.
(2) Represents our obligations to make lease payments to use machineries, equipment and land on which our fabs are located, primarily in the Hsinchu Science Park and the Tainan Science Park in Taiwan, Pasir Ris Wafer Fab Park in Singapore.
(3) Represents commitments for purchase of raw materials. These commitments are not recorded on our balance sheet as of December 31, 2012.
(4) Represents intellectual properties and royalties payable under our technology license agreements. The amounts of payments due under these agreements are determined based on fixed contract amounts.

ITEM 6. DIRECTORS, SENIOR MANAGEMENT AND EMPLOYEES

A. Directors and Senior Management

The following table sets forth the name, age, position, tenure and biography of each of our directors and executives as of March 31, 2013. There is no family relationship among any of these persons.

In the stockholders' meeting held on June 12, 2012, our stockholders elected nine new directors, Stan Hung, Wen-Yang Chen, Ting-Yu Lin, Po-Wen Yen, Shih-Wei Sun, Paul S.C. Hsu, Chung-Laung Liu, Chun-Yen Chang and Cheng-Li Huang. The newly elected directors took their offices on June 12, 2012. The business address of our directors and executive officers is the same as our registered address.

Name	Age	Position	Years with Us
Stan Hung	52	Chairman and Director	21
Shih-Wei Sun	55	Vice-Chairman and Director (Representative of Silicon Integrated Systems Corp.)	18
Po-Wen Yen	56	Chief Executive Officer and Director (Representative of Hsun Chieh Investment Co.)	26
Wen-Yang Chen	60	Director (Representative of UMC Science and Culture Foundation) and Chief Operating Officer	33
Ting-Yu Lin	52	Director	7
Paul S.C. Hsu (1)	77	Independent Director	9
Chung-Laung Liu (1)	79	Independent Director	7
Chun-Yen Chang (1)	76	Independent Director	7
Cheng-Li Huang (1)	64	Independent Director	4
Chitung Liu	47	Chief Financial Officer	12

(1) Member of the Audit Committee.

Stan Hung is a director and the Chairman of our company. Mr. Hung was our CFO & Senior Vice President from 2000 to 2007. He was also the Chairman of Epitech Technology Corporation in 2007 and ITE Technology Corporation for a portion of 2008, respectively. Prior to re-joining United Microelectronics Corporation in 1991, Mr. Hung was a financial manager at Optoelectronics Corporation. He is also the Chairman of Fortune Venture Capital Corporation, TLC Capital Co., Nexpower Technology Corporation, UMC New Business Investment Corporation, Best Elite International Limited, Crystalwise Technology Inc., and a Director of Epistar Corporation. Mr. Hung received a bachelor's degree in accounting from Tam Kang University in 1982.

Shih-Wei Sun is a director and the Vice-Chairman of our company. Dr. Sun is a representative of Silicon Integrated Systems Corp. Dr. Sun joined us in 1995 and has been responsible for the operation of our Fabs 6A, 8A, 8D and 12A, along with Central Research & Development. Prior to joining us, Dr. Sun worked for Motorola in the Advanced Products Research and Development Laboratory for ten years. Dr. Sun is also the Chairman of UMC Science and Culture Foundation. Dr. Sun holds a Ph.D. degree in electronics materials from Northwestern University in 1986.

Po-Wen Yen is a director of our company and our Chief Executive Officer. Prior to becoming our Chief Executive Officer, Mr. Yen was our senior vice president responsible for 12-inch operations. Mr. Yen is a representative of Hsun Chieh Investment Co. Mr. Yen joined us in 1986 and was responsible for the operation of Fabs 8A and 8C. He also served as the vice president for UMC-SG, our 300mm operation in Singapore. He is also a director of Fortune Venture Capital Corporation, TLC Capital Co., UMC New Business Investment Corporation, and Best Elite International Limited. In 2003, Mr. Yen received the National Manager Excellence Award from Chinese Professional Management Association. Mr. Yen earned a bachelor's degree in Chemical Engineering from National Tsing Hua University and his master's degree in chemical engineering from National Taiwan University.

Wen-Yang Chen is a director of our company and in 2012 served as our Chief Operating Officer responsible for fab operations. Mr. Chen is a representative of UMC Science and Culture Foundation. Prior to joining us, Mr. Chen worked for companies including Digital Equipment Corporation and Vishay. Mr. Chen joined us in 1980 and was responsible for the operation of our 6A, 8A, 8E, 8D and 8F Fabs, specializing in development and integration of semiconductor processes and factory management. Mr. Chen is also the Chairman of Wavetek Microelectronics Corporation as well as a director of Fortune Venture Capital Corporation, TLC Capital Co., UMC New Business Investment Corporation, and a director of UMC Science and Culture Foundation. Mr. Chen received Award of the Excellent Engineers from Chinese Institute of Engineers in 1994 and Manager Excellence Award in 2002.

Ting-Yu Lin is a director of our company. Mr. Lin is also the chairman of Sunrox International Inc. Mr. Lin received a master's degree in international finance from Meiji University in 1993.

Paul S.C. Hsu is an independent director of our company. Professor Hsu is a Chair Professor & University Professor of Yuan-Ze University, Taiwan, the Chairman of Social Ethics Association and the Chairman of Taiwan Institute of Directors. Professor Hsu is an independent director of Faraday Technology Corporation and Gintech Energy Corporation and a supervisor of Far Eastern International Bank. Professor Hsu received a Ph.D. degree in business administration from the University of Michigan in 1974.

Chung-Laung Liu is an independent director of our company. Professor Liu is the William M.W. Mong Honorary Chair Professor of National Tsing Hua University, Taiwan. Professor Liu is also the Chairman of DRAMeXchange Corporation, a supervisor of MediaTek Incorporation, an independent director of Richteck Technology Corp., and Powerchip semiconductor Corp., as well as a director of Macronix International Co., Ltd. Professor Liu received a doctorate degree in science from Massachusetts Institute of Technology in 1962.

Chun-Yen Chang is an independent director of our company. Professor Chang is an academician of Academia Sinica and a chair professor and president of National Chiao Tung University, Taiwan. Professor Chang is also an independent director of BizLink Holding Inc. Professor Chang received a Ph.D. degree in electrical engineering from National Chiao Tung University in 1970.

Cheng-Li Huang is an independent director of our company. Dr. Huang was a professor of Tamkang University and served as its Comptroller. He was also the chief executive of Tamkang Accounting Education Foundation and the publisher of Journal of Contemporary Accounting. Professor Huang is also a supervisor of Win Semiconductors Corp. Professor Huang received a Ph.D. degree in accounting from University of Warwick in 1999.

Chitung Liu is the Chief Financial Officer of our company. Prior to joining our company in 2001, Mr. Liu was a managing director of UBS. Mr. Liu is also a director of Unimicron Corporation, UMC New Business Investment Corporation Fortune Venture Capital Corporation, TLC Capital Co., Ltd. and Nexpower Technology Corp., Mr. Liu received an executive MBA degree from National Taiwan University in 2009.

B. Compensation

The aggregate compensation paid and benefits in kind granted to our directors in 2012 were approximately NT$11 million (US$0.36million). The remuneration was out of our 2012 earnings distribution plan, and the distribution percentage for directors is 0.1%. See "Item 10. Additional Information-B. Memorandum and Articles of Association-Dividends and Distributions". Some of the remuneration was paid to the legal entities which some of our directors represent. The aggregate compensation paid and benefits in kind granted to our executive officers in 2012 were approximately NT$138 million (US$4.75 million), which include NT$51 million as bonus. Certain of our directors who also served as executive officers held stock options to purchase 10.7 million shares as of March 31, 2013.

C. Board Practices

All of our directors were elected in June 2012 for a term of three years. Neither we nor any of our subsidiaries has entered into a contract with any of our directors by which our directors are expected to receive benefits upon termination of their employment.

Our board of directors established an audit committee in March 2005. In the annual ordinary stockholders' meeting held on June 13, 2008, we amended our articles of incorporation to introduce the mechanism of an Audit Committee. See "Item 10. Additional Information—B. Memorandum and Articles of Association—Directors". After the re-election of directors in the stockholders' meeting on June 12, 2012, our board of directors appointed Paul S.C. Hsu, Chung-Laung Liu, Chun-Yen Chang and Cheng-Li Huang to be the members of the audit committee. Each audit committee member is an independent director who is financially literate with accounting or related financial management expertise. The audit committee meets as often as it deems necessary to carry out its responsibilities. Pursuant to an audit committee charter, the audit committee has responsibility for, among other things, overseeing the qualifications, independence and performance of our internal audit function and independent auditors, and overseeing the accounting policies and financial reporting and disclosure practices of our company. The audit committee also has the authority to engage special legal, accounting or other consultants it deems necessary in the performance of its duties.

Remuneration Committee

The R.O.C. Securities and Exchange Act, as amended on November 24, 2010, further introduced the mechanism of a "Remuneration Committee", which requires all the publicly listed companies in the R.O.C., including our company, to adopt a remuneration committee. On March 18, 2011, R.O.C. FSC promulgated the Regulations Governing the Establishment and Exercise of Powers by Compensation Committees of Public Companies, according to which, listing companies of our size shall set up the compensation committee no later than September 30, 2011 and the remuneration committee shall be composed of no less than three members commissioned by the board of directors. In addition, for a company with independent directors, such as us, at least one of committee members shall be the independent director of such company. We established a remuneration committee in accordance with Article 14-6 of the R.O.C. Securities and Exchange Act on April 27, 2011. The members of the remuneration committee are independent directors Chun-Yen Chang, Chung-Laung Liu, Paul S.C. Hsu, and Cheng-Li Huang, with Chun-Yen Chang serving as convener and chairperson. We amended our articles of incorporation to introduce the mechanism of our remuneration committee in the annual ordinary stockholders' meeting held on June 15, 2011.

In November 2003, the Securities and Exchange Commission approved changes to the NYSE's listing standards related to the corporate governance practices of listed companies. Under these rules, listed foreign private issuers, like us, must disclose any significant ways in which their corporate governance practices differ from those followed by NYSE-listed U.S. domestic companies under the NYSE's listing standards. A copy of the significant differences between our corporate governance practices and NYSE corporate governance rules applicable to U.S. companies is available on our website http://www.umc.com/english/investors/Corpgovdifference.asp.

D. Employees

As of March 31, 2013, we had 13,722 employees, which includes 7,857 engineers, 5,392 technicians and 473 administrative staff performing administrative functions in Taiwan and our Singapore branch. We have in the past implemented, and may in the future evaluate the need to implement, labor redundancy plans based on the work performance of our employees.

	As of December 31,		
	2010	2011	2012
Employees			
Engineers	7,365	7,581	7,857
Technicians	5,835	5,456	5,392
Administrative Staff	471	462	473
Total	13,671	13,499	13,722

Employee salaries are reviewed annually. Salaries are adjusted based on industry standards, inflation and individual performance. As an incentive, additional bonuses in cash may be paid at the discretion of management based on the performance of individuals. In addition, except under certain circumstances, R.O.C. law requires us to reserve from 10% to 15% of any offerings of our new shares for employees' subscription.

Our employees participate in our profit distribution pursuant to our articles of incorporation. Employees are entitled to receive additional bonuses based on a certain percentage of our allocable surplus income. On March 13, 2013, the board of directors proposed an employee bonus in cash in the amount of NT$1,040 million (US$35.81 million) in relation to retained earnings in 2012.

Our employees are not covered by any collective bargaining agreements. We believe we have a good relationship with our employees.

E. Share Ownership

As of March 31, 2013, each of our directors and executive officers held shares and/or ADSs of United Microelectronics, either directly for their own account or indirectly as the representative of another legal entity on our board of directors, except for Chung-Laung Liu, Paul S.C. Hsu, Chun-Yen Chang and Cheng-Li Huang, our independent directors. As of March 31, 2013, none of our directors or executive officers held, for their own account, 0.1% or more of our outstanding shares. As of April 13, 2013, our most recent record date, Hsun Chieh Investment Co. held approximately 441 million of our shares, representing approximately 3.4% of our issued shares. Silicon Integrated Systems Corp. held approximately 315 million of our shares, representing approximately 2.4% of our issued shares. Stan Hung held approximately 14 million of our shares, representing approximately 0.1% of our issued shares. Ting-Yu Lin held approximately 13 million of our shares, representing approximately 0.1% of our issued shares. We have an Employee Stock Options Plan, pursuant to which options may be granted to our full-time regular employees, including those of our domestic and overseas subsidiaries. The exercise price for the options would be the closing price of our common shares on the Taiwan Stock Exchange on the day the options are granted, while the expiration date for such options is 6 years from the date of its issuance. In September 2004, December 2005, October 2007 and May 2009, we obtained approvals from relevant R.O.C. authorities for the grant of up to 150 million, 350 million, 500 million and 500 million stock options, respectively, to acquire our common shares under our Employee Stock Options Plan. In April 2005, August 2005, September 2005, January 2006, May 2006, August 2006, December 2007 and June 2009, we granted 23 million, 54 million, 52 million, 39 million, 42 million, 28 million, 500 million and 300 million stock options, respectively, to our employees, with an exercise price of 22.37, 29.47, 26.89, 23.17, 25.19, 24.09, 18.03 and 10.40, respectively. The 23 million stock options with exercise price of 22.37 that we granted in April 2005, the 54 million stock options with exercise price of 29.47 that we granted in August 2005, the 52 million stock options with exercise price of 26.89 that we granted in September 2005, and the 39 million stock options with exercise price of 23.17 that we granted in January 2006, expired on April 28, 2011, August 15, 2011, September 28, 2011 and January 3, 2012, respectively.

According to our Employee Stock Options Plan, an option holder may exercise an increasing portion of his or her options starting two years after the grant of the options. According to the vesting schedule, 50%, 75% and 100% of such option holder's options shall vest two, three and four years after the grant of the options, respectively. Upon a voluntary termination or termination in accordance with the R.O.C. Labor Law, the option holder shall exercise his or her vested options within 30 days, subject to exceptions provided therein, and after the termination otherwise such options shall terminate. If termination was due to death, the heirs of such option holder have one year starting from the date of the death to exercise his or her vested options. If termination was due to retirement or occupational casualty, the option holder or his or her heirs may exercise all his or her options within a certain period as provided. The options are generally not transferable or pledgeable by the option holders. The total number of shares issuable upon exercise of option held by our directors and executive officers as of March 31, 2013 was 23.3 million. The units granted to each of our directors and executive officers as a percentage of our total shares as of March 31, 2013 were less than 1%.

ITEM 7. MAJOR STOCKHOLDERS AND RELATED PARTY TRANSACTIONS

A. Major Stockholders

The following table sets forth information known to us with respect to the beneficial ownership of our shares as of (i) April 13, 2013, our most recent record date and (ii) as of certain record dates in each of the preceding three years, for (1) the stockholders known by us to beneficially own more than 2% of our shares and (2) all directors and executive officers as a group. Beneficial ownership is determined in accordance with Securities and Exchange Commission rules.

	As of April 17, 2011	As of April 14, 2012	As of April 13, 2013	
	Percentage of shares beneficially owned	Percentage of shares beneficially owned	Percentage of shares beneficially owned	Number of shares beneficially owned
Name of Beneficial Owner				
Hsun Chieh Investment Co., Ltd. (1)	3.4%	3.4%	3.4%	441,371,000
Silicon Integrated Systems Corp.	2.4%	2.4%	2.4%	315,380,424
Directors and executive officers as a group	6.22%	6.26%	6.27%	811,875,046

(1) 36.5% owned by United Microelectronics Corp. as of March 31, 2013.

None of our major stockholders have different voting rights from those of our other stockholders. To the best of our knowledge, we are not directly or indirectly controlled by another corporation, by any foreign government or by any other natural or legal person severally or jointly.

For information regarding our shares held or beneficially owned by persons in the United States, see "Item 9. The Offer and Listing-A. Offer and Listing Details-Market Price Information for Our American Depositary Shares" in this annual report.

B. Related Party Transactions

From time to time we have engaged in a variety of transactions with our affiliates. We generally conduct transactions with our affiliates on an arm's-length basis. The sales and purchase prices with related parties are determined through negotiation, generally based on market price.

The following table shows our aggregate ownership interest, on a consolidated basis, in major related fabless design companies that we enter into transactions from time to time as of December 31, 2012.

Name	Ownership %
Silicon Integrated Systems Corp.	19.26

We provide foundry services to these fabless design companies on arm's-length prices and terms. We derived NT$777 million, NT$237 million and NT$256 million (US$9 million) of our net operating revenues in 2010, 2011 and 2012, from the provision of our foundry services to these fabless design companies.

C. Interests of Experts and Counsel

Not applicable.

ITEM 8. FINANCIAL INFORMATION

A. Consolidated Statements and Other Financial Information

Please refer to Item 18 for a list of all financial statements filed as part of this annual report on Form 20-F.

Except as described in "Item 4. Information on the Company-B. Business Overview-Litigation", we are not currently involved in material litigation or other proceedings that may have, or have had in the recent past, significant effects on our financial position or profitability.

As for our policy on dividend distributions, see "Item 10. Additional Information—B. Memorandum and Articles of Association— Dividends and Distributions". On June 15, 2010, our stockholders approved a cash dividend of NT$0.5 per share for an aggregate of NT$6,233,001,658. On June 15, 2011, our stockholders approved a cash dividend of NT$1.12 per share for an aggregate of NT$14,033,575,265. On July 8, 2011, the Board of Directors resolved to adjust the cash dividend ratio to NTD$1.11164840 per share, because the outstanding common shares had increased accordingly as a result of the exercise of employee stock options. On June 12, 2012, our stockholders approved a cash dividend of NT$0.5 per share for an aggregate of NT$6,316,434,833. On June 20, 2012, the Board of Directors resolved to adjust the cash dividend ratio to NTD$ 0.49980232 per share, because the outstanding common shares had increased accordingly as a result of the exercise of employee stock options. On March 13, 2013, the board of directors proposed dividends of NT$ 5,061,310,216 (approximately NT$0.4 per share).

The following table sets forth the cash dividends per share and stock dividends per share as a percentage of shares outstanding paid during each of the years indicated in respect of shares outstanding at the end of each such year, except as otherwise noted.

	Cash Dividend per Share	Stock Dividend per Share	Total Number of Shares Issued as Stock Dividend	Number of Outstanding Shares at Year End
	NT$	NT$		
1997	—	3.0	868,629,276	4,117,758,265
1998	—	2.9	1,199,052,940	5,480,221,725
1999	—	1.5	834,140,790	6,638,054,462
2000	—	2.0	1,809,853,716	11,439,016,900
2001	—	1.5	1,715,104,035	13,169,235,416
2002	—	1.5	1,968,018,212	15,238,578,646
2003	—	0.4	607,925,145	15,941,901,463
2004	—	0.8	1,288,558,185	17,550,800,859
2005	0.1029	1.029	1,758,736,435	18,856,632,324
2006	0.409141420	0.10228530	179,031,672	19,131,192,690
2007	0.7	—	—	13,214,494,883
2008	0.75	0.45	562,958,816	12,987,771,315
2009	—	—	—	12,987,771,315
2010	0.5	—	—	12,987,912,315
2011	1.11164840	—	—	13,084,341,565
2012	0.49980232			12,951,805,540

(1) We declare stock dividends in a NT dollar amount per share, but we pay the stock dividends to our stockholders in the form of shares. The amount of shares distributed to each stockholder is calculated by multiplying the dividend declared by the number of shares held by the given stockholder, divided by the par value of NT$10 per share. Fractional shares are not issued but are paid in cash.

B. Significant Changes

For the significant subsequent events following the close of the last financial year up to the date of this annual report on Form 20-F, please refer to Note 31 to the consolidated financial statements.

ITEM 9. THE OFFER AND LISTING

A. Offer and Listing Details

Market Price Information for Our Shares

Our shares have been listed on the Taiwan Stock Exchange since July 1985. There is no public market outside Taiwan for our shares. The table below shows, for the periods indicated, the high and low closing prices and the average daily volume of trading activity on the Taiwan Stock Exchange for our shares. The closing price for our shares on the Taiwan Stock Exchange on April 24, 2013 was NT$11.40 per share.

	High NT$	Low NT$	Average Daily Trading Volume (in thousands of shares)
2008	20.30	6.80	37,521.00
2009	17.20	7.10	85,869.55
2010	18.60	12.95	53,660.37
2011	18.10	10.45	44,048.44
First Quarter	18.10	14.10	70,662.07
Second Quarter	15.60	13.95	37,160.89
Third Quarter	14.45	10.45	43,958.27
Fourth Quarter	13.35	11.30	27,100.94
2012	15.65	10.10	39,247.79
First Quarter	15.65	12.60	43,434.55
Second Quarter	15.55	11.80	37,797.20
Third Quarter	13.40	11.65	32,337.63
Fourth Quarter	12.10	10.10	43,721.73
October	12.10	10.85	22,459.78
November	11.25	10.10	45,008.93
December	12.00	11.10	64,647.67
2013 (through April 24)	12.40	10.90	41,684.47
First Quarter	12.40	10.90	43,751.54
January	12.40	11.20	49,116.86
February	11.65	11.10	34,449.92
March	11.60	10.90	43,293.25
Second Quarter (through April 24)	11.40	11.00	35,231.50
April (through April 24)	11.40	11.00	35,231.50

Source: Taiwan Stock Exchange.

(1) Information has been adjusted to give effect to 562,958,816 Shares and 114,616,567 Shares issued as stock dividend and employee bonus, respectively, in August 2008.

Market Price Information for Our American Depositary Shares

Our ADSs have been listed on the NYSE under the symbol “UMC” since September 19, 2000. The outstanding ADSs are identified by the CUSIP number 910873 40 5. The table below shows, for the periods indicated, the high and low closing prices and the average daily volume of trading activity on the NYSE for our ADSs. The closing price for our ADSs on the New York Stock Exchange on April 23, 2013 was US$1.85 per ADS. Each of our ADSs represents the right to receive five shares.

	High NT$	Low NT$	Average Daily Trading Volume (in thousands of shares)
2008	3.71	1.51	5,780,890
2009	3.88	1.65	5,106,249
2010	4.22	2.55	3,932,515
2011	3.46	1.79	3,454,527
First Quarter	3.46	2.50	4,156,134
Second Quarter	2.84	2.46	3,632,388
Third Quarter	2.56	1.79	3,540,807
Fourth Quarter	2.35	1.85	2,498,545
2012	2.72	1.75	2,733,811
First Quarter	2.72	2.14	3,363,260
Second Quarter	2.72	1.95	3,401,801
Third Quarter	2.24	1.98	2,305,720
Fourth Quarter	2.10	1.75	1,860,593
October	2.10	1.88	1,452,582
November	1.96	1.75	1,985,330
December	2.05	1.89	2,158,031
2013 (through April 23)	2.15	1.77	2,458,650
First Quarter	2.15	1.80	2,651,914
January	2.15	1.92	3,887,406
February	1.95	1.81	2,092,008
March	1.91	1.80	1,886,557
Second Quarter (through April 23)	1.85	1.77	1,776,543
April (through April 23)	1.85	1.77	1,776,543

Sources: Bloomberg

As of March 31, 2013, there were a total of 229,568,276 ADSs listed on the NYSE. With certain limited exceptions, holders of shares that are not R.O.C. persons are required to hold these shares through a brokerage or custodial account in the R.O.C. As of March 31, 2013, 1,147,841,380 ordinary shares were registered in the name of a nominee of JPMorgan Chase & Co., the depositary under the deposit agreement. JPMorgan Chase & Co. has advised us that, as of March 31, 2013, 229,351,559 ADSs representing these 1,146,757,795 shares were held of record by Cede & Co., and 216,717 ADSs were held by U.S. registered stockholders. We have no further information as to shares held or beneficially owned by U.S. persons.

B. Plan of Distribution

Not applicable.

C. Markets

The principal trading markets for our shares are the Taiwan Stock Exchange and the New York Stock Exchange, on which our shares trade in the form of ADSs.

D. Selling Stockholders

Not applicable.

E. Dilution

Not applicable.

F. Expenses of the Issue

Not applicable.

ITEM 10. ADDITIONAL INFORMATION

A. Share Capital

Not applicable.

B. Memorandum and Articles of Association

The following statements summarize the material elements of our capital structure and the more important rights and privileges of stockholders conferred by R.O.C. law and our articles of incorporation.

Objects and Purpose

The scope of business of United Microelectronics as set forth in Article 2 of our articles of incorporation, includes (i) integrated circuits; (ii) semiconductor parts and components; (iii) parts and components of microcomputers, microprocessors, peripheral support and system products; (iv) parts and components of semiconductor memory systems products; (v) semiconductor parts and components for digital transceiver product and system products; (vi) semiconductor parts and components for telecom system and system products; (vii) testing and packaging of integrated circuits; (viii) mask production; (ix) research and development, design, production, sales, promotion and after-sale services related to our business; and (x) export/import trade related to our business.

Directors

The R.O.C. Company Act and our articles of incorporation provide that our board of directors is elected by stockholders and is responsible for the management of our business. As of March 31, 2013, our board of directors consisted of nine directors, out of which four are independent directors. In the annual ordinary stockholders' meeting held on June 11, 2007, we amended our articles of incorporation to abolish the managing director mechanism. In the annual ordinary stockholders' meeting held on June 13, 2008, we amended our articles of incorporation to introduce the mechanism of an Audit Committee. The Chairman presides at all meetings of our board of directors, and also has the authority to represent our company. The term of office for our directors is three years, and our directors are elected by our stockholders by means of cumulative voting. The amendment to our articles of incorporation on June 11, 2007 also adopts a nomination system which provides that holders of one percent or more of the total issued and outstanding shares of our company would be entitled to submit a roster of candidates to be considered for nomination to our company's board of directors at a stockholders' meeting involving the election of directors. Pursuant to the R.O.C. Company Act, a person may serve as our director in his or her personal capacity or as the representative of another legal entity. A legal entity that owns our shares may be elected as a director, in which case a natural person must be designated to act as the legal entity's representative. A legal entity that is our stockholder may designate its representative to be elected as our director on its behalf. In the event several representatives are designated by the same legal entity, any or all of them may be elected. A director who serves as the representative of a legal entity may be removed or replaced at any time at the discretion of such legal entity, and the replacement director may serve the remainder of the term of office of the replaced director. As of March 31, 2013, three of our nine directors are representatives of other legal entities, as shown in "Item 6. Directors, Senior Management and Employees—A. Directors and Senior Management".

According to the Company Act and the rules promulgated under the Securities and Exchange Act, a director who has a personal interest in a matter to be discussed at the meeting of the board of directors, the outcome of which may conflict with his interests, shall explain the essential contents of such personal interest in the meeting of the board of directors and then abstain from joining the discussion and voting on such matter. Our articles of incorporation, as amended on June 13, 2008, provide that the board of directors is authorized, by taking into account of the extent of his/her/its involvement of our operation activities and the value of his/her/its contribution, to determine the compensation for each director at a comparable rate adopted by other companies of the same industry regardless of the profit received by our company. In addition, according to our articles of incorporation, we may distribute 0.1% of the balance of our earnings after deduction of payment of all taxes and dues, deduction of any past losses, allocation of 10% of our net income as a legal reserve, and allocation of special reserve according to applicable laws and regulations or the order of the competent authority, if any, as remuneration to directors. Our articles of incorporation do not impose a mandatory retirement age limit for our directors. Furthermore, our articles of incorporation do not impose a shareholding qualification for each director, while the laws and regulations require the aggregate shareholding of all directors, excluding independent directors, to meet certain thresholds considering the paid-in capital and the numbers of the independent directors. According to our current internal Loan Procedures, as amended in our annual stockholders' meeting held in June 15, 2010, we shall not extend any loan to our directors.

In order to strengthen corporate governance of companies in Taiwan, effective from January 1, 2007, the amended R.O.C. Securities and Exchange Act authorizes the R.O.C. FSC, after considering certain factors, including the scale, shareholding structure and business nature of a public company, to require that a public company, such as our company, meet certain criteria, including having at least two independent directors but not less than one fifth of the total number of directors.

In addition, pursuant to the amended R.O.C. Securities and Exchange Act, a public company is required to either establish an audit committee, or R.O.C. Audit Committee, or retain supervisors, provided that the R.O.C. FSC may, after considering the scale and business nature of a public company and other necessary situation, require the company to establish an audit committee in place of its supervisors. Currently, the R.O.C. FSC has not promulgated such compulsory rules, and all public companies may, at their discretion, retain either an R.O.C. Audit Committee or supervisors. We amended our articles of incorporation in the annual ordinary stockholders' meeting held on June 13, 2008, introducing the mechanism of an R.O.C. Audit Committee. According to our latest amended articles of incorporation and audit committee charter, our R.O.C. Audit Committee is composed of all independent directors and performs the power and duties provided by applicable laws and regulations, including without limitation the powers and the duties of supervisors provided under the R.O.C. Company Act. A company is not allowed to maintain both supervisors and a R.O.C. Audit Committee, so we chose to eliminate our supervisers when we established our R.O.C. Audit Committee in 2009.

According to our articles of incorporation, as amended on June 13, 2008, we may purchase directors and officers liability insurance for our directors, covering the liabilities incurred in relation to his/her/its operation of business and legally responsible for.

Shares

As of December 31, 2012, our authorized share capital was NT$260 billion, divided into 26 billion shares, of which 12,951,805,540 shares were issued and 12,951,805,540 shares were outstanding (including 303,750 shares of capital collected in advance). All shares presently issued are fully paid and in registered form, and existing stockholders are not subject to any capital calls. We had US$428 million convertible bonds outstanding as of March 31, 2013. As of March 31, 2013, we had neither warrant nor option on our shares, except for the options exercisable for 460.7 million common shares granted to our employees under our Employee Stock Options Plan discussed below.

Employee Stock Option

According to our Employee Stock Options Plan, options may be granted to our full-time regular employees, including those of our domestic and overseas subsidiaries. In September 2004, December 2005, October 2007 and May 2009, we obtained approval by relevant R.O.C. authorities to grant up to 150 million, 350 million, 500 million and 500 million stock options, respectively, to acquire our common shares under our Employee Stock Option Plan. According to the plan, an option holder may exercise an increasing portion of his or her options in time starting two years after the grant of the options. According to the vesting schedule, 50%, 75% and 100% of such option holder's options shall vest two, three and four years after the grant of the options, respectively.

The table below shows the number of options granted and outstanding and the month in which they were granted:

	January 2006
Number of Options Granted	39
Number of Options Outstanding as of March 31, 2013	0
Shares available to option holders as of March 31, 2013	0

	May 2006	August 2006	December 2007	June 2009
Number of Options Granted	42	28	500	300
Number of Options Outstanding as of March 31, 2013	0	0	330.7	130.0
Shares available to option holders as of March 31, 2013	0	0	330.7	130.0

Note: The employee stock options granted prior to August 7, 2007, the effective date of capital reduction, were adjusted in accordance with capital reduction rate. Each option unit entitles an optionee to subscribe for about 0.7 share of our common stock. The exercise price of the options was also adjusted according to the capital reduction rate. Each stock option unit granted after August 7, 2007 remains to be subscribed for one share of our common stock.

New Shares and Preemptive Rights

New shares may only be issued with the prior approval of our board of directors. If our issuance of any new shares will result in any change in our authorized share capital, we are required under R.O.C. law to amend our articles of incorporation and obtain approval of our stockholders in a stockholders' meeting. We must also obtain the approval of, or submit a registration with, the R.O.C. FSC and the Science Park Administration. According to the R.O.C. Company Act, when a company issues capital stock for cash, 10% to 15% of the issue must be offered to its employees. In addition, if a listed company intends to offer new shares for cash, at least 10% of the issue must also be offered to the public. This percentage can be increased by a resolution passed at a stockholders' meeting, which will reduce the number of new shares in which existing stockholders may have preemptive rights. Unless the percentage of the shares offered to the public is increased by a resolution, existing stockholders of the company have a preemptive right to acquire the remaining 75% to 80% of the issue in proportion to their existing shareholdings. According to the Corporate Merger and Acquisition Act of the R.O.C., as effective on February 8, 2002, and amended on May 5, 2004, if new shares issued by our company are solely for the purpose of acquisition, share swap or spin-off, the above-mentioned restrictions, including the employee stock ownership plan, the preemptive rights of the existing stockholders and the publicity requirement of a listed company, to such issuance of new shares may not be applied.

Stockholders

We only recognize persons registered in our register as our stockholders. We may set a record date and close our register of stockholders for specified periods to determine which stockholders are entitled to various rights pertaining to our shares.

Transfer of Shares

Under the R.O.C. Company Act, a public company, such as our company, may issue individual share certificates, one master certificate or no certificate at all, to evidence common shares. Our articles of incorporation, as amended on June 13, 2008, provide that we may deliver shares in book-entry form instead of by means of issuing physical share certificates. We have issued our shares in uncertificated/scripless form since 2007. Therefore, the transfer of our shares is carried out on the book-entry system. The settlement of trading of our shares is normally carried out on the book-entry system maintained by the Taiwan Depositary and Clearing Corporation. Transferees must have their names and addresses registered on our register in order to assert stockholder's rights against us. Our stockholders are required to file their respective specimen seals with our share registrar, Horizon Securities Co., Ltd.

Stockholders' Meetings

We are required to hold an annual ordinary stockholders' meeting once every calendar year within six months from the end of each fiscal year. Our board of directors may convene an extraordinary meeting whenever the directors deem necessary, and they must do so if requested in writing by stockholders holding no less than 3% of our paid-in share capital who have held these shares for more than a year. At least 15 days' advance written notice must be given of every extraordinary stockholders' meeting and at least 30 days' advance written notice must be given of every annual ordinary stockholders' meeting. Unless otherwise required by law or by our articles of incorporation, voting for an ordinary resolution requires an affirmative vote of a simple majority of those present. A distribution of cash dividends would be an example of an ordinary resolution. The R.O.C. Company Act also provides that in order to approve certain major corporate actions, including any amendment of our articles of incorporation, dissolution, merger or spin-off, entering into, amendment, or termination of any contract for lease of the company's business in whole, or for entrusted business, or for joint operation with others on regular basis, the transfer of all or an essential part of the business or assets, accept all of the business or assets of any other company which would have a significant impact in our operations, removing directors or the distribution of dividend in stock form, a special resolution shall be adopted by the holders of the majority of our shares represented at a stockholders' meeting at which holders of at least two-thirds of our issued and outstanding shares are present. However, in the case of a public company, such as our company, such resolution may be adopted by the holders of at least two-thirds of the shares represented at a stockholders' meeting at which holders of at least a majority of our issued and outstanding shares are present. However, if we are the controlling company and hold no less than 90% of our subordinate company's outstanding shares, our merger with the subordinate company can be approved by a board resolution adopted by majority consent at a meeting with two-thirds of our directors present without stockholders' approval. In addition, according to the Corporate Merger and Acquisition Act of the R.O.C., if a company intends to transfer all or an essential part of its business or assets to its wholly-owned subsidiary, subject to the qualifications set forth in the said act, such transaction only needs to be approved by majority board resolution rather than special resolution by the stockholder's meeting as required by the R.O.C. Company Act.

Voting Rights

Each common share is generally entitled to one vote and no voting discount will be applied. However, treasury shares and our common shares held by (i) an entity in which we own more than 50% of the voting shares or paid-in capital, or (ii) a third party in which we and an entity controlled by us jointly own, directly or indirectly, more than 50% of the voting shares or paid-in capital are not entitled to any vote. Except as otherwise provided by law or our articles of incorporation, a resolution can be adopted by the holders of a simple majority of the total issued and outstanding shares represented at a stockholders' meeting. The quorum for a stockholders' meeting to discuss the ordinary resolutions is a majority of the total issued and outstanding shares. Pursuant to R.O.C Company Act amended on December 28, 2011, the election of directors by our stockholders shall be conducted by means of cumulative voting rather than other voting mechanisms adopted in our articles of incorporation. In all other matters, a stockholder must cast all his or her votes in the same manner when voting on any of these matters.

Our stockholders may be represented at an ordinary or extraordinary stockholders' meeting by proxy if a valid proxy form is delivered to us five days before the commencement of the ordinary or extraordinary stockholders' meeting, unless such proxy has been revoked no later than two days before the date of the stockholders' meeting. Voting rights attached to our shares exercised by our stockholders' proxy are subject to the proxy regulation promulgated by the R.O.C. FSC.

Authorized by latest amendment of the R.O.C Company Act, the R.O.C. FSC has issued an administrative order in February 20, 2012 to require Taiwan Stock Exchange-listed companies, such as our company, and GreTai Securities Market-listed companies in the R.O.C. with NT$10 billion or more of paid-in share capital and with 10,000 or more stockholders as of the first date of the close period applicable to the stockholders' meeting to adopt an e-voting system for stockholders' meeting. The e-voting system provides a new platform for stockholders to exercise their voting rights online. As a company that meets the foregoing criteria, we have successfully adopted the e-voting system in the 2012 stockholders' meeting and voted by poll on each agenda for discussion.

Any stockholder who has a personal interest in a matter to be discussed at our stockholders' meeting, the outcome of which may impair our interests, shall not vote or exercise voting rights on behalf of another stockholder on such matter.

According to the R.O.C. Company Act newly amended on January 4, 2012, a stockholder of a public company who holds shares for others, such as a depositary, may choose to exercise his/her/its voting power separately. On April 13, 2012, R.O.C. FSC promulgated the Regulations Governing the Split Voting of the Stockholders and Compliance Matters for Public Companies, the implementation rules of such split voting method, which stipulates that the depository of the overseas depositary receipts may exercise its voting power separately in accordance with the instructions of the respective holders of the ADS. Notwithstanding the foregoing, before any amendment to the currently effective Deposit Agreement is made, holders of our ADSs generally will not be able to exercise voting rights on the shares underlying their ADSs on an individual basis.

Dividends and Distributions

We are not allowed under R.O.C. law to pay dividends on our treasury shares. We may distribute dividends on our issued and outstanding shares if we have earnings. Before distributing a dividend to stockholders, among other things, we must recover any past losses, pay all outstanding taxes and set aside a legal reserve equivalent to 10% of our net income until our legal reserve equals our paid-in capital, and a special reserve, if any.

At an annual ordinary stockholders' meeting, our board of directors submits to the stockholders for their approval proposals for the distribution of dividends or the making of any other distribution to stockholders from our net income or reserves for the preceding fiscal year. Dividends are paid to stockholders proportionately. Dividends may be distributed either in cash or in shares or a combination of cash and shares, as determined by the stockholders at such meeting.

Our articles of incorporation provide that we may distribute as remuneration to directors 0.1% of the balance of our earnings deducted by:

- payment of all taxes and dues;
- deduction of any past losses;
- allocation of 10% of our net income as a legal reserve; and
- special reserve, if any.

The amount of no less than 5% of the residual amount after the deductions illustrated above, plus, at discretion, any undistributed earnings from previous years, shall be distributed as bonus to employees. Originally, the distribution of employee bonus were in the form of new shares; in the annual ordinary stockholders' meeting held in June 2005, our stockholders approved an amendment of our articles of incorporation to enable the distribution of employee bonus in the form of cash or in shares. Employees eligible for such distribution may include certain qualified employees from our subordinate companies and the qualification of such employees is to be determined by our board of directors. The remaining amount may be distributed according to the distribution plan proposed by our board of directors based on our dividend policy, and submitted to the stockholders' meeting for approval.

In the annual ordinary stockholders' meeting held in June 2005, our stockholders approved a change of the percentage of stock dividend issued to our stockholders, if any, to no more than 80% and cash dividend, if any, to no less than 20%.

In addition to permitting dividends to be paid out of net income, we are permitted under the R.O.C. Company Act to make distributions to our stockholders of additional shares by capitalizing reserves, including the legal reserve and capital surplus of premiums from issuing stock and earnings from gifts received, or make such distributions by cash, if we do not have losses. However, where legal reserve is distributed by capitalization or in cash, only the portion of legal reserve which exceeds 25 percent of the paid-in capital may be distributed.

For information as to R.O.C. taxes on dividends and distributions, see "—E. R.O.C. Tax Considerations" in this Item.

Acquisition of Our Shares by Us

An R.O.C. company may not acquire its own common shares, except under certain exceptions provided in the R.O.C. Company Act or the R.O.C. Securities and Exchange Act. Under the amendments to the R.O.C. Company Act, which took effect on November 14, 2001, a company may purchase up to 5% of its issued common shares for transfer to employees in accordance with a resolution of its board of directors, passed by a majority vote, at a meeting with at least two-thirds of the directors present.

Under Article 28-2, an amendment to the R.O.C. Securities and Exchange Act, which took effect on July 21, 2000, we may, by a board resolution adopted by majority consent at a meeting with two-thirds of our directors present, purchase up to 10% of our issued shares on the Taiwan Stock Exchange or by a tender offer, in accordance with the procedures prescribed by the R.O.C. FSC, for the following purposes:

- to transfer shares to our employees;
- to transfer upon conversion of bonds with warrants, preferred shares with warrants, convertible bonds, convertible preferred shares or certificates of warrants issued by us; and
- if necessary, to maintain our credit and our stockholders' equity; provided that the shares so purchased shall be canceled thereafter.

We have from time to time announced plans, none of which was binding on us, to buy back up to a fixed amount of our shares on the Taiwan Stock Exchange at the price range set forth in the plans. In 2009 and 2010, we purchased an aggregate of 300 million and 300 million, respectively, of our shares under these plans. From December 17, 2008 to February 16, 2009, we purchased 300 million of our shares on the Taiwan Stock Exchange at an average price of $7.98 per share to transfer to our employees. From February 3, 2010 to April 2, 2010, we purchased 300 million of our shares on the Taiwan Stock Exchange at an average price of NT$16.15 per share to transfer to our employees. Of the repurchased shares, 137 million, 97 million, 78 million and 64 million shares were purchased by our employees in November 2003, December 2007, December 2009, and December 2010, respectively. On March 14, 2012, the board of directors approved the cancellation on treasury share of 157,934,400 shares which was bought from December 17, 2008 to February 16, 2009.

In addition, we may not spend more than the aggregate amount of the retained earnings, the premium from issuing stock and the realized portion of the capital reserve to purchase our shares.

We may not pledge or hypothecate any purchased shares. In addition, we may not exercise any stockholders' rights attached to such shares. In the event that we purchase our shares on the Taiwan Stock Exchange, our affiliates, directors, managers and their respective spouses and minor children and/or nominees are prohibited from selling any of our shares during the period in which we purchase our shares.

In addition to the share purchase restriction, the Company Act provides that our subsidiaries may not acquire our shares or the shares of our majority-owned subsidiaries if the majority of the outstanding voting shares or paid-in capital of such subsidiary is directly or indirectly held by us.

Liquidation Rights

In a liquidation, you will be entitled to participate in any surplus assets after payment of all debts, liquidation expenses and taxes proportionately.

Rights to Bring Stockholders' Suits

Under the R.O.C. Company Act, a stockholder may bring suit against us in the following events:

- within 30 days from the date on which a stockholders' resolution is adopted, a stockholder may file a lawsuit to annul a stockholders' resolution if the procedure for convening a stockholders' meeting or the method of resolution violates any law or regulation or our articles of incorporation. However, if the court is of the opinion that such violation is not material and does not affect the result of the resolution, the court may reject the stockholder's claim.

- if the substance of a resolution adopted at a stockholders' meeting contradicts any applicable law or regulation or our articles of incorporation, a stockholder may bring a suit to determine the validity of such resolution.

Stockholders may bring suit against our directors under the following circumstances:

- Stockholders who have continuously held 3% or more of our issued shares for a period of one year or longer may request in writing that the audit committee institute an action against a director on our behalf. In case the audit committee fails to institute an action within 30 days after receiving such request, the stockholders may institute an action on our behalf. In the event stockholders institute an action, a court may, upon the defendant's motion, order such stockholders to furnish appropriate security.
- Stockholders who hold more than 3% or more of our total issued shares may institute an action with a court to remove a director of ours who has materially violated the applicable laws or our articles of incorporation or has materially damaged the interests of our company if a resolution for removal on such grounds has first been voted on and rejected by our stockholders and such suit is filed within 30 days of such stockholders' vote.
- In the event that any director, manager or stockholder holding more than 10% of our shares or any respective spouses or minor children and/or nominees of any of them sells shares within six months after acquisition of such shares, or repurchases the shares within six months after the sale, we may claim for recovery of any profits realized from the sale and purchase. If our board of directors or audit committee fail to claim for recovery, any stockholder may set forth a 30-day period for our board of directors or audit committee to exercise the right. In the event our directors or audit committee fail to exercise the right during such 30-day period, such requesting stockholder shall have the right to claim such recovery on our behalf. Our directors shall be jointly and severally liable for damages suffered by us as a result of their failure to exercise the right of claim.

Other Rights of Stockholders

Under the R.O.C. Company Act and the Corporate Merger and Acquisition Act, dissenting stockholders are entitled to appraisal rights in the event of a spin-off or a merger and various other major corporate actions. Dissenting stockholders may request us to redeem all their shares at a then fair market price to be determined by mutual agreement. If no agreement can be reached, the valuation will be determined by a court. Subject to applicable law, dissenting stockholders may, among other things, exercise their appraisal rights by notifying us in writing before the related stockholders' meeting and/or by raising and registering their dissent at the stockholders' meeting and also waive their voting rights.

One or more stockholders who have held 3% or more of the issued and outstanding shares one year or longer may require our board of directors to call an extraordinary stockholders' meeting by sending a written request to our board of directors.

Effective from June 24, 2005, the R.O.C. Company Law allows stockholder(s) holding 1% or more of the total issued shares of a company to, during the period of ten days or more prescribed by the company, submit one proposal in writing containing no more than three hundred words (in terms of Chinese characters) for discussion at the annual ordinary stockholders' meeting.

Financial Statements

For a period of at least 10 days before our annual ordinary stockholders' meeting, we must make available our annual financial statements at our principal offices in Hsinchu, Taiwan, and our share registrar in Taipei for our stockholders' inspection.

Transfer Restrictions

Our directors, managers and stockholders holding more than 10% of our shares are required to report any changes in their shareholding to us on a monthly basis. In addition, the number of shares that they can sell or transfer on the Taiwan Stock Exchange on a daily basis is limited by R.O.C. law. Further, they may sell or transfer our shares on the Taiwan Stock Exchange only after reporting to the R.O.C. FSC at least three days before the transfer, provided that such reporting is not required if the number of shares transferred does not exceed 10,000 in one business day.

C. Material Contracts

Cross License Agreement, dated as of January 1, 2006, between United Microelectronics Corporation and International Business Machine Corporation.

We entered into a five-year cross license agreement with IBM effective as of January 1, 2006, which provides for the cross license of certain semiconductor patents including process, topography and design. Under this agreement, IBM had granted to us and our subsidiaries, nonexclusive and non-transferable licenses, without the right to grant sublicenses, for making our and our subsidiaries' licensed products in R.O.C., Japan and Singapore and selling, leasing, licensing, using and/or transferring our and our subsidiaries' licensed products worldwide under IBM's patents filed prior to January 1, 2011; we granted IBM, royalty-free, worldwide and non-transferable licenses, without the right to grant sublicenses, for the term of the cross license for making, selling, leasing, licensing, using and/or transferring IBM's licensed products under our patents filed prior to January 1, 2011. We also agreed to pay IBM certain royalty fees under this agreement. This five-year cross license agreement with IBM terminated on December 31, 2010. We entered into a new "life-of-the-patents" cross license agreement with IBM that will be effective until June 30, 2029, the expiration date of the last-to-expire of the licensed patents thereunder. Under this agreement, IBM has granted to us and our subsidiaries, nonexclusive and non-transferable licenses, without the right to grant sublicenses, for making our and our subsidiaries' licensed products in R.O.C., Japan, Singapore and PRC and selling, leasing, licensing, using and/or transferring our and our subsidiaries' licensed products worldwide under IBM's patents filed effectively prior to July 1, 2009; we granted IBM, royalty-free, worldwide and non-transferable licenses, without the right to grant sublicenses, for the term of the cross license for making, selling, leasing, licensing, using and/or transferring IBM's licensed products under our patents filed effectively prior to July 1, 2009. We also agreed to pay IBM certain royalty fees under this agreement.

Settlement and Cross License Agreement, dated as of April 1, 2009, between United Microelectronics Corporation and LSI Corporation (and its subsidiary Agere)

We entered into a multi-year cross license agreement with LSI effective as of May 10, 2007 through December 31, 2012, which provides for the cross license of certain semiconductor patents, including process and design patents. Under this agreement, LSI granted to us and our subsidiaries, nonexclusive and non-transferable licenses, without the right to grant sublicenses, for making, selling, importing or otherwise disposing of our and our subsidiaries' licensed products under LSI's patents filed prior to April 1, 2009. We granted LSI, royalty-free, worldwide and non-transferable licenses, without the right to grant sublicenses, for making, selling, using or otherwise disposing of LSI' licensed products under our patents filed prior to April 1, 2009. The parties further agreed not to assert patent claims against each other prior to December 31, 2012. We also agreed to pay LSI certain royalty fees under this agreement.

Technology Agreement, dated as of June 29, 2012, between United Microelectronics Corporation and International Business Machine Corporation.

We entered into a technology license agreement with International Business Machine Corporation ("IBM") on June 29, 2012. Under this agreement, IBM grant to a perpetual license under its 20nm bulk industry standard CMOS technology and developmental processes associated with manufacturing integrated circuits using a three dimensional FinFet device technology for using, offering for sale, selling, importing or otherwise transferring our licensed products.

Patent Portfolio License Agreement, dated as of February 19, 2013, between United Microelectronics Corporation and Mosaid Technologies Incorporated.

We entered into a Patent Portfolio License Agreement with Mosaid Technologies Incorporated ("Mosaid") on February 19, 2013, which provides for the license under its semiconductor manufacturing process patents during the period from February 8, 2013 to February 8, 2018. Under this agreement, Mosaid grants to us and our subsidiaries, a nonexclusive and non-transferable license for making, selling, importing or otherwise disposing of our and our subsidiaries' licensed products. The parties further agree not to assert patent claims against each other prior to February 8, 2018. We also agree to pay Mosaid certain royalty fees under this agreement.

Major Long-term Supply and Marketing Agreements

We have entered into long-term distribution, sales, service and marketing agreements with the following companies: UMC Group (USA), an agreement effective from January 1, 2013 through December 3, 2018; United Microelectronics (Europe) B.V., an agreement effective from January 1, 2013 through December 3, 2017. We also entered into a long-term supply agreement with Shin-Etsu Handotai Taiwan Co., Ltd., or Shin-Etsu Handotai, under which Shin-Etsu Handotai agrees to provide us with 150mm, 200mm and 300mm raw wafer materials for an indefinite period unless the agreement is otherwise terminated.

Major Construction Agreements

We entered into various major construction agreements with companies such as, Pan Asia Corp. and Fu Tsu Construction Corp. for the phase 5 and 6 expansion of major building in our Fab12A in the Tainan Science Park. These agreements are effective from July 18, 2012 to December 31, 2013, and the total contractual amount exceeds NT$ 4 billion.

Major Long-term Loan Agreements

We entered into a long-term secured loan agreement effective from November 28, 2008 through November 28, 2018 with the Bank of Taiwan. We pledged the equipment at our semiconductor facilities in Tainan Science Park as collateral in an amount up to NT$4.8 billion for the loan, on April 1, 2013, we repaid the loan in full and the loan agreement expired accordingly. We also entered into a long-term secured loan agreement effective from January 30, 2013 through January 30, 2020 with the Land Bank of Taiwan, it is for the equipment at our semiconductor facilities in Tainan Science Park as collateral in an amount up to NT$6 billion for the loan.

D. Exchange Controls

Foreign Investment and Exchange Controls in Taiwan

We have extracted from publicly available documents the information presented in this section. Please note that citizens of the People's Republic of China and entities organized in the People's Republic of China are subject to special R.O.C. laws, rules and regulations, which are not discussed in this section.

General

Historically, foreign investments in the securities market of Taiwan were restricted. However, commencing in 1983, the Taiwan government has from time to time enacted legislation and adopted regulations to make foreign investment in the Taiwan securities market possible. Initially, only overseas investment trust funds of authorized securities investment trust enterprises established in Taiwan were permitted to invest in the Taiwan securities market. Since January 1, 1991, qualified foreign institutional investors are allowed to make investments in the Taiwan public securities market. Since March 1, 1996, non-resident foreign institutional and individual investors, called "general foreign investors", are permitted to make direct investments in the Taiwan public securities market. On September 30, 2003, the Executive Yuan amended the Regulations Governing Investment in Securities by Overseas Chinese and Foreign Nationals, or the Investment Regulations, under which the "Qualified Foreign Institutional Investors", or QFII, designations have been abolished and the restrictions on foreign portfolio investors have been revised. According to the Investment Regulations, "Foreign Institutional Investor", or FINI, means an entity which is incorporated under the laws of countries other than the R.O.C. or the branch of a foreign entity which is established within the territory of the R.O.C., and "Foreign Individual Investor", or FIDI, means an overseas Chinese or a foreign natural person. In addition, the Investment Regulations also lifted some restrictions and simplified procedures of investment application.

On April 30, 2009, the R.O.C. FSC promulgated regulations allowing QDIIs under PRC regulations and certain other PRC persons to invest in the securities of R.O.C. companies. However, prior approval from the Investment Commission of the R.O.C. Ministry of Economic Affairs is required for QDIIs or certain other PRC persons to own 10% or more of the issued and outstanding shares of a listed R.O.C. company.

Foreign Ownership Limitations

Foreign ownership of the issued share capital in a Taiwan Stock Exchange-listed company or a GreTai Securities Market-listed company has been limited to 50% in the past. Since December 30, 2000, the 50% limit has been lifted. Foreign investors can now hold such investments without any foreign ownership percentage limitations, unless the law has imposed restrictions otherwise.

Foreign Investors

Each FINI who wishes to invest directly in the R.O.C. securities market is required to register with the Taiwan Stock Exchange and obtain an investment identification number if the FINI is a non-resident and has no sub-investment accounts in the R.O.C. Except for some restrictions imposed by specific laws and regulations, the individual and aggregate foreign ownership of the issued share capital in a Taiwan Stock Exchange-listed company or a GreTai Securities Market-listed company is not restricted. An R.O.C. custodian for a non-resident FINI or FIDI is required to submit to the CBC, and the Taiwan Stock Exchange a report of trading activities, inward and outward remittance of capital and status of assets under custody and other matters every month. Foreign institutional investors are not subject to any ceiling for investment in the R.O.C. securities market.

Each FIDI who wishes to invest directly in the R.O.C. securities market is also required to register with the Taiwan Stock Exchange and obtain an investment identification number. The R.O.C. FSC has lifted the limitation on the amount of investment in the R.O.C. securities market for a non-resident FIDI.

Foreign Investment Approval

Foreign investors (both institutional and individual) who wish to make direct investments in the shares of R.O.C. companies are required to submit a "foreign investment approval" application to the Investment Commission of the R.O.C. MOEA, or other government authority and enjoy benefits granted under the Statute for Foreigner's Investment and the Statute for Overseas Chinese's Investment. The Investment Commission of the R.O.C. MOEA or other government authority reviews each foreign investment approval application and approves or disapproves the application after consultation with other governmental agencies, if necessary. Any non-R.O.C. person possessing a foreign investment approval may repatriate annual net profits and interests attributable to an approved investment. Investment capital and capital gains attributable to the investment may be repatriated with approval of the Investment Commission of the R.O.C. MOEA or other government authority.

In addition to the general restrictions against direct investments by foreign investors in R.O.C. companies, foreign investors are currently prohibited from investing in certain prohibited industries in Taiwan under the "Negative List". The prohibition on direct foreign investment in the prohibited industries in the Negative List is absolute in the absence of a specific exemption from the application of the Negative List. Under the Negative List, some other industries are restricted so that foreign investors may directly invest only up to a specified level and with the specific approval of the relevant authority responsible for enforcing the legislation which the Negative List is intended to implement. Our business is not a restricted industry under the Negative List.

In June of 2009, the R.O.C. MOEA further allowed PRC persons to make direct investments in Taiwan. However, such direct investment is still subject to various restrictions, such as that that only the industries listed in the Positive List, as promulgated by the Executive Yuan, are legally permitted targets and that all the PRC persons who wish to make direct investments in R.O.C. are required to submit an "investment approval" application to the Investment Commission of the R.O.C. MOEA.

Exchange Controls

Taiwan's Foreign Exchange Control Statute and regulations provide that all foreign exchange transactions must be executed by banks designed to handle foreign exchange transactions by the Ministry of Finance and by the CBC. Current regulations favor trade-related foreign exchange transactions. Consequently, foreign currency earned from exports of merchandise and services may now be retained and used freely by exporters. All foreign currency needed for the importation of merchandise and services may be purchased from the designated foreign exchange banks.

Aside from trade-related foreign exchange transactions, R.O.C. companies and residents may remit to and from Taiwan foreign currencies of up to US$50 million (or its equivalent) and US$5 million, (or its equivalent) respectively in each calendar year. These limits apply to remittances involving a conversion between NT dollars and U.S. dollars or other foreign currencies. A requirement is also imposed on all private enterprises to register all medium and long-term foreign debt with the CBC.

In addition, foreign currency earned from or needed to be paid for direct investment or portfolio investments, which are approved by the competent authorities, may be retained or sold by the investors or purchased freely from the designated bank.

Aside from the transactions discussed above, a foreign person without an alien resident card (or who has relevant resident card with a validity of less than one year) or an unrecognized foreign entity may remit to and from Taiwan foreign currencies of up to US$100,000 per remittance without obtaining prior approval or permit if required documentation is provided to Taiwan authorities. This limit applies to remittances involving a conversion between NT dollars and U.S. dollars or other foreign currencies.

Depositary Receipts

In April 1992, the R.O.C. SFB (the predecessor of the R.O.C. FSC) began allowing R.O.C. companies listed on the Taiwan Stock Exchange to sponsor the issuance and sale of depositary receipts evidencing depositary shares. Notifications for these issuances are still required. In December 1994, the Ministry of Finance began allowing companies whose shares are traded on the GreTai Securities Market to sponsor the issuance and sale of depositary receipts evidencing depositary shares. On October 24, 2002, the R.O.C. SFB began allowing public companies that are not listed on the Taiwan Stock Exchange or the GreTai Securities Market to sponsor the issuance and sale of depositary receipts by way of private placements outside the R.O.C.

A holder of depositary shares wishing to withdraw common shares underlying depositary shares is required to appoint a local agent or representative with qualifications set forth by the R.O.C. FSC to, among other things, open a securities trading account with a local brokerage firm, pay R.O.C. taxes, remit funds, and exercise stockholders' right. In addition, the withdrawing holder is also required to appoint a custodian bank with qualifications set forth by the R.O.C. FSC to hold the securities in safekeeping, make confirmations, settle trades and report all relevant information. Without making this appointment and the opening of accounts, the withdrawing holder would be unable to subsequently sell the common shares withdrawn from a depositary receipt facility on either the Taiwan Stock Exchange or the GreTai Securities Market.

After the issuance of a depositary share, a holder of the depositary share may immediately, comparing to a three-month waiting period restriction which was lifted in 2003, request the depositary issuing the depositary share to cause the underlying common shares to be sold in the R.O.C. or to withdraw the common shares represented by the depositary receipt and deliver the common shares to the holder. On April 30, 2009 and July 3, 2009, the R.O.C. Executive Yuan approved the Regulations Governing Securities Investment and Futures Trading in Taiwan by Mainland Area Investors and the Regulations Governing Investment in Taiwan by Mainland Area Persons, respectively, under which qualified PRC persons are permitted to invest in Taiwan companies under limited circumstances, including purchase of the depositary receipts issued by a Taiwan company. However, prior approval from the Investment Commission of the R.O.C. Ministry of Economic Affairs is required for a qualified PRC person's ownership of 10% or more of the issued and outstanding shares of a listed R.O.C. company or certain other manners of investment by a qualified PRC person.

No deposits of shares may be made in a depositary receipt facility and no depositary receipts may be issued against deposits without specific R.O.C. FSC approval, unless they are:

(1) stock dividends;

(2) free distributions of common shares;

(3) due to the exercise by a holder of his or her preemptive rights in the event of capital increases for cash; or

(4) permitted under the deposit agreement and the custody agreement, due to the direct purchase of shares or purchase through the depositary in the domestic market or the surrender of shares under the possession of investors and then delivery of such shares to the custodian for deposit in the depositary receipt facility, provided that the total number of depositary receipts outstanding after an issuance cannot exceed the number of issued depositary shares previously approved by the R.O.C. FSC in connection with the offering plus any depositary shares issued pursuant to the events described in (1), (2) and (3) above. These issuances may only be made to the extent previously issued depositary shares have been withdrawn.

A depositary may convert New Taiwan dollars from the proceeds of the sale of common shares or cash distributions received into other currencies, including U.S. dollars. A depositary may be required to obtain foreign exchange approval from the CBC on a payment-by-payment basis for conversion into New Taiwan dollars of subscription payments for rights offerings or conversion into foreign currencies from the proceeds from the sale of subscription rights for new common shares. It is expected that the CBC will grant this approval as a routine matter.

A holder of depositary shares may convert NT dollars into other currencies from proceeds from the sale of any underlying common shares. Proceeds from the sale of the underlying common shares withdrawn from the depositary receipt facility may be used for reinvestment in securities listed on both the Taiwan Stock Exchange and the GreTai Securities Market, provided that the investor designates a local securities firm or financial institution as agent to open an NT dollar bank account in advance.

E. Taxation

R.O.C. Tax Considerations

The following summarizes the principal R.O.C. tax consequences of owning and disposing of the ADSs or shares to a holder of ADSs or shares that is not a resident of the R.O.C. An individual holder will be considered as not a resident of the R.O.C. for the purposes of this section if he or she is not physically present in Taiwan for 183 days or more during any calendar year, except if the individual holder has both R.O.C. and non-R.O.C. nationalities and has a registered address in the R.O.C. An entity holder will be considered as not a resident of the R.O.C. if it is organized under the laws of a jurisdiction other than Taiwan and has no fixed place of business or other permanent establishment or business agent in the R.O.C. Prospective purchasers of ADSs or shares should consult their own tax advisors concerning the tax consequences of owning ADSs or shares in the R.O.C. and any other relevant taxing jurisdiction to which they are subject.

Dividends

Dividends, whether in cash or shares, declared by us out of retained earnings and paid out to a holder that is not an R.O.C. resident in respect of shares represented by ADSs are subject to R.O.C. withholding tax at the time of distribution. The rate of withholding for non-resident individuals and non-resident entities is currently 20% of the amount of the distribution in the case of cash dividends or of the par value of the shares distributed in the case of stock dividends. Under current practice adopted by tax authorities, a 20% withholding rate is applied to a non-resident ADS holder without requiring the holder to apply for or obtain foreign investment approval. As discussed in the section "—Tax Reform" below, certain of our retained earnings will be subject to a 10% undistributed retained earnings tax. To the extent dividends are paid out of retained earnings which have been subject to the retained earnings tax, the amount of such tax will be used by us to offset a non-resident's withholding tax liability on such dividend. Consequently, the effective rate of withholding on dividends paid out of retained earnings previously subject to the retained earnings tax may be less than 20%. There is no withholding tax with respect to stock dividends declared out of our capital reserve.

Capital Gains

According to the R.O.C. Income Tax Act, during the period starting from January 1, 2013 to December 31, 2014, any capital gain generated from the sale of shares listed on the Taiwan Stock Exchange, Gre-Tai Securities Market or Emerging Stock Market by any individual will be subject to capital gain tax based on either of the following two formulas:

(1) 20% of the amount of deemed profit generated from the sale of shares (the "Deemed Profit"). The Deemed Profit shall be: (i) zero if the closing TAIEX index on the trading day immediately prior to the sale of shares is below 8,500; (ii) 0.1% of the sale amount if the closing TAIEX index on the trading day immediately prior to the sale of shares is 8,500 or above but below 9,500; (iii) 0.2% of the sale amount if the closing TAIEX index on the trading day immediately prior to the sale of shares is 9,500 or above but below 10,500; or (iv) 0.3% of the sale amount if the closing TAIEX index on the trading day immediately prior to the sale of shares is 10,500 or above; or

(2) 15% of the amount of actual capital gain generated from the sale of shares (after deduction of any losses incurred by the seller from trading of shares within the year), or 15% of half of such amount in the case the shares have been held for one year or longer.

Notwithstanding the foregoing, if the seller is an individual who (i) sells more than 100,000 shares on the Emerging Stock Market within a year; (ii) sells shares, which had been obtained before the initial public offering of such shares ("IPO"), on the Taiwan Stock Exchange or Gre-Tai Securities Market (unless such IPO is completed before December 31, 2012 or the shares were acquired (x) during the pre-IPO underwriting process and (y) in the volume of no more than 10,000 shares); (iii) is a non-R.O.C. resident or (iv) sells shares neither listed on the Taiwan Stock Exchange, Gre-Tai Securities Market nor the Emerging Stock Market, then the second formula must be applied to determine the capital gain tax payable. For disposal of shares obtained before the IPO, if the individual holder continuously holds such shares for at least three (3) years after IPO, only one-fourth (1/4) of the amount of actual capital gain generated from the sale of shares (after deduction of any losses incurred by the seller from trading of shares within the year) is subject to 15% income tax.

Effective from January 1, 2015, if an individual who (i) sells more than 100,000 shares on the Emerging Stock Market within a year; (ii) sells shares, which had been obtained before the IPO, on the Taiwan Stock Exchange or Gre-Tai Securities Market (unless such IPO is completed before December 31, 2012 or the shares were acquired (x) during the pre-IPO underwriting process and (y) in the volume of no more than 10,000 shares); (iii) sells securities for more than NT$1 billion within a year; or (iv) is a non-R.O.C. resident, such individual will be subject to a 15% tax against the amount of capital gain generated from his sale of securities (after deduction of any losses from trading securities within the year) or against half of such amount in the case the shares have been held for one year or longer. For disposal of shares obtained before the IPO, if the individual holder continuously holds such shares for at least three (3) years after IPO, only one-fourth (1/4) of the amount of actual capital gain generated from the sale of shares (after deduction of any losses incurred by the seller from trading of shares within the year) is subject to 15% income tax.

Subject to the Minimum Income Tax Statute (the "Statute"), gains realized from various securities transactions by an R.O.C.-resident entity shall be calculated as taxable income for the purpose of the Statute and may further be subject to income tax. If the above entity has held shares for more than three (3) years, 50% of capital gain may be exempted from AMT. In addition, transfers of ADSs by non-R.O.C. resident holders are not regarded as sales of R.O.C. securities and, as a result, any gains derived therefrom are currently not subject to R.O.C. income tax.

Securities Transaction Tax

The R.O.C. government imposes a securities transaction tax that will apply to sales of shares, but not to sales of ADSs. The transaction tax, which is payable by the seller, is generally levied on sales of shares at the rate of 0.3% of the sales proceeds. Withdrawals of our shares from our depositary facility are not subject to the R.O.C. securities transaction tax.

Preemptive Rights

Distribution of statutory preemptive rights for shares in compliance with the R.O.C. Company Act is not subject to R.O.C. tax. Proceeds derived from sales of statutory preemptive rights evidenced by securities by a non-resident holder may be subject to the R.O.C. securities transaction tax, currently at the rate of 0.3% of the gross amount received. Proceeds derived from sales of statutory preemptive rights which are not evidenced by securities are subject to capital gains tax at the rate of 20% of the gains realized for non-R.O.C. entity holders and non-R.O.C. individual holders. Subject to compliance with the R.O.C. law, we have sole discretion to determine whether statutory preemptive rights are evidenced by securities or not.

Estate Taxation and Gift Tax

R.O.C. estate tax is payable on any property within the R.O.C. of a deceased individual who is a non-resident individual and R.O.C. gift tax is payable on any property located within the R.O.C. donated by any such person. Under the newly amended Articles 13 and 19 of the R.O.C. Estate and Gift Tax Act, which became effective on January 23, 2009, estate tax is currently payable at the rate of 10% and gift tax is payable at the rate of 10%. Under R.O.C. estate and gift tax laws, the shares will be deemed located in the R.O.C. irrespective of the location of the owner. It is unclear whether a holder of ADSs will be considered to own shares for this purpose.

Tax Treaties

The Republic of China does not have an income tax treaty with the United States. On the other hand, the Republic of China has income tax treaties with Indonesia, Singapore, South Africa, Australia, Vietnam, New Zealand, Malaysia, Macedonia, Swaziland, the Netherlands, the United Kingdom, Gambia, Senegal, Sweden, Belgium, Denmark, Israel, Paraguay, Hungary, France, India, Slovakia, Switzerland, Germany and Thailand which may limit the rate of Republic of China withholding tax on dividends paid with respect to common shares in Taiwan companies. It is unclear whether a non-R.O.C. holder of ADSs will be considered to own shares for the purposes of such treaties. Accordingly, a holder of ADSs who is otherwise entitled to the benefit of a treaty should consult its own tax advisors concerning eligibility for benefits under the treaty with respect to the ADSs.

Tax Reform

In order to increase Taiwan's competitiveness, an amendment to the R.O.C. Income Tax law was enacted on January 1, 1998, to integrate the corporate income tax and the stockholder dividend tax with the aim of eliminating the double taxation effect for resident stockholders of Taiwanese corporations.

Under this amendment, a 10% retained earnings tax will be imposed on a company for its after-tax earnings generated after January 1, 1998 which are not distributed in the following year. The retained earnings tax so paid will further reduce the retained earnings available for future distribution. When the company declares dividends out of those retained earnings, up to a maximum amount of 10% of the declared dividends will be credited against the 20% withholding tax imposed on the non-resident holders of its shares.

U.S. Federal Income Tax Considerations For U.S. Persons

The following is a summary of certain U.S. federal income tax consequences for beneficial owners of our shares or ADSs, that hold the shares or ADSs as capital assets and that are U.S. holders that are not citizens of the R.O.C., do not have a permanent establishment in the R.O.C. and are not physically present in the R.O.C. for 183 days or more within a calendar year. You are a U.S. holder if you are, for U.S. federal income tax purposes, any of the following:

- an individual citizen or resident of the United States;
- a corporation (or other entity treated as a corporation for U.S. federal income tax purposes) created or organized in or under the laws of the United States, any state thereof or the District of Columbia;
- an estate the income of which is subject to U.S. federal income taxation regardless of its source;
- a trust that is subject to the primary supervision of a court within the United States and that has one or more U.S. persons with the authority to control all substantial decisions of the trust; or
- a trust that has a valid election in effect under applicable U.S. Treasury regulations to be treated as a U.S. person.

This summary is based on the provisions of the Internal Revenue Code of 1986, as amended, or the Code, and regulations, rulings and judicial decisions thereunder as of the date hereof, and such authorities may be replaced, revoked or modified so as to result in U.S. federal income tax consequences different from those discussed below. It is for general purposes only and you should not consider it to be tax advice. In addition, it is based in part on representations by the depositary and assumes that each obligation under the deposit agreement and any related agreement will be performed in accordance with its terms. This summary does not represent a detailed description of all the U.S. federal income tax consequences to you in light of your particular circumstances and does not address the effects of any state, local or non-U.S. tax laws (or other U.S. federal tax consequences, such as U.S. federal estate or gift tax consequences). In addition, it does not represent a detailed description of the U.S. federal income tax consequences applicable to you if you are subject to special treatment under the U.S. federal income tax laws, including if you are:

- a dealer in securities or currencies;
- a trader in securities if you elect to use a mark-to-market method of accounting for your securities holdings;
- a financial institution or an insurance company;
- a tax-exempt organization;
- a regulated investment company;

- a real estate investment trust;
- a person liable for alternative minimum tax;
- a person holding shares or ADSs as part of a hedging, integrated or conversion transaction, constructive sale or straddle;
- a partnership or other pass-through entity for U.S. federal income tax purposes;
- a person owning, actually or constructively, 10% or more of our voting stock; or
- a U.S. holder whose "functional currency" is not the U.S. dollar.

We cannot assure you that a later change in law will not alter significantly the tax considerations that we describe in this summary.

If a partnership holds our shares or ADSs, the tax treatment of a partner will generally depend upon the status of the partner and the activities of the partnership. If you are a partner of a partnership holding our shares or ADSs, you should consult your tax advisor.

You should consult your own tax advisor concerning the particular U.S. federal income tax consequences to you of the ownership and disposition of the shares or ADSs, as well as the consequences to you arising under the laws of any other taxing jurisdiction.

In general, for U.S. federal income tax purposes, a U.S. person who is the beneficial owner of an ADS will be treated as the owner of the shares underlying its ADS. Accordingly, deposits or withdrawals of shares by U.S. holders for ADSs generally will not be subject to U.S. federal income tax.

Taxation of Dividends

Except as discussed below with respect to the passive foreign investment company rules, the amount of distributions (including net amounts withheld in respect of R.O.C. withholding taxes) you receive on your shares or ADSs (other than certain pro rata distributions of shares to all stockholders) will generally be treated as dividend income to you if the distributions are made from our current and accumulated earnings and profits as calculated according to U.S. federal income tax principles. In determining the net amounts withheld in respect of R.O.C. taxes, any reduction in the amount withheld on account of an R.O.C. credit in respect of the 10% retained earnings tax imposed on us is not considered a withholding tax and will not be treated as distributed to you or creditable by you against your U.S. federal income tax. Such income will be includible in your gross income as ordinary income on the day you actually or constructively receive it, which in the case of an ADS will be the date actually or constructively received by the depositary. The amount of any distribution of property other than cash will be the fair market value of such property on the date it is distributed. You will not be entitled to claim a dividend received deduction with respect to distributions you receive from us.

With respect to non-corporate U.S. holders, certain dividends received from a qualified foreign corporation may be subject to reduced rates of taxation. A foreign corporation is treated as a qualified foreign corporation with respect to dividends paid by that corporation on shares (or ADSs backed by such shares) that are readily tradable on an established securities market in the United States. U.S. Treasury Department guidance indicates that our ADSs (which are listed on the NYSE), but not our shares, are readily tradable on an established securities market in the United States. Thus, we do not believe that dividends we pay on our shares that are not backed by ADSs currently meet the conditions required for these reduced tax rates. Moreover, there can be no assurance that our ADSs will continue to be readily tradable on an established securities market in later years. Non-corporate U.S. holders that do not meet a minimum holding period requirement during which they are not protected from the risk of loss or that elect to treat the dividend income as "investment income" pursuant to Section 163(d)(4) of the Code will not be eligible for the reduced rates of taxation regardless of our status as a qualified foreign corporation. In addition, the rate reduction will not apply to dividends if the recipient of a dividend is obligated to make related payments with respect to positions in substantially similar or related property. This disallowance applies even if the minimum holding period has been met. Non-corporate U.S. holders will also not be eligible for the reduced rates of taxation on dividends if we are a passive foreign investment company in the taxable year in which such dividends are paid or in the preceding taxable year. Holders should consult their own tax advisors regarding the application of these rules given their particular circumstances.

The amount of any dividend paid in NT dollars will equal the U.S. dollar value of the NT dollars you receive (calculated by reference to the exchange rate in effect on the date you actually or constructively receive the dividend, which in the case of an ADS will be the date actually or constructively received by the depositary), regardless of whether the NT dollars are actually converted into U.S. dollars. If the NT dollars received as a dividend are not converted into U.S. dollars on the date of receipt, you will have a basis in the NT dollars equal to their U.S. dollar value on the date of receipt. Any gain or loss you realize if you subsequently sell or otherwise dispose of the NT dollars will be ordinary income or loss from sources within the United States for foreign tax credit limitation purposes.

Subject to certain limitations under the Code, you may be entitled to a credit or deduction against your U.S. federal income taxes for the net amount of any R.O.C. taxes that are withheld from dividend distributions made to you. The election to receive a credit or deduction must be made annually, and applies to all foreign taxes for the applicable tax year. The limitation on foreign taxes eligible for credit is calculated separately with respect to specific classes of income. For this purpose, dividends we pay with respect to shares or ADS will generally be considered passive category income from sources outside the United States. Furthermore, you will not be allowed a foreign tax credit for foreign taxes imposed on dividends paid on shares or ADSs if you (1) have held the shares or ADSs for less than a specified minimum period during which you are not protected from risk of loss, or (2) are obligated to make payments related to the dividends. The rules governing the foreign tax credit are complex. We therefore urge you to consult your tax advisors regarding the availability of the foreign tax credit under your particular circumstances.

To the extent that the amount of any distribution you receive exceeds our current and accumulated earnings and profits for a taxable year, as determined under U.S. federal income tax principles, the distribution will first be treated as a tax-free return of capital, causing a reduction in your adjusted basis in the shares or ADSs and thereby increasing the amount of gain, or decreasing the amount of loss, you will recognize on a subsequent disposition of the shares or ADSs. The balance in excess of adjusted basis, if any, will be taxable to you as capital gain recognized on a sale or exchange. However, we do not expect to keep earnings and profits in accordance with U.S. federal income tax principles. Therefore, you should expect that a distribution will generally be treated as a dividend (as discussed above).

It is possible that pro rata distributions of shares or ADSs to all stockholders may be made in a manner that is not subject to U.S. federal income tax. In the event that such distributions are tax-free, the basis of any new shares or ADSs so received will generally be determined by allocating the U.S. holder’s basis in the old shares or ADSs between the old shares or ADSs and the new shares or ADSs, based on their relative fair market values on the date of distribution. For U.S. tax purposes, any such tax-free share or ADS distribution generally would not result in foreign source income to you. Consequently, you may not be able to use the foreign tax credit associated with any R.O.C. withholding tax imposed on such distributions unless you can use the credit against U.S. tax due on other foreign source income in the appropriate category for foreign tax credit purposes. You should consult your own tax advisors regarding all aspects of the foreign tax credit.

Taxation of Capital Gains

Except as discussed below with respect to the passive foreign investment company rules, when you sell or otherwise dispose of your shares or ADSs, you will generally recognize capital gain or loss in an amount equal to the difference between the U.S. dollar value of the amount realized for the shares or ADSs and your basis in the shares or ADSs, determined in U.S. dollars. If you are an individual, and the shares or ADSs being sold or otherwise disposed of our capital assets that you have held for more than one year, your gain recognized will be eligible for reduced rates of taxation. Your ability to deduct capital losses is subject to limitations. Any gain or loss you recognize will generally be treated as U.S. source gain or loss.

If you pay any R.O.C. securities transaction tax, such tax is not treated as an income tax for U.S. federal income tax purposes, and therefore will not be a creditable foreign tax for U.S. federal income tax purposes. However, subject to limitations under the Code, such tax may be deductible. You are urged to consult your tax advisors regarding the U.S. federal income tax consequences of these taxes.

Passive Foreign Investment Company

Based on the current and projected composition of our income and valuation of our assets, including goodwill, we do not believe that we are currently (or that we were in 2012) a passive foreign investment company, or PFIC, and we do not expect to become one in the future, although there can be no assurance in this regard.

In general, a company is considered a PFIC for any taxable year if either:

- at least 75% of its gross income is passive income, which generally includes income derived from certain dividends, interest, royalties and rents (other than royalties and rents derived in the active conduct of a trade or business and not derived from a related person), annuities or property transactions; or
- at least 50% of the value of its assets is attributable to assets that produce or are held for the production of passive income.

The 50% of value test is based on the average of the value of our assets for each quarter during the taxable year. If we own at least 25% by value of another company's stock, we will be treated, for purposes of the PFIC rules, as owning our proportionate share of the assets and receiving our proportionate share of the income of that company.

In determining that we do not expect to be a PFIC, we are relying on our projected capital expenditure plans and projected revenues for the current year and for future years. In addition, our determination is based on a current valuation of our assets, including goodwill. In calculating goodwill, we have valued our total assets based on our total market value, which is based on the market value of our shares and ADSs and is subject to change. In addition, we have made a number of assumptions regarding the allocation of goodwill to active and passive assets. We believe our valuation approach is reasonable. However, it is possible that the Internal Revenue Service will challenge the valuation or allocation of our goodwill, which may also result in us being classified as a PFIC.

In addition, the determination of whether we are a PFIC is made annually. Accordingly, it is possible that we may become a PFIC in the current or any future taxable year due to changes in our asset or income composition. Because we have valued our goodwill based on the market value of our shares, a decrease in the price of our shares may also result in our becoming a PFIC.

If we are a PFIC for any taxable year during which you hold shares or ADSs, you will be subject to special tax rules with respect to any "excess distribution" that you receive and any gain you realize from a sale or other disposition (including a pledge) of shares or ADSs. Distributions you receive in a taxable year that are greater than 125% of the average annual distributions you received during the shorter of the three preceding taxable years or your holding period for shares or ADSs will be treated as excess distributions. Under these special tax rules:

- the excess distribution or gain will be allocated ratably over your holding period for shares or ADSs;
- the amount allocated to the current taxable year, and any taxable year prior to the first taxable year in which we were a PFIC, will be treated as ordinary income; and
- the amount allocated to each other year will be subject to tax at the highest tax rate in effect for that year and the interest charge generally applicable to underpayments of tax will be imposed on the resulting tax attributable to each such year.

If you hold shares or ADSs in any year in which we are a PFIC, you are required to file Internal Revenue Service Form 8621.

If we are a PFIC for any taxable year and any of our non-U.S. subsidiaries is also a PFIC, a U.S. Holder would be treated as owning a proportionate amount (by value) of the shares of the lower-tier PFIC for purposes of the application of these rules. You are urged to consult your tax advisors about the application of the PFIC rules to any of our subsidiaries.

Under certain circumstances, a U.S. holder, in lieu of being subject to the PFIC rules discussed above, may make an election to include gain on the stock of a PFIC as ordinary income under a mark-to-market method provided that such stock is regularly traded on a qualified exchange. Under this method, any difference between the stock's fair market value and its adjusted basis at the end of the year is accounted for by either an inclusion in income or, subject to limitations, a deduction from income, as described below. Under current U.S. Treasury Department guidance, the mark-to-market election may be available to holders of ADSs because the ADSs are listed on the NYSE, which constitutes a qualified exchange, although there can be no assurance that the ADSs will be "regularly traded" for purposes of the mark-to-market election. You should also note that only the ADSs and not the shares are listed on the NYSE. Our shares are listed on the Taiwan Stock Exchange, which must meet certain trading, listing, financial disclosure and other requirements to be treated as a qualified exchange under applicable U.S. Treasury regulations for purposes of the mark-to-market election, and no assurance can be given that the shares will be "regularly traded" for purposes of the mark-to-market election.

If you make an effective mark-to-market election, you will include in income each year as ordinary income the excess of the fair market value of your shares or ADSs at the end of the year over your adjusted tax basis in the shares or ADSs. You will be entitled to deduct as an ordinary loss each year the excess of your adjusted tax basis in the shares or ADSs over their fair market value at the end of the year, but only to the extent of the net amount previously included in income as a result of the mark-to-market election. If you make an effective mark-to-market election, any gain you recognize upon the sale or other disposition of your shares or ADSs will be treated as ordinary income and any loss will be treated as ordinary loss, but only to the extent of the net amount of previously included income as a result of the mark-to-market election.

Your adjusted tax basis in shares or ADSs will be increased by the amount of any income inclusion and decreased by the amount of any deductions under the mark-to-market rules. If you make a mark-to-market election it will be effective for the taxable year for which the election is made and all subsequent taxable years unless the shares or ADSs are no longer regularly traded on a qualified exchange or the Internal Revenue Service consents to the revocation of the election. You should consult your tax advisors about the availability of the mark-to-market election, and whether making the election would be advisable under your particular circumstances.

Alternatively, a U.S. holder of shares or ADSs in a PFIC can sometimes avoid the rules described above by electing to treat the PFIC as a "qualified electing fund" under Section 1295 of the Code. This option is not available to you because we do not intend to comply with the requirements necessary to permit you to make this election.

Non-corporate U.S. holders will not be eligible for reduced rates of taxation on any dividends received from us if we are a PFIC in the taxable year in which such dividends are paid or in the preceding taxable year. You should consult your own tax advisors concerning the U.S. federal income tax consequences of holding shares or ADSs if we are considered a PFIC in any taxable year.

Information Reporting and Backup Withholding

In general, unless you are an exempt recipient such as a corporation, information reporting will apply to dividends in respect of the shares or ADSs and to the proceeds from the sale, exchange or redemption of your shares or ADSs that are paid to you within the United States (and in some cases, outside of the United States). Additionally, if you fail to provide your taxpayer identification number, or fail either to report in full dividend and interest income or to make the necessary certifications of other exempt status, you may be subject to backup withholding.

Any amounts withheld under the backup withholding rules will be allowed as a refund or a credit against your U.S. federal income tax liability, provided you furnish the required information to the Internal Revenue Service.

F. Dividends and Paying Agents

Not applicable.

G. Statement by Experts

Not applicable.

H. Documents on Display

We have filed this annual report on Form 20-F, including exhibits, with the Securities and Exchange Commission. As allowed by the Securities and Exchange Commission, in Item 19 of this annual report, we incorporate by reference certain information we filed with the Securities and Exchange Commission. This means that we can disclose important information to you by referring you to another document filed separately with the Securities and Exchange Commission. The information incorporated by reference is considered to be part of this annual report.

You may read and copy this annual report, including the exhibits incorporated by reference in this annual report, at the Securities and Exchange Commission's Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549 and at the Securities and Exchange Commission's regional offices in New York, New York and Chicago, Illinois. You can also request copies of this annual report, including the exhibits incorporated by reference in this annual report, upon payment of a duplicating fee, by writing information on the operation of the Securities and Exchange Commission's Public Reference Room.

The Securities and Exchange Commission also maintains a website at www.sec.gov that contains reports, proxy statements and other information regarding registrants that file electronically with the Securities and Exchange Commission. Our annual report and some of the other information submitted by us to the Securities and Exchange Commission may be accessed through this web site.

I. Subsidiary Information

Not applicable.

ITEM 11. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

Market risk is the risk of loss related to adverse changes in market prices, including interest rates and foreign exchange rates, of financial instruments. We are exposed to various types of market risks, including changes in interest rates and foreign currency exchange rates, in the normal course of business.

We use financial instruments, including variable rate debt and swaps and foreign exchange spot transactions, to manage risks associated with our interest rate and foreign currency exposures through a controlled program of risk management in accordance with established policies. These policies are reviewed and approved by our board of directors and stockholders' meeting. Our treasury operations are subject to internal audit on a regular basis. We do not hold or issue derivative financial instruments for speculatively purposes.

Since export sales are primarily conducted in U.S. dollars, we had U.S. dollar-denominated accounts receivable of US$550 million as of December 31, 2012. As of the same date, we also had Japanese Yen-denominated accounts receivable of ¥1,889 million attributable to our Japanese operations and Europe-denominated accounts receivable of €1 million attributable to our Europe operations. We had U.S. dollar- and Japanese Yen-denominated accounts payables of US$122 million and ¥2,196 million, respectively, as of December 31, 2012.

Our primary market risk exposures relate to interest rate movements on borrowings and exchange rate movements on foreign currency-denominated accounts receivable, capital expenditures relating to equipment used in manufacturing processes (including photo etching and chemical vapor deposition) and purchased primarily from Japan and the United States.

The following table provides information as of December 31, 2012 on our market risk sensitive financial instruments.

	As of December 31, 2012	
	Book Value	Fair Value
	(in NT$ million)	
Time Deposits: Non-Trading Purpose	27,348	27,348
Short-term Loans: Non-Trading Purpose	5,773	5,773
Bonds: Non-Trading Purpose	26,224	25,584
Long-term loans: Non-Trading Purpose	14,817	14,817

Interest Rate Risk

Our major market risk exposure is changing interest rates. Our exposure to market risk for changes in interest rates relates primarily to our long-term debt obligations. We primarily enter into debt obligations to support general corporate purposes including capital expenditures and working capital needs.

The tables below provide information as of December 31, 2012 about our financial instruments that are sensitive to changes in interest rates, including debt obligations and certain assets. For debt obligations, the table presents principal cash flows and related weighted average interest rates by expected maturity dates. The information is presented in the currencies in which the instruments are denominated.

	Expected Maturity Dates As of December 31, 2012						
	2013	2014	2015	2016	2017 and thereunder	Total	Fair Value
	(in millions, except percentages)						
Time Deposits:							
Fixed Rate (US$)	90	—	—	—	—	90	90
Average Interest Rate	0.30%	—	—	—	—	0.30%	0.30%
Fixed Rate (¥)	1,000	—	—	—	—	1,000	1,000
Average Interest Rate	0.10%	—	—	—	—	0.10%	0.10%
Fixed Rate (NT$)	4,034	—	—	—	—	4,034	4,034
Average Interest Rate	0.55%	—	—	—	—	0.55%	0.55%

Unsecured Long-term Loans:							
Variable Rate (NT$)	1,293	1,231	1,314	3,983	433	8,254	8,254
Average Interest Rate	1.343%	1.343%	1.343%	1.343%	1.343%	1.343%	1.343%
Secured Long-term Loans:							
Variable Rate (NT$)	233	—	—	—	—	233	233
Average Interest Rate	1.575%	—	—	—	—	1.575%	1.575%
Bonds:							
Unsecured (NT$)	—	—	—	—	7,500	7,500	7,500
Fixed Rate	—	—	—	—	1.43%	1.43%	1.43%
Unsecured (NT$)	—	—	—	—	2,500	2,500	2,500
Fixed Rate	—	—	—	—	1.63%	1.63%	1.63%
Unsecured (US$)	—	124	—	—	—	124	120
Fixed Rate	—	0%	—	—	—	0%	0%
Unsecured (US$)	—	36	—	—	—	36	35
Fixed Rate	—	0%	—	—	—	0%	0%
Unsecured (US$)	—	—	—	426	—	426	380
Fixed Rate	—	—	—	0%	—	0%	0%

Foreign Currency Risk

Although the majority of our transactions are in NT dollars, some transactions are based in other currencies. The primary currencies to which we are exposed are the U.S. dollar and the Japanese Yen. We have in the past, and may in the future, enter into short-term, foreign currency forward contracts to hedge the impact of foreign currency fluctuations on certain underlying assets, liabilities, and firm commitments for operating expenses and capital expenditures denominated in U.S. dollars and other foreign currencies. The purpose of entering into these hedges is to minimize the impact of foreign currency fluctuations on the results of operations. We use the policy of natural hedging to reduce our foreign exchange exposure arising out of changes in the rates of exchange among the Japanese Yen, the U.S. dollar and other foreign currencies. As a general matter, our natural hedging strategy relies on matching revenues and costs for the same currency or offsetting losses in one currency with gains in another.

ITEM 12. DESCRIPTION OF SECURITIES OTHER THAN EQUITY SECURITIES

A. Debt Securities

Not applicable.

B. Warrants and Rights

Not applicable.

C. Other Securities

Not applicable.

D. American Depositary Shares

Depositary Fees and Charges

Under the terms of the deposit agreement for our ADSs, an ADS holder may have to pay the following service fees to the depositary:

Service	Fees
Issuance of ADSs	Up to US$0.05 per ADS issued
Cancellation of ADSs	Up to US$0.05 per ADS canceled
Distribution of cash dividends or other cash distributions	Up to US$0.05 per ADS held
Distribution of ADSs pursuant to stock dividends, free stock distributions or exercises of rights	Up to US$0.05 per ADS held
Distribution of securities other than ADSs or rights to purchase additional ADSs	Up to US$0.05 per ADS held

In addition, an ADS holder shall be responsible for the following charges:

- taxes (including applicable interest and penalties) and other governmental charges;
- such registration fees as may from time to time be in effect for the registration of common shares or other deposited securities on the share register and applicable to transfers of common shares or other deposited securities to or from the name of the custodian, the depositary or any nominees upon the making of deposits and withdrawals, respectively;
- such cable, telex and facsimile transmission and delivery expenses as are expressly provided in the deposit agreement to be at the expense of ADS holders and beneficial owners of ADSs;
- the expenses and charges incurred by the depositary in the conversion of foreign currency;
- such fees and expenses as are incurred by the depositary in connection with compliance with exchange control regulations and other regulatory requirements applicable to common shares, deposited securities, ADSs and ADRs; and
- the fees and expenses incurred by the depositary, the custodian or any nominee in connection with the servicing or delivery of deposited securities.
- Depositary fees payable upon the issuance and cancellation of ADSs are typically paid to the depositary by the brokers (on behalf of their clients) receiving the newly-issued ADSs from the depositary and by the brokers (on behalf of their clients) delivering the ADSs to the depositary for cancellation. The brokers in turn charge these transaction fees to their clients.

Depositary fees payable in connection with distributions of cash or securities to ADS holders and the depositary services fee are charged by the depositary to the holders of record of ADSs as of the applicable ADS record date. The depositary fees payable for cash distributions are generally deducted from the cash being distributed. In the case of distributions other than cash (i.e., stock dividends, rights offerings), the depositary charges the applicable fee to the ADS record date holders concurrent with the distribution. In the case of ADSs registered in the name of the investor (whether certificated or un-certificated in direct registration), the depositary sends invoices to the applicable record date ADS holders. In the case of ADSs held in brokerage and custodian accounts via the central clearing and settlement system, The Depository Trust Company, or DTC, the depositary generally collects its fees through the systems provided by DTC (whose nominee is the registered holder of the ADSs held in DTC) from the brokers and custodians holding ADSs in their DTC accounts. The brokers and custodians who hold their clients’ ADSs in DTC accounts in turn charge their clients’ accounts the amount of the fees paid to the depositary.

In the event of refusal to pay the depositary fees, the depositary may, under the terms of the deposit agreement, refuse the requested service until payment is received or may set off the amount of the depositary fees from any distribution to be made to the ADS holder.

The fees and charges ADS holders may be required to pay may vary over time and may be changed by us and by the depositary. ADS holders will receive prior notice of such changes.

Depositary Payments

In 2012, we received the following payments from JPMorgan Chase & Co., the depositary for our ADR program through December 31, 2012.

Service	Fees
Reimbursement of listing fees	US$130,384.80
Reimbursement of SEC filing fees	—
Reimbursement of accounting supporting fees for FASB and Public Company Accounting Oversight Board	—
Reimbursement of annual ordinary stockholders' meeting expenses	—
Reimbursement of fees in connection with annual financial and Sarbanes-Oxley Act of 2002 audit	US$1,106,014
Contribution to our company's investor relations efforts	—
Others	US$259,928.82
Total	US$1,496,327.62

PART II

ITEM 13. DEFAULTS, DIVIDEND ARREARAGES AND DELINQUENCIES

None of these events occurred in any of 2010, 2011 and 2012.

ITEM 14. MATERIAL MODIFICATIONS TO THE RIGHTS OF SECURITY HOLDERS AND USE OF PROCEEDS

None.

ITEM 15. CONTROLS AND PROCEDURES

Disclosure Controls and Procedures

As of December 31, 2012, an evaluation has been carried out under the supervision and with the participation of our management, including our Chief Executive Officer and our Chief Financial Officer, of the effectiveness of our disclosure controls and procedures, as such term is defined under Rules 13a-15(e) and 15d-15(e) promulgated under the Securities Exchange Act of 1934, as amended. Based on that evaluation, our Chief Executive Officer and Chief Financial Officer have concluded that our disclosure controls and procedures were effective as of December 31, 2012.

Management's Annual Report on Internal Control over Financial Reporting

Our management is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Rule 13a-15(f) and 15d-15(f) under the Securities Exchange Act of 1934, as amended, for our company. A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements in accordance with generally accepted accounting principles.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

As required by Section 404 of the Sarbanes-Oxley Act of 2002 and related rules as promulgated by the Securities and Exchange Commission, our management assessed the effectiveness of our internal control over financial reporting as of December 31, 2012 using the criteria established in Internal Control-Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission, or the COSO criteria. Based on this assessment, our management concluded that our internal control over financial reporting was effective as of December 31, 2012 based on the COSO criteria. Our independent registered public accounting firm, Ernst & Young has issued an attestation report with unqualified opinion on the effectiveness of our internal control over financial reporting as of December 31, 2012, which is included immediately following this report.

Attestation Report of the Independent Registered Public Accounting Firm

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Board of Directors and Stockholders of United Microelectronics Corporation:

We have audited United Microelectronics Corporation and subsidiaries' (the "Company") internal control over financial reporting as of December 31, 2012, based on criteria established in Internal Control—Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission (the COSO criteria). The Company's management is responsible for maintaining effective internal control over financial reporting, and for its assessment of the effectiveness of internal control over financial reporting included in the accompanying Management's Annual Report on Internal Control over Financial Reporting. Our responsibility is to express an opinion on the Company's internal control over financial reporting based on our audit.

We conducted our audit in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether effective internal control over financial reporting was maintained in all material respects. Our audit included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, testing and evaluating the design and operating effectiveness of internal control based on the assessed risk, and performing such other procedures as we considered necessary in the circumstances. We believe that our audit provides a reasonable basis for our opinion.

A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. A company's internal control over financial reporting includes those policies and procedures that (1) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (2) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the company are being made only in accordance with authorizations of management and directors of the company; and (3) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

In our opinion, United Microelectronics Corporation and subsidiaries maintained, in all material respects, effective internal control over financial reporting as of December 31, 2012, based on the COSO criteria**.**

We also have audited, in accordance with the standards generally accepted in the Republic of China and the standards of the Public Company Accounting Oversight Board (United States), the consolidated balance sheets of United Microelectronics Corporation and subsidiaries as of December 31, 2012 and 2011, and the related consolidated statements of income, stockholders' equity and cash flows for each of the three years in the period ended December 31, 2012 of United Microelectronics Corporation and subsidiaries and our report dated April 26, 2012 expressed an unqualified opinion thereon.

Ernst & Young

Taipei, Taiwan
Republic of China

April 26, 2013

Changes in Internal Control over Financial Reporting

There were no changes in our internal control over financial reporting that occurred during the year ended December 31, 2012 that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

ITEM 16.

ITEM 16A. AUDIT COMMITTEE FINANCIAL EXPERT

Our Board of Directors have determined that Paul S.C. Hsu and Cheng-Li Huang, two of our independent directors, qualifies as audit committee financial experts and meet the independence requirement as defined in Item 16A to Form 20-F.

The U.S. Securities and Exchange Commission has indicated that the designation of Mr. Hsu and Mr. Huang as the audit committee financial experts does not: (i) make Mr. Hsu or Mr. Huang an “expert” for any purpose, including without limitation for purposes of Section 11 of the Securities Act of 1933, as amended, as a result of this designation; (ii) impose any duties, obligations or liability on Mr. Hsu or Mr. Huang that are greater than those imposed on him as a member of the audit committee and the board of directors in the absence of such designation; or (iii) affect the duties, obligations or liability of any other member of the audit committee or the board of directors.

ITEM 16B. CODE OF ETHICS

We amended the Code of Ethics for Directors and Officers in June 2009, and the Employee Code of Conduct in October 2011. The Employee Code of Conduct, which is applicable to all employees, replaced the code of ethics filed with the Securities and Exchange Commission in our 2003 annual report on Form 20-F. We have also created a separate code of ethics applicable to our directors and officers. A copy of each of the Code of Ethics for Directors and Officers and the Employee Code of Conduct are displayed on our website at http://www.umc.com/english/pdf/Code of Ethics.pdf and http://www.umc.com/english/pdf/Code of Conduct.pdf, respectively. Stockholders may request a hard copy of the Code of Ethics for Directors and Officers and the Employee Code of Conduct free of charge. Please contact the investor relations department of our company at ir@umc.com.

ITEM 16C. PRINCIPAL ACCOUNTANT FEES AND SERVICES

The following table sets forth the aggregate fees by categories specified below in connection with certain professional services rendered by Ernst & Young, our principal external auditors, for the years indicated.

	For the years ended December 31,		
	2011	2012	
	NT$	NT$	US$
	(in thousands)		
Audit Fees (1)	73,532	70,942	2,442
Audit-related Fees (2)	1,798	2,032	70
Tax Fees (3)	3,266	8,189	282
All Other Fees (4)	15,135	5,810	200
Total	93,731	86,973	2,994

(1) Audit fees consist of fees associated with the annual audit, review of our quarterly financial statements, statutory audits and internal control review. They also include fees billed for those services that are normally provided by the independent accountants in connection with statutory and regulatory filings.

(2) Audit-related fees consist of fees billed for assurance and related services that are reasonably related to the performance of the audit or review of our financial statements but not described in footnote (1) above. These services include review of regulatory checklist for the adoption of our employee stock option plan, certification of our Singapore Branch to Singapore authorities and application for corporation registration.

(3) Tax fees include fees billed for professional services rendered by Ernst & Young, primarily in connection with our tax compliance activities.

(4) All Other Fees consists of professional services rendered by Ernst & Young for IFRS adoption.

All audit and non-audit services performed by Ernst & Young were pre-approved by our audit committee. In certain circumstances, the audit committee delegates to one designated member to pre-approve such audit and non-audit services. Pre-approval by a designated member should be reported to the audit committee at its upcoming meeting.

ITEM 16D. EXEMPTIONS FROM THE LISTING STANDARDS FOR AUDIT COMMITTEES

None.

ITEM 16E. PURCHASE OF EQUITY SECURITIES BY THE ISSUER AND AFFILIATED PURCHASERS

Since March 2004, we have from time to time announced plans, which were not binding on us, to buy back our shares up to a certain amount on the Taiwan Stock Exchange. Set for below contains certain information regarding our share buyback programs in 2010, and we did not buy back any of our shares during 2011 and 2012.

Period	Total Number of Common Shares Purchased	Average Price Paid per Common Share (NT$)	Total Number of Common Shares Purchased as Part of Publicly Announced Plans or Program	Maximum Number of Shares that May Yet be Purchased Under the Plans or Program
February 2010 (from February 3, 2010)	147,845,000	15.98	147,845,000	152,155,000
March 2010 (ended on March 22, 2010)	152,155,000	16.31	300,000,000	—

ITEM 16F. CHANGE IN REGISTRANT'S CERTIFYING ACCOUNTANT

Not applicable.

ITEM 16G. CORPORATE GOVERNANCE

As a R.O.C. company listed on the New York Stock Exchange, or NYSE, we are subject to the U.S. corporate governance rules to the extent that these rules are applicable to foreign private issuers. The following summary details the significant differences between our corporate governance practices and corporate governance standards for U.S. companies (i.e. non-foreign private issuers) under the NYSE listing standards.

The Legal Framework. In general, corporate governance principles for Taiwanese companies are set forth in the Company Act of the Republic of China, or R.O.C. Company Act, the R.O.C. Securities Exchange Act and, to the extent they are listed on the Taiwan Stock Exchange, listing rules of the Taiwan Stock Exchange. Corporate governance principles under provisions of R.O.C. law may differ in significant ways to corporate governance standards for U.S. companies listed on the NYSE. Committed to high standards of corporate governance, we have generally brought our corporate governance in line with U.S. regulations, including the formation of an audit committee. However, we have not adopted certain recommended NYSE corporate governance standards where such standards are contrary to R.O.C. laws or regulations or generally prevailing business practices in Taiwan.

Independent Board Members. Under the NYSE listing standards applicable to U.S. companies, independent directors must comprise a majority of the board of directors. We currently have four independent directors out of a total of nine directors on our board of directors. Our standards in determining director independence substantially comply with the NYSE listing standards, which include detailed tests for determining director independence. In addition, even though our independent directors meet in committee meetings of which they are committee members, we will not hold executive sessions of non-management directors. Such requirement is contrary to R.O.C. Company Act.

Board Committees. Under the NYSE listing standards, companies are required to have a nominating/corporate governance committee, composed entirely of independent directors. In addition to identifying individuals qualified to become board members, the nominating/corporate committee must develop and recommend to the board a set of corporate governance principles. We do not currently have a corporate governance committee or a nominating committee. In accordance with an interpretation letter issued under the R.O.C. Company Act, the power to nominate directors shall not vest only in the directors. Any holder of the company's voting common stock may nominate directors to be voted on by stockholders. Therefore, we do not have a nominating committee because vesting such nominating rights in a body of independent directors may result in conflict with the R.O.C. Company Act. Furthermore, we do not have a corporate governance committee as such committee is not required under R.O.C. requirements. Our board of directors is responsible for regularly reviewing our corporate governance standards and practices.

Under the NYSE listing standards, companies are required to have a compensation committee, composed entirely of independent directors. Under the R.O.C. Company Act, however, companies incorporated in the R.O.C. are not required to have a compensation committee. The R.O.C. Company Act requires that director compensation be determined either in accordance with the company's articles of incorporation or by the approval of the stockholders. Currently, in addition to compensation approved at the stockholders' meeting, in the event we have net income, we will distribute 0.1% of our earnings after payment of all income taxes, deduction of any past losses and allocation of 10% of our net income for legal reserves, as remunerations to our directors pursuant to our articles of incorporation. Currently, our board of directors is responsible for determining the form and amount of compensation for each of our directors and executive officers within the guidelines of our articles of incorporation.

Equity Compensation Plans. The NYSE listing standards also require that a company's stockholders must approve equity compensation plans. Under the corresponding requirements in the R.O.C. Company Act and the R.O.C. Securities Exchange Act, stockholders' approval is required for the distribution of employee bonuses in the form of stock, while the board of director has authority, subject to the approval of the R.O.C. Securities and Futures Bureau, to approve employee stock option plans and to grant options to employees pursuant to such plans and has also authority to approve share buy-back programs for the purpose of selling shares so purchased to employees and the sale of such shares to employees pursuant to such programs. We intend to follow only the R.O.C. requirements.

ITEM 16H. MINE SAFETY DISCLOSURE

Not applicable.

PART III

ITEM 17. FINANCIAL STATEMENTS

The Registrant has elected to provide the financial statements and related information specified in Item 18.

ITEM 18. FINANCIAL STATEMENTS

The following is a list of the audited consolidated financial statements and report of independent registered public accounting firm included in this annual report beginning on page F-1.

ITEM 19. EXHIBITS

Exhibit Number	Description of Exhibits
*1.1	Articles of Incorporation of the Company as last amended on June 15, 2011
2.1	Form of Amendment No. 1 to Deposit Agreement among the Company, and Holders and Beneficial Owners of American Depositary Shares issued thereunder, including the form of American Depositary Shares (1)
2.2	Form of Amendment No. 2 to Deposit Agreement among the Company, and Holders and Beneficial Owners of American Depositary Shares issued thereunder, including the form of American Depositary Shares (2)
4.1	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, Ko-Kuan Section, No. 20-22, Hsinchu, Taiwan, R.O.C., the site of Fab 6A (in Chinese with English summary translation) (3)
4.2	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, third section of first phase, Hsinchu, Taiwan, R.O.C., the site of Fab 8A and United Tower (in Chinese with English summary translation) (4)
4.3	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, third section of first phase, Hsinchu, Taiwan, R.O.C., the site of Fab 8C (in Chinese with English summary translation) (5)
4.4	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, third section of first phase, Hsinchu, Taiwan, R.O.C., the site of Fab 8D (in Chinese with English summary translation) (6)
4.5	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, third section of second phase, Hsinchu, Taiwan, R.O.C., the site of Fab 8E (in Chinese with English summary translation) (7)
4.6	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, Gin-Shan section, Hsinchu, Taiwan, R.O.C., the site of Fab 8F (in Chinese with English summary translation) (8)
4.7	Lease Agreement with Southern Taiwan Science Park Administration in relation to government-owned land located at Tainan Science Park, Tainan, Taiwan, R.O.C., the site of Fab 12A (in Chinese with English summary translation) (9)
4.8	Merger Agreement, entered into as of February 26, 2004, between United Microelectronics Corporation and SiS Microelectronics Corporation (English Translation) (10)
4.9	Lease Agreement with Hsinchu Science Park Administration in relation to government-owned land located at Hsinchu Science Park, Ko-Kuan section, Hsinchu, Taiwan, R.O.C., the site of Fab 8S (in Chinese with English summary translation) (11)
4.10	Lease Agreement with JTC Corporation in relation to land located at Pasir Ris Wafer Fab Park, Singapore, the site of Fab12i (summary) (12)
4.11	Merger Agreement, entered into as of April 29, 2009, among United Microelectronics Corporation, Infoshine Technology Limited and Best Elite International Limited (13)
*8.1	List of Significant Subsidiaries of United Microelectronics Corporation
11.1	Code of Ethics for Directors and Officers (14)
11.2	Employee Code of Conduct (15)
*12.1	Certification of our Chief Executive Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
*12.2	Certification of our Chief Financial Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
*13.1	Certification of our Chief Executive Officer pursuant to 18 U.S.C.§ 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002
*13.2	Certification of our Chief Financial Officer pursuant to 18 U.S.C.§ 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002
*15.1	Consent of Independent Registered Public Accounting Firm

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* Filed herewith.

(1) Incorporated by reference to Exhibit (a) to the Registrant's Registration Statement on Form F-6 (File No. 333-13796) filed with the Commission on March 2, 2006.

(2) Incorporated by reference to Exhibit (a)(iii) to the Registrant's Registration Statement on Form F-6 (File No. 333-98591) filed with the Commission on March 19, 2007.

(3) Incorporated by reference to Exhibit 4.1 to Registrant's Annual Report on Form 20-F for the fiscal year ended December 31, 2006 (File No. 001-15128) filed with the Commission on May 9, 2007.

(4) Incorporated by reference to Exhibit 10.7 to the Registrant's Registration Statement on Form F-1 (File No. 333-12444) filed with the Commission on August 28, 2000, as amended.

(5) Incorporated by reference to Exhibit 10.8 to the Registrant's Registration Statement on Form F-1 (File No. 333-12444) filed with the Commission on August 28, 2000, as amended.

(6) Incorporated by reference to Exhibit 10.9 to the Registrant's Registration Statement on Form F-1 (File No. 333-12444) filed with the Commission on August 28, 2000, as amended.

(7) Incorporated by reference to Exhibit 10.10 to the Registrant's Registration Statement on Form F-1 (File No. 333-12444) filed with the Commission on August 28, 2000, as amended.

(8) Incorporated by reference to Exhibit 10.11 to the Registrant's Registration Statement on F-1 (File No. 333-12444) filed with the Commission on August 28, 2000, as amended.

(9) Incorporated by reference to Exhibit 10.12 to the Registrant's Registration Statement on F-1 (File No. 333-12444) filed with the Commission on August 28, 2000, as amended.

(10) Incorporated by reference to Exhibit 4.8 to the Registrant's Annual Report on Form 20-F for the fiscal year ended December 31, 2003 (File No. 1-15128) filed with the Commission on June 17, 2004.

(11) Incorporated by reference to Exhibit 4.9 to Registrant's Annual Report on Form 20-F for the fiscal year ended December 31, 2006 (File No. 001-15128) filed with the Commission on May 9, 2007.

(12) Incorporated by reference to Exhibit 4.10 to Registrant's Annual Report on Form 20-F for the fiscal year ended December 31, 2006 (File No. 001-15128) filed with the Commission on May 9, 2007.

(13) Incorporated by reference to Exhibit 99.1 to the Form 6-K furnished to the Commission on May 8, 2009.

(14) Incorporated by reference to Exhibit 99.1 to the Form 6-K furnished to the Commission on May 25, 2005.

(15) Incorporated by reference to Exhibit 99.2 to the Form 6-K furnished to the Commission on March 26, 2006.

SIGNATURES

The registrant hereby certifies that it meets all of the requirements for filing on Form 20-F and that it has duly caused and authorized the undersigned to sign this annual report on its behalf.

UNITED MICROELECTRONICS CORPORATION

By: /s/ CHITUNG LIU
Name: Chitung Liu
Title: Chief Financial Officer

Date: April 26, 2013

United Microelectronics Corporation and Subsidiaries

Consolidated Financial Statements for years ended December 31, 2010, 2011 and 2012

Together with Report of Independent Registered Public Accounting Firm

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Board of Directors and Stockholders of United Microelectronics Corporation

We have audited the accompanying consolidated balance sheets of United Microelectronics Corporation and subsidiaries (the "Company") as of December 31, 2012 and 2011, and the related consolidated statements of income, changes in stockholders' equity and cash flows for each of the three years in the period ended December 31, 2012. These financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits in accordance with standards generally accepted in the Republic of China ("R.O.C.") and the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the consolidated financial position of United Microelectronics Corporation and subsidiaries at December 31, 2012 and 2011, and the consolidated results of their operations and their cash flows for each of the three years in the period ended December 31, 2012, in conformity with the requirements of the Guidelines Governing the Preparation of Financial Reports by Securities Issuers and accounting principles generally accepted in the Republic of China, which differ in certain respects from U.S. generally accepted accounting principles (see Note 36 to the consolidated financial statements).

As described in Note 3 to the consolidated financial statements, effective from January 1, 2011, the Company has adopted the third revision of the Statement of Financial Accounting Standards No. 34, "Financial Instruments: Recognition and Measurement", and the newly issued Statement of Financial Accounting Standards No. 41, "Operating Segments" of the Republic of China.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States), United Microelectronics Corporation and subsidiaries' internal control over financial reporting as of December 31, 2012, based on criteria established in Internal Control – Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission and our report dated April 26, 2013 expressed an unqualified opinion thereon.

ERNST & YOUNG
CERTIFIED PUBLIC ACCOUNTANTS

Taipei, Taiwan
Republic of China

April 26, 2013

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED BALANCE SHEETS
(Expressed in Thousands)

	Notes	As of December 31, 2011 NT$	2012 NT$	2012 US$
Assets				
Current assets				
Cash and cash equivalents	2, 4	49,070,128	42,592,725	1,466,187
Financial assets at fair value through profit or loss, current	2, 5	695,931	655,994	22,582
Available-for-sale financial assets, current	2, 8	5,124,780	4,330,880	149,084
Held-to-maturity financial assets, current	2	13,524	—	—
Notes receivable	2, 3	74,572	25,308	871
Accounts receivable, net	2, 3, 6	14,390,541	16,220,832	558,376
Accounts receivable-related parties, net	2, 3, 27	130,553	81,741	2,814
Other receivables	2, 3	724,563	836,234	28,786
Inventories, net	2, 7	12,709,276	13,023,710	448,320
Prepaid expenses		804,789	1,929,401	66,417
Non-current assets held for sale	2	583	313,171	10,780
Deferred income tax assets, current	2, 25	297,943	890,391	30,650
Restricted assets		20,331	17,135	590
Total current assets		84,057,514	80,917,522	2,785,457
Funds and investments				
Financial assets at fair value through profit or loss, noncurrent	2, 5	119,711	72,706	2,503
Available-for-sale financial assets, noncurrent	2, 8, 14	18,835,224	15,116,740	520,370
Financial assets measured at cost, noncurrent	2, 9, 14	8,298,967	7,963,242	274,122
Long-term investments accounted for under the equity method	2, 10, 14, 33	11,275,894	11,792,007	405,921
Prepayment for long-term investments		44,392	34,803	1,198
Total funds and investments		38,574,188	34,979,498	1,204,114
Property, plant and equipment	2, 11, 14, 28, 29			
Land		2,065,194	2,112,483	72,719
Buildings		26,631,417	25,957,299	893,539
Machinery and equipment		559,032,330	595,789,472	20,509,104
Transportation equipment		64,918	67,148	2,311
Furniture and fixtures		4,378,308	4,882,971	168,089
Leasehold improvements		836,313	1,753,124	60,348
Total cost		593,008,480	630,562,497	21,706,110
Less : Accumulated depreciation		(463,622,840)	(485,931,177)	(16,727,407)
Less : Accumulated impairment		(3,115,991)	(4,621,310)	(159,081)
Add : Construction in progress and prepayments		23,054,651	18,844,025	648,675
Property, plant and equipment, net		149,324,300	158,854,035	5,468,297
Trademarks	2	317	572	19
Goodwill	2, 14	50,863	50,863	1,751
Other intangible assets	2, 12	299,680	1,306,057	44,959
Deferred charges	2	1,513,157	1,523,909	52,458
Deferred income tax assets, noncurrent	2, 25	2,993,953	828,256	28,511
Other assets-others	2, 13, 14, 28	3,017,774	2,498,206	85,997
Total assets		279,831,746	280,958,918	9,671,563
Liabilities and Stockholders' Equity				
Current liabilities				
Short-term loans	15	9,411,877	5,772,615	198,713
Financial liabilities at fair value through profit or loss, current	2, 16	741,531	767,605	26,424
Notes and accounts payable		5,010,222	6,265,920	215,694
Income tax payable	2	514,977	1,191,790	41,026
Accrued expenses	2, 23	9,756,579	10,782,582	371,173
Payable on equipment		8,517,694	5,382,395	185,280
Current portion of long-term liabilities	2, 17, 18, 28	8,002,051	8,887,006	305,921
Deferred income tax liabilities, current	2, 25	32,985	16	1
Other current liabilities		918,038	983,892	33,869
Total current liabilities		42,905,954	40,033,821	1,378,101
Long-term liabilities				
Bonds payable	2, 17	11,984,404	21,932,193	754,981
Long-term loans	18, 28	9,110,982	10,222,620	351,897
Accrued pension liabilities	2, 19	3,261,101	3,366,143	115,874
Deposits-in		105,617	153,745	5,292
Deferred income tax liabilities, noncurrent	2, 25	35,908	32,304	1,112
Other liabilities-others		302,817	197,147	6,786
Total long-term liabilities		24,800,829	35,904,152	1,235,942
Total liabilities		67,706,783	75,937,973	2,614,043
Commitments and contingent	29			
Capital stock	2, 20, 21	130,844,556	129,521,093	4,458,557
Additional paid-in capital	2, 10, 17, 21	46,460,665	46,994,672	1,617,717
Retained earnings	2, 10, 23	24,499,124	25,905,225	891,746
Cumulative translation adjustment	2	(2,268,792)	(5,725,284)	(197,083)
Unrealized gain or loss on financial instruments	2, 8	14,424,891	10,717,489	368,933
Treasury stock	2, 20, 22	(6,223,357)	(4,963,389)	(170,857)

Total stockholders' equity of the Company	207,737,087	202,449,806	6,969,013
Minority interests	4,387,876	2,571,139	88,507
Total stockholders' equity	212,124,963	205,020,945	7,057,520
Total liabilities and stockholders' equity	279,831,746	280,958,918	9,671,563

The accompanying notes are an integral part of these consolidated financial statements.

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED STATEMENTS OF INCOME
(Expressed in Thousands, Except for Earnings per Share)

	Notes	For the years ended December 31, 2010 NT$	2011 NT$	2012 NT$	2012 US$
Net operating revenues	2, 27	126,441,544	116,702,723	115,674,763	3,981,919
Cost of goods sold	2, 7, 19, 21, 24	(89,517,205)	(95,416,529)	(96,262,902)	(3,313,697)
Gross profit		36,924,339	21,286,194	19,411,861	668,222
Operating expenses	2, 19, 21, 24				
Sales and marketing expenses		(2,565,821)	(3,369,589)	(2,748,753)	(94,621)
General and administrative expenses		(3,598,361)	(3,341,672)	(3,371,646)	(116,064)
Research and development expenses		(8,740,479)	(9,395,066)	(9,786,831)	(336,896)
		(14,904,661)	(16,106,327)	(15,907,230)	(547,581)
Operating income		22,019,678	5,179,867	3,504,631	120,641
Non-operating income					
Interest revenue		143,480	229,244	211,371	7,276
Investment gain accounted for under the equity method, net	2, 10	114,608	—	718,527	24,734
Dividend income		1,344,017	1,715,111	1,021,699	35,170
Gain on disposal of property, plant and equipment	2	50,383	30,685	661,309	22,765
Gain on disposal of investments	2	2,020,797	1,688,016	5,345,609	184,014
Exchange gain, net	2	—	463,730	353,157	12,157
Gain on valuation of financial assets	2, 5	—	—	49,319	1,698
Gain on valuation of financial liabilities	2, 16	—	1,341,249	—	—
Other income		1,019,469	2,054,687	815,249	28,064
		4,692,754	7,522,722	9,176,240	315,878
Non-operating expenses					
Interest expense	2, 11	(16,800)	(306,015)	(458,007)	(15,766)
Investment loss accounted for under the equity method, net	2, 10	—	(312,261)	—	—
Other investment loss		—	(362)	—	—
Loss on disposal of property, plant and equipment	2	(9,259)	(8,542)	(30,706)	(1,057)
Exchange loss, net	2	(150,905)	—	—	—
Financial expenses		(64,595)	(53,831)	(80,262)	(2,763)
Impairment loss	2, 14	(113,879)	(2,246,490)	(3,369,694)	(115,997)
Loss on valuation of financial assets	2, 5	(217,895)	(343,855)	—	—
Loss on valuation of financial liabilities	2, 16	(665,116)	—	(667,160)	(22,966)
Other losses		(90,362)	(50,882)	(72,083)	(2,481)
		(1,328,811)	(3,322,238)	(4,677,912)	(161,030)
Income from continuing operations before income tax and extraordinary gain		25,383,621	9,380,351	8,002,959	275,489
Income tax expense	2, 25	(1,606,114)	(913,435)	(2,129,038)	(73,289)
Extraordinary gain		68,449	—	—	—
Net income		23,845,956	8,466,916	5,873,921	202,200
Attributable to :					
the Company		23,898,905	10,609,695	7,819,448	269,172
Minority interests		(52,949)	(2,142,779)	(1,945,527)	(66,972)
		23,845,956	8,466,916	5,873,921	202,200
Earnings per share-basic (in dollars)	2, 26	1.91	0.84	0.62	
Shares used in per share calculation-basic		12,496,485	12,561,249	12,624,817	
Earnings per share-diluted (in dollars)	2, 26	1.87	0.81	0.59	
Shares used in per share calculation-diluted		12,767,590	13,241,680	13,456,168	

The accompanying notes are an integral part of the consolidated financial statements.

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED STATEMENTS OF CHANGES IN STOCKHOLDERS' EQUITY
(Expressed in Thousands)

	Capital			Retained Earnings						
	Common Stock	Shares	Additional Paid-in Capital	Legal Reserve	Unappropriated Earnings	Cumulative Translation Adjustment	Unrealized Gain/Loss on Financial Instruments	Treasury Stock	Minority Interests	Total
	NT$		NT$	NT$	NT$	NT$	NT$	NT$	NT$	NT$
Balance as of January 1, 2010	129,877,713	12,987,771	44,365,049	—	10,648,813	(318,188)	30,915,079	(1,890,145)	497,935	214,096,256
Appropriation and distribution of 2009 retained earnings										
Legal reserve	—	—	—	1,064,881	(1,064,881)	—	—	—	—	—
Cash dividends	—	—	—	—	(6,233,002)	—	—	—	—	(6,233,002)
Net income in 2010	—	—	—	—	23,898,905	—	—	—	(52,949)	23,845,956
Treasury stock acquired	—	—	—	—	—	—	—	(4,843,588)	—	(4,843,588)
Compensation cost of employee stock options	—	—	254,106	—	—	—	—	—	—	254,106
Treasury stock sold to employees	—	—	420,648	—	—	—	—	510,376	—	931,024
Adjustment of funds and investments disposal	—	—	—	—	—	(30)	—	—	—	(30)
Adjustment of retained earnings accounted for under the equity method	—	—	—	—	(119,157)	—	—	—	—	(119,157)
Cash dividends allocated to subsidiaries	—	—	8,040	—	—	—	—	—	—	8,040
Changes in unrealized loss on available-for-sale financial assets	—	—	—	—	—	—	(1,268,275)	—	—	(1,268,275)
Changes in unrealized loss on financial instruments of investees	—	—	—	—	—	—	(1,930,821)	—	—	(1,930,821)
Exercise employee stock options	1,410	141	1,132	—	—	—	—	—	—	2,542
Changes in cumulative translation adjustment	—	—	—	—	—	(4,960,782)	—	—	—	(4,960,782)
Changes in minority interests	—	—	—	—	—	—	—	—	5,353,760	5,353,760
Balance as of December 31, 2010	129,879,123	12,987,912	45,048,975	1,064,881	27,130,678	(5,279,000)	27,715,983	(6,223,357)	5,798,746	225,136,029

The accompanying notes are an integral part of the consolidated financial statements.

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED STATEMENTS OF CHANGES IN STOCKHOLDERS' EQUITY
(Expressed in Thousands)

	Capital				Retained Earnings						
	Common Stock	Shares	Collected in Advance	Additional Paid-in Capital	Legal Reserve	Unappropriated Earnings	Cumulative Translation Adjustment	Unrealized Gain/Loss on Financial Instruments	Treasury Stock	Minority Interests	Total
	NT$		NT$	NT$	NT$	NT$	NT$	NT$	NT$	NT$	NT$
Balance as of January 1, 2011	129,879,123	12,987,912	—	45,048,975	1,064,881	27,130,678	(5,279,000)	27,715,983	(6,223,357)	5,798,746	225,136,029
Appropriation and distribution of 2010 retained earnings											
Legal reserve	—	—	—	—	2,377,975	(2,377,975)	—	—	—	—	—
Cash dividends	—	—	—	—	—	(14,033,575)	—	—	—	—	(14,033,575)
Net income in 2011	—	—	—	—	—	10,609,695	—	—	—	(2,142,779)	8,466,916
Compensation cost of employee stock options	—	—	—	213,639	—	—	—	—	—	—	213,639
Treasury stock sold to employees	—	—	—	599,139	—	—	—	—	—	—	599,139
Embedded conversion options derived from convertible bonds	—	—	—	679,612	—	—	—	—	—	—	679,612
Derecognise convertible bonds	—	—	—	(137,088)	—	—	—	—	—	—	(137,088)
Adjustment of additional paid-in capital accounted for under the equity method	—	—	—	(103)	—	—	—	—	—	—	(103)
Adjustment of funds and investments disposal	—	—	—	—	—	—	(5)	—	—	—	(5)
Adjustment of retained earnings accounted for under the equity method	—	—	—	—	—	(272,555)	—	—	—	—	(272,555)
Cash dividends allocated to subsidiaries	—	—	—	17,874	—	—	—	—	—	—	17,874
Changes in unrealized loss on available-for-sale financial assets	—	—	—	—	—	—	—	(10,470,556)	—	—	(10,470,556)
Changes in unrealized loss on financial instruments of investees	—	—	—	—	—	—	—	(2,820,536)	—	—	(2,820,536)
Exercise employee stock options	964,293	96,430	1,140	38,617	—	—	—	—	—	—	1,004,050
Changes in cumulative translation adjustment	—	—	—	—	—	—	3,010,213	—	—	—	3,010,213
Changes in minority interests	—	—	—	—	—	—	—	—	—	731,909	731,909
Balance as of December 31, 2011	130,843,416	13,084,342	1,140	46,460,665	3,442,856	21,056,268	(2,268,792)	14,424,891	(6,223,357)	4,387,876	212,124,963

The accompanying notes are an integral part of the consolidated financial statements.

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED STATEMENTS OF CHANGES IN STOCKHOLDERS' EQUITY
(Expressed in Thousands)

	Capital				Retained Earnings						
	Common Stock	Shares	Collected in Advance	Additional Paid-in Capital	Legal Reserve	Unappropriated Earnings	Cumulative Translation Adjustment	Unrealized Gain/Loss on Financial Instruments	Treasury Stock	Minority Interests	Total
	NT$		NT$	NT$	NT$	NT$	NT$	NT$	NT$	NT$	NT$
Balance as of January 1, 2012	130,843,416	13,084,342	1,140	46,460,665	3,442,856	21,056,268	(2,268,792)	14,424,891	(6,223,357)	4,387,876	212,124,963
Appropriation and distribution of 2011 retained earnings											
Legal reserve	—	—	—	—	1,033,714	(1,033,714)	—	—	—	—	—
Cash dividends	—	—	—	—	—	(6,316,435)	—	—	—	—	(6,316,435)
Net income in 2012	—	—	—	—	—	7,819,448	—	—	—	(1,945,527)	5,873,921
Treasury stock retired	(1,579,344)	(157,934)	—	319,376	—	—	—	—	1,259,968	—	—
Compensation cost of employee stock options	—	—	—	77,643	—	—	—	—	—	—	77,643
Treasury stock sold to employees	—	—	—	125,120	—	—	—	—	—	—	125,120
Derecognise convertible bonds	—	—	—	(6,403)	—	—	—	—	—	—	(6,403)
Adjustment of funds and investments disposal	—	—	—	—	—	—	216	—	—	—	216
Adjustment of retained earnings accounted for under the equity method	—	—	—	—	—	(96,912)	—	—	—	—	(96,912)
Cash dividends allocated to subsidiaries	—	—	—	8,036	—	—	—	—	—	—	8,036
Changes in unrealized loss on available-for-sale financial assets	—	—	—	—	—	—	—	(1,526,507)	—	—	(1,526,507)
Changes in unrealized loss on financial instruments of investees	—	—	—	—	—	—	—	(2,180,895)	—	—	(2,180,895)
Exercise employee stock options	253,983	25,398	1,898	10,235	—	—	—	—	—	—	266,116
Changes in cumulative translation adjustment	—	—	—	—	—	—	(3,456,708)	—	—	—	(3,456,708)
Changes in minority interests	—	—	—	—	—	—	—	—	—	128,790	128,790
Balance as of December 31, 2012	129,518,055	12,951,806	3,038	46,994,672	4,476,570	21,428,655	(5,725,284)	10,717,489	(4,963,389)	2,571,139	205,020,945

The accompanying notes are an integral part of the consolidated financial statements.

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED STATEMENTS OF CASH FLOWS
(Expressed in Thousands)

	For the years ended December 31,			
	2010	2011	2012	
	NT$	NT$	NT$	US$
Cash flows from operating activities:				
Net income attributable to stockholders of the Company	23,898,905	10,609,695	7,819,448	269,172
Net loss attributable to minority interests	(52,949)	(2,142,779)	(1,945,527)	(66,972)
Adjustments to reconcile net income (loss) to net cash provided by operating activities:				
Extraordinary gain	(82,469)	—	—	—
Depreciation	29,951,312	31,915,068	35,011,412	1,205,212
Amortization	544,321	455,731	726,163	24,997
Bad debt expense (reversal)	20,748	578,805	(12,059)	(415)
Donation income	—	(691,611)	—	—
Loss on decline in market value, scrap and obsolescence of inventories	82,453	1,754,699	533,778	18,375
Cash dividends received under the equity method	48,753	305,396	85,635	2,948
Investment loss (gain) accounted for under the equity method	(114,608)	312,261	(718,527)	(24,734)
Loss (Gain) on valuation of financial assets and liabilities	883,011	(997,394)	617,841	21,268
Impairment loss	113,879	2,246,490	3,369,694	115,996
Gain on disposal of investments	(2,020,797)	(1,688,016)	(5,345,609)	(184,014)
Loss on other investment	—	—	26,790	922
Gain on disposal of property, plant and equipment	(41,124)	(22,143)	(630,603)	(21,708)
Gain on disposal of non-current assets held for sale	(449)	(193,855)	—	—
Gain on reacquisition of bonds	—	(167,311)	(105,106)	(3,618)
Amortization of financial assets discounts	(7,253)	—	—	—
Amortization of bond discounts	227,139	300,389	338,217	11,643
Amortization of administrative expenses from syndicated loans	273	4,051	4,606	159
Exchange loss (gain) on financial assets and liabilities	(327,341)	77,874	(117,602)	(4,048)
Exchange loss (gain) on long-term liabilities	(498,520)	188,531	(122,609)	(4,221)
Exchange gain on capital reduction of long-term investments accounted for under the equity method	—	—	(232,820)	(8,014)
Exchange loss (gain) on disposal of non-current assets held for sale	266	(767)	(279)	(10)
Amortization of deferred income	(145,764)	(98,940)	(101,248)	(3,485)
Stock-based payment	646,968	796,253	195,905	6,744
Changes in assets and liabilities:				
Financial assets and liabilities at fair value through profit or loss	612,802	(140,618)	80,909	2,785
Notes receivable and Accounts receivable	(2,315,832)	3,762,332	(1,881,414)	(64,765)
Other receivables	1,380,061	(124,682)	43,833	1,509
Inventories	(3,334,002)	(1,250,546)	(1,008,090)	(34,702)
Prepaid expenses	(586,039)	65,796	(645,350)	(22,215)
Deferred income tax assets and liabilities	69,112	469,352	1,287,855	44,332
Notes and accounts payable	1,776,366	(2,054,788)	1,341,039	46,163
Accrued expenses	3,893,450	(2,811,033)	1,418,049	48,814
Other current liabilities	(1,271,666)	12,722	183,892	6,330
Accrued pension liabilities	38,378	(32,378)	110,826	3,815
Other liabilities-others	105,629	215,216	206,070	7,094
Net cash provided by operating activities	53,495,013	41,653,800	40,535,119	1,395,357
Cash flows from investing activities:				
Acquisition of financial assets at fair value through profit or loss	(163,620)	(85,451)	(22,220)	(765)
Proceeds from disposal of financial assets at fair value through profit or loss	—	29,656	—	—
Acquisition of available-for-sale financial assets	(232,092)	(98,188)	(600,226)	(20,662)
Proceeds from disposal of available-for-sale financial assets	3,485,293	3,103,136	4,888,442	168,277
Acquisition of financial assets measured at cost	(835,525)	(1,517,080)	(1,287,971)	(44,336)
Proceeds from disposal of financial assets measured at cost	333,977	409,240	881,985	30,361
Acquisition of long-term investments accounted for under the equity method	(597,459)	(3,325,272)	(281,695)	(9,697)
Proceeds from disposal of long-term investments accounted for under the equity method	157,734	119,643	1,705	59
Proceeds from maturity of held-to-maturity financial assets	—	—	13,524	466
Prepayment for long-term investments	—	(43,921)	—	—
Proceeds from capital reduction and liquidation of investments	52,914	251,584	275,377	9,479
Net cash received (paid) from acquisition of subsidiaries	1,859,186	29,350	(1,525)	(53)
Net cash paid for disposal of subsidiaries	(176,217)	(93,668)	(241,261)	(8,305)
Other receivables	27,108	—	—	—
Acquisition of minority interests	(266,382)	(111,533)	—	—
Acquisition of property, plant and equipment	(61,322,819)	(53,326,115)	(52,185,910)	(1,796,417)
Proceeds from disposal of property, plant and equipment	76,044	44,962	1,160,719	39,956
Proceeds from disposal of non-current assets held for sale	405,098	594,738	—	—
Acquisition of non-current assets held for sale	—	—	(313,171)	(10,781)
Increase in deferred charges	(382,050)	(392,956)	(631,439)	(21,736)
Acquisition of intangible assets	—	(287,203)	(762,818)	(26,259)
Decrease (Increase) in restricted assets	(26,077)	4,806	27,218	937
Increase in other assets-others	(174,066)	(425,788)	(69,147)	(2,380)
Net cash used in investing activities	(57,778,953)	(55,120,060)	(49,148,413)	(1,691,856)

The accompanying notes are an integral part of these consolidated financial statements.

UNITED MICROELECTRONICS CORPORATION AND SUBSIDIARIES
CONSOLIDATED STATEMENTS OF CASH FLOWS
(Expressed in Thousands)

	For the years ended December 31,			
	2010	2011	2012	
	NT$	NT$	NT$	US$
Cash flows from financing activities:				
Increase (decrease) in short-term loans	4,202,660	5,294,899	(3,544,490)	(122,013)
Proceeds from long-term loans	1,345,000	7,861,160	17,062,355	587,345
Repayments of long-term loans	(33,450)	(3,457,383)	(13,942,144)	(479,936)
Proceeds from bonds issued	—	14,423,000	10,000,000	344,234
Bond issuance costs	—	(67,322)	(12,830)	(442)
Redemption of bonds	(7,500,000)	—	—	—
Reacquisition of bonds	—	(1,725,732)	(139,408)	(4,799)
Cash dividends	(6,224,963)	(14,015,701)	(6,316,420)	(217,433)
Exercise of employee stock options	2,542	1,004,050	266,116	9,161
Treasury stock acquired	(4,843,588)	—	—	—
Treasury stock sold to employees	510,517	—	—	—
Proceeds from disposal of treasury stock	27,211	15,071	4,207	145
Increase in deposits-in	9,620	81,722	55,202	1,900
Increase in minority stockholders	2,330,577	509,225	155,161	5,341
Net cash provided by (used in) financing activities	(10,173,874)	9,922,989	3,587,749	123,503
Effect of exchange rate changes on cash and cash equivalents	(424,041)	1,342,294	(1,451,858)	(49,978)
Net decrease in cash and cash equivalents	(14,881,855)	(2,200,977)	(6,477,403)	(222,974)
Cash and cash equivalents at beginning of period	66,152,960	51,271,105	49,070,128	1,689,161
Cash and cash equivalents at end of period	51,271,105	49,070,128	42,592,725	1,466,187
Supplemental disclosures of cash flow information:				
Cash paid for interest	239,265	262,459	359,643	12,380
Less: Cash paid for capitalized interest	(224,029)	(72,495)	(91,215)	(3,140)
Cash paid for interest excluding capitalized interest	15,236	189,964	268,428	9,240
Cash paid for income tax	117,584	1,452,646	105,824	3,643
Investing activities partially paid by cash:				
Acquisition of property, plant and equipment	67,623,874	49,286,693	49,075,663	1,689,352
Discount on property, plant and equipment	(1,592)	(58,110)	(6,945)	(239)
Add: Payable at beginning of period	5,487,908	12,620,481	8,517,694	293,208
Add: Effect of acquisition of subsidiaries	833,110	—	—	—
Less: Payable at end of period	(12,620,481)	(8,517,694)	(5,382,395)	(185,281)
Less: Effect of disposal of subsidiaries	—	(5,255)	(18,107)	(623)
Cash paid for acquiring property, plant and equipment	61,322,819	53,326,115	52,185,910	1,796,417

The accompanying notes are an integral part of the consolidated financial statements.

1. HISTORY AND ORGANIZATION

United Microelectronics Corporation (UMC) was incorporated in May 1980 and commenced operations in April 1982. UMC is a full service semiconductor wafer foundry, and provides a variety of services to satisfy customer needs. UMC's common shares were publicly listed on the Taiwan Stock Exchange (TSE) in July 1985 and its American Depositary Shares (ADSs) were listed on the New York Stock Exchange (NYSE) in September 2000.

The numbers of employees as of December 31, 2011 and 2012 were 15,820 and 15,624, respectively.

2. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

The consolidated financial statements were prepared in conformity with requirements of the Guidelines Governing the Preparation of Financial Reports by Securities Issuers and accounting principles generally accepted in the Republic of China (R.O.C.).

Summary of significant accounting policies is as follows:

General Descriptions of Reporting Entities

Principles of Consolidation

Investees in which UMC, directly or indirectly, holds more than 50% of voting rights are consolidated into UMC's financial statements. (UMC and the consolidated entities are hereinafter referred to as "the Company".)

Transactions between consolidated entities are eliminated in the consolidated financial statements. The difference between the acquisition cost and the net equity of a subsidiary as of the acquisition date was amortized, and goodwill arising from new acquisitions is analyzed and accounted for under the R.O.C. Statement of Financial Accounting Standard (R.O.C. SFAS) No. 25, "Business Combination—Accounting Treatment under Purchase Method" (R.O.C. SFAS 25), in which goodwill is not subject to amortization.

The consolidated entities are as follows:

As of December 31, 2011

Investor	Subsidiary	Business nature	Percentage of ownership (%)
UMC	UMC GROUP (USA) (UMC-USA)	IC Sales	100.00
UMC	UNITED MICROELECTRONICS (EUROPE) B.V. (UME BV)	Marketing support activities	100.00
UMC	UMC CAPITAL CORP.	Investment holding	100.00
UMC	GREEN EARTH LIMITED	Investment holding	100.00
UMC	TLC CAPITAL CO., LTD. (TLC)	New business investment	100.00
UMC	UMC NEW BUSINESS INVESTMENT CORP. (NBI)	Investment holding	100.00
UMC	UMC INVESTMENT (SAMOA) LIMITED	Investment holding	100.00
UMC	FORTUNE VENTURE CAPITAL CORP. (FORTUNE)	Consulting and planning for investment in new business	100.00
UMC	UMC JAPAN (UMCJ)	Sales and manufacturing of integrated circuits	100.00
UMC	NEXPOWER TECHNOLOGY CORP. (NEXPOWER)	Sales and manufacturing of solar power batteries	44.16
FORTUNE	UNITRUTH INVESTMENT CORP. (UNITRUTH)	Investment holding	100.00
FORTUNE	TOPCELL SOLAR INTERNATIONAL CO., LTD. (TOPCELL)	Solar power cell manufacturing and sale	8.81
FORTUNE	NEXPOWER	Sales and manufacturing of solar power batteries	5.05
UNITRUTH	TOPCELL	Solar power cell manufacturing and sale	3.81
UNITRUTH	NEXPOWER	Sales and manufacturing of solar power batteries	2.25
UMC CAPITAL CORP.	UMC CAPITAL (USA)	Investment holding	100.00
UMC CAPITAL CORP.	ECP VITA LTD. (Note A)	Insurance	100.00
TLC	SOARING CAPITAL CORP.	Investment holding	100.00
TLC	TOPCELL	Solar power cell manufacturing and sale	8.81
TLC	NEXPOWER	Sales and manufacturing of solar power batteries	5.87
SOARING CAPITAL CORP.	UNITRUTH ADVISOR (SHANGHAI) CO., LTD.	Investment holding and advisory	100.00
NBI	GREEN FIELD (SAMOA) LIMITED (Note B)	Investment holding	100.00

Investor	Subsidiary	Business nature	Percentage of ownership (%)
NBI	TERA ENERGY DEVELOPMENT CO., LTD. (TERA ENERGY)	Energy technical services	100.00
NBI	EVERRICH ENERGY CORP. (EVERRICH)	Solar engineering integrated design services	90.61
NBI	UNISTARS CORP. (UNISTARS)	High brightness LED packages	72.83
NBI	WAVETEK MICROELECTRONICS CORPORATION (WAVETEK)	GaAs foundry service	72.16
NBI	UNITED LIGHTING (Note C)	LED lighting manufacturing and sale	55.25
NBI	TOPCELL	Solar power cell manufacturing and sale	48.66
UNITED LIGHTING	UNITED LIGHTING OPTO-ELECTRONIC INVESTMENT (HK) LIMITED (Note C)	Investment holding	100.00
UNITED LIGHTING	POWER LIGHT INVESTMENTS LIMITED (POWER LIGHT (SAMOA)) (Note C)	Investment holding	100.00
POWER LIGHT (SAMOA)	BAO LIN (SHANDONG) GUANG DIAN KE JI YOU XIAN GONGSI (Note C)	LED lighting manufacturing and sale	100.00
WAVETEK	WAVETEK MICROELECTRONICS INVESTMENT (HK) LIMITED	Investment holding	100.00
EVERRICH	EVERRICH ENERGY INVESTMENT (HK) LIMITED (EVERRICH-HK)	Investment holding	100.00
EVERRICH	SMART ENERGY ENTERPRISES LIMITED (SMART ENERGY)	Investment holding	100.00
EVERRICH-HK	EVERRICH (SHANDONG) ENERGY CO., LTD.	Solar engineering integrated design services	100.00
SMART ENERGY	SMART ENERGY SHANDONG CORPORATION	Solar engineering integrated design services	100.00
GREEN FIELD (SAMOA) LIMITED	NEW BUSINESS REALTY (SAMOA) LIMITED (Note B)	Investment holding	100.00
NEXPOWER	NEWENERGY HOLDING LIMITED (Note D)	Investment holding	100.00
NEXPOWER	NPT HOLDING LIMITED	Investment holding	100.00
NEWENERGY HOLDING LIMITED	FUTUREPOWER HOLDING LIMITED (Note D)	Investment holding	100.00

Investor	Subsidiary	Business nature	Percentage of ownership (%)
FUTUREPOWER HOLDING LIMITED	NEXPOWER (SHANDONG) ENERGY CO., LTD. (Note D)	Sales and manufacturing of photovoltaic batteries and photovoltaic modules	100.00
NPT HOLDING LIMITED	NLL HOLDING LIMITED	Investment holding	100.00

As of December 31, 2012

Investor	Subsidiary	Business nature	Percentage of ownership (%)
UMC	UMC-USA	IC Sales	100.00
UMC	UME BV	Marketing support activities	100.00
UMC	UMC CAPITAL CORP.	Investment holding	100.00
UMC	GREEN EARTH LIMITED	Investment holding	100.00
UMC	TLC	New business investment	100.00
UMC	NBI	Investment holding	100.00
UMC	UMC INVESTMENT (SAMOA) LIMITED	Investment holding	100.00
UMC	FORTUNE	Consulting and planning for investment in new business	100.00
UMC	UMCJ	Sales and manufacturing of integrated circuits	100.00
UMC	NEXPOWER	Sales and manufacturing of solar power batteries	44.16
FORTUNE	UNITRUTH	Investment holding	100.00
FORTUNE	TOPCELL	Solar power cell manufacturing and sale	8.79
FORTUNE	NEXPOWER	Sales and manufacturing of solar power batteries	5.05
UNITRUTH	TOPCELL	Solar power cell manufacturing and sale	3.80
UNITRUTH	NEXPOWER	Sales and manufacturing of solar power batteries	2.25
UMC CAPITAL CORP.	UMC CAPITAL (USA)	Investment holding	100.00
UMC CAPITAL CORP.	ECP VITA PTE. LTD.	Insurance	100.00
TLC	SOARING CAPITAL CORP.	Investment holding	100.00
TLC	TOPCELL	Solar power cell manufacturing and sale	8.79
TLC	NEXPOWER	Sales and manufacturing of solar power batteries	5.87

Investor	Subsidiary	Business nature	Percentage of ownership (%)
SOARING CAPITAL CORP.	UNITRUTH ADVISOR (SHANGHAI) CO., LTD.	Investment holding and advisory	100.00
UMC INVESTMENT (SAMOA) LIMITED	UMC (BEIJING) LIMITED	Marketing support activities	100.00
NBI	TERA ENERGY	Energy technical services	100.00
NBI	EVERRICH	Solar engineering integrated design services	89.38
NBI	WAVETEK	GaAs foundry service	74.69
NBI	UNISTARS	High brightness LED packages	72.04
NBI	TOPCELL	Solar power cell manufacturing and sale	48.53
WAVETEK	WAVETEK MICROELECTRONICS INVESTMENT (HK) LIMITED	Investment holding	100.00
EVERRICH	EVERRICH-HK	Investment holding	100.00
EVERRICH	SMART ENERGY	Investment holding	100.00
EVERRICH-HK	EVERRICH (SHANDONG) ENERGY CO., LTD.	Solar engineering integrated design services	100.00
SMART ENERGY	SMART ENERGY SHANDONG CORPORATION	Solar engineering integrated design services	100.00
TERA ENERGY	TERA ENERGY USA INC.	Solar project	100.00
NEXPOWER	NPT HOLDING LIMITED	Investment holding	100.00
NEXPOWER	SOCIALNEX ITALIA 1 S.R.L.	Photovoltaic power plant	100.00
NPT HOLDING LIMITED	NLL HOLDING LIMITED	Investment holding	100.00

Note A: On December 21, 2012, ECP VITA LTD. has filed for liquidation through a decision at its stockholders' meeting. The Company ceased using the equity method from that day. ECP VITA LTD. is not included as a consolidated subsidiary as of December 31, 2012.

Note B: On November 15, 2012, GREEN FIELD (SAMOA) LIMITED has filed for dissolution. The Company ceased using the equity method from that day. GREEN FIELD (SAMOA) LIMITED and its subsidiaries are not included as consolidated entities as of December 31, 2012.

Note C: On June 19, 2012, UNITED LIGHTING has filed for liquidation through a decision at its stockholders' meeting. The Company ceased using the equity method from that day. UNITED LIGHTING and its subsidiaries are not included as a consolidated subsidiary as of December 31, 2012.

Note D: On August 22, 2012, NEWENERGY HOLDING LIMITED has filed for liquidation through a decision at its stockholders' meeting. The Company ceased using the equity method from that day. NEWENERGY HOLDING LIMITED and its subsidiaries are not included as a consolidated subsidiary as of December 31, 2012.

Use of Estimates

The preparation of the Company's consolidated financial statements in conformity with generally accepted accounting principles requires management to make reasonable estimates and assumptions that will affect the amount of assets and liabilities, the disclosure of contingent assets and liabilities at the date of the financial statements and the reported amount of revenues and expenses during the reported periods. The actual results may differ from those estimates.

Foreign Currency Transactions

Transactions denominated in foreign currencies are remeasured into the local functional currencies and recorded based on the exchange rates prevailing at the transaction dates. Monetary assets and liabilities denominated in foreign currencies are remeasured into the local functional currencies at the exchange rates prevailing at the balance sheet date, with the related exchange gains or losses included in the consolidated statements of income. Translation gains or losses from investments in foreign entities are recognized as a cumulative translation adjustment in consolidated stockholders' equity.

Non-monetary assets and liabilities denominated in foreign currencies that are reported at fair value with changes in fair value charged to the consolidated statements of income, are remeasured at the exchange rate at the balance sheet date, with related exchange gains or losses recorded in the consolidated statements of income. Non-monetary assets and liabilities denominated in foreign currencies that are reported at fair value with changes in fair value charged to stockholders' equity, are remeasured at the exchange rate at the balance sheet date, with related exchange gains or losses recorded as adjustment items to a cumulative translation adjustment in consolidated stockholders' equity. Non-monetary assets and liabilities denominated in foreign currencies and reported at cost are remeasured at historical exchange rates.

Translation of Foreign Currency Financial Statements

The financial statements of foreign subsidiaries and UMC's Singapore branch (the Branch) are translated into New Taiwan Dollars using the spot rates at the balance sheet date for asset and liability accounts and weighted average exchange rates for profit and loss accounts. The cumulative translation effects from the subsidiaries and the Branch using functional currencies other than New Taiwan Dollars are included in the cumulative translation adjustment in consolidated stockholders' equity.

Convenience Translation into US Dollars

Translations of amount from New Taiwan dollars (NT$) into United States dollars for the reader's convenience were calculated at the rate of US$1.00 to NT$29.05 on December 31, 2012 released by Board of Governors of the Federal Reserve System. No representation is made that the NT$ amounts could have been, or could be, converted into United States dollars at such rate.

Cash Equivalents

Cash equivalents are short-term, highly liquid investments that are readily convertible to known amounts of cash and with maturity dates that do not present significant risks on changes in value resulting from changes in interest rates, including commercial paper with original maturities of three months or less and reverse repurchase agreements.

Financial Assets and Financial Liabilities

In accordance with R.O.C. SFAS No. 34, "Financial Instruments: Recognition and Measurement" (R.O.C. SFAS 34) and the "Guidelines Governing the Preparation of Financial Reports by Securities Issuers", financial assets are classified as either financial assets at fair value through profit or loss, financial assets measured at cost, available-for-sale financial assets or held-to-maturity financial assets. Financial liabilities are recorded at fair value through profit or loss.

The Company accounts for purchase or sale of financial instruments as of the trade date, which is the date the Company commits to purchase or sell the asset or liability. Financial assets and financial liabilities are initially recognized at fair value plus acquisition or issuance costs.

a. Financial assets and financial liabilities at fair value through profit or loss

Financial assets or liabilities at fair value through profit or loss are comprised of financial assets held for trading and financial assets designated as fair value through profit or loss.

Financial instruments held for short-term sale or repurchase purposes and derivative financial instruments not qualified for hedge accounting are classified as financial assets or liabilities at fair value through profit or loss.

If an entity is required to separate an embedded derivative from its host contract, but is unable to measure the embedded derivative separately either at acquisition or at the subsequent balance sheet dates, the entire hybrid contract is designated as either a financial asset or liability at fair value through profit or loss.

This category of financial instruments is measured at fair value and changes in fair value are recognized in the consolidated statements of income. Stock of listed companies, bonds, and closed-end funds are measured at closing prices as of the balance sheet date. Open-end funds are measured at the unit price of the net assets as of the balance sheet date. The fair value of derivative financial instruments is determined by using valuation techniques commonly used by market participants in the industry.

b. Financial assets measured at cost

Unlisted stock, funds, and other securities without reliable market prices are measured at cost. When objective evidence of impairment exists, the Company recognizes an impairment loss, which cannot be reversed in subsequent periods.

c. Available-for-sale financial assets

Available-for-sale financial assets are non-derivative financial instruments not classified as financial assets at fair value through profit or loss, held-to-maturity financial assets, loans and receivables. Subsequent measurement is calculated at fair value. Investments in listed companies are measured at closing prices as of the balance sheet date. Any gain or loss arising from the change in fair value, excluding impairment loss and exchange gain or loss arising from monetary financial assets denominated in foreign currencies, is recognized as an adjustment to consolidated stockholders' equity until such investment is reclassified or disposed of, upon which the cumulative gain or loss previously charged to consolidated stockholders' equity will be recorded in the consolidated statements of income.

The Company recognizes an impairment loss when objective evidence of impairment exists. Any reduction in the impairment loss of equity investments in subsequent periods will be recognized as an adjustment to consolidated stockholders' equity. The impairment loss of a debt security may be reversed and recognized in the consolidated statement of income if the security recovers and the Company concludes the recovery is related to improvements in the factors or events that originally caused the impairment.

d. Held-to-maturity financial assets

Non-derivative financial assets with fixed or determinable payments and fixed maturity are classified as held-to-maturity financial assets if the Company has both the positive intention and ability to hold the financial assets to maturity. Investments intended to be held to maturity are measured at amortized cost.

The Company recognizes an impairment loss if objective evidence of impairment loss exists. However, the impairment loss may be reversed if the value of asset recovers subsequently and the Company concludes the recovery is related to improvements in events or factors that originally caused the impairment loss. The new cost basis as a result of the reversal cannot exceed the amortized cost prior to the impairment.

Notes, Accounts and Other Receivables

Notes and accounts receivable are amounts owed to a business by a customer as a result of a purchase of goods or services from it on a credit basis. Other receivables are any receivable not classified in notes and accounts receivable category. When the notes, accounts and other receivables are initially recognized, the Company measures them at their fair values. After initial recognition, the notes, accounts and other receivables are measured at amortized cost deducting the impairment using the effective interest method. Short-term notes, accounts and other receivables with no stated interest rate are measured at the original invoice amount if the effect of discounting is immaterial.

The Company first assesses as of balance sheet date whether objective evidence of impairment exists for notes, accounts and other receivables that are individually significant. If there is objective evidence that an impairment loss has occurred, the amount of impairment loss is assessed individually. For notes, accounts and other receivables other than those mentioned above, the Company groups those assets with similar credit risk characteristics and collectively assess them for impairment. If, in a subsequent period, the amount of the impairment loss decreases, and the decrease can be related objectively to an event occurring after the impairment was recognized, the previously recognized impairment loss is reversed and recognized through profit or loss. The reversal shall not result in a carrying amount of notes, accounts and other receivables that exceeds what the amortized cost would have been had the impairment not been recognized at the date the impairment is reversed.

Inventories

Inventories are accounted for on a perpetual basis. Raw materials are recorded at actual purchase costs, while the work in process and finished goods are recorded at standard costs and subsequently adjusted to costs using the weighted-average method at the end of each month. Allocation of fixed production overheads to the costs of conversion is based on the normal capacity of the production facilities. Inventories are valued at the lower of cost and net realizable value item by item. Net realizable value is the estimated selling price in the ordinary course of business less the estimated costs of completion and the estimated costs necessary to make the sale.

Non-current Assets Held for Sale

Non-current assets that are available for immediate sale in their present condition subject only to terms that are usual and customary for sales of such assets and that are highly probable to be sold within one year are classified as non-current assets held for sale. A held for sale non-current asset is measured at the lower of its carrying amount or fair value less costs to sell and is recorded separately on the balance sheet. No further amortization or depreciation will be recorded once an asset is classified as held for sale.

Impairment losses of non-current assets held for sale are recognized for the excess of the carrying amounts over fair values less costs to sell and reported as losses in the current period. A gain is recognized for any subsequent increase in fair value less costs to sell of an asset, but not in excess of the total amount of the accumulated impairment loss and the amount allowed to be reversed in accordance with the R.O.C. SFAS No. 35, "Impairment of Assets" (R.O.C. SFAS 35).

Long-term Investments Accounted for Under the Equity Method (including interests in Joint Ventures)

Investments in which the Company has ownership of at least 20% or exercises significant influence on operating decisions are accounted for under the equity method. The difference of the acquisition cost and the underlying equity in the investee's net assets as of acquisition date is amortized and goodwill arising from new acquisitions is analyzed and accounted for under the R.O.C. SFAS 25, in which goodwill is not subject to amortization.

Investment in jointly controlled entity is accounted for under the equity method.

When an equity investee offsets its accumulated deficit with its additional paid-in capital, the Company would debit additional paid-in capital and credit retained earnings in proportionate to its existing equity ownership to the extent that credit is available on the additional paid-in capital.

The change in the Company's proportionate share in the net assets of an investee resulting from its acquisition of additional stock issued by the investee at a rate not proportionate to its existing equity ownership is charged to the additional paid-in capital and long-term investments accounts.

If the balance of the additional paid-in capital is less than the amount needed, the excess would be charged to the retained earnings.

Unrealized intercompany gains and losses arising from sales from the Company to equity method investees are eliminated in proportion to the Company's ownership percentage at the end of the period until realized through transactions with third parties. Intercompany gains and losses arising from transactions between the Company and majority-owned (above 50%) subsidiaries are eliminated entirely until realized through transactions with third parties.

Unrealized intercompany gains and losses due to sales from equity method investees to the Company are eliminated in proportion to the Company's weighted-average ownership percentage of the investee until realized through transactions with third parties.

Unrealized intercompany gains and losses arising from transactions between two equity method investees are eliminated in proportion to the Company's multiplied weighted-average ownership percentage with the investees until realized through transactions with third parties. Those intercompany gains and losses arising from transactions between two majority-owned subsidiaries are eliminated in proportion to the Company's weighted-average ownership percentage in the subsidiary that incurred the gain or loss.

If the recoverable amount of investees accounted for under the equity method is less than its carrying amount, the difference is recognized as impairment loss in the current period.

The total value of an investment and advances after recognition of the investment losses cannot be negative. If the Company has the positive intention to continue to support the investees, or the losses of investees are only temporary, the Company will continue to recognize investment losses with its proportionate share. If, after the investment loss is recognized, the net book value of the investment is less than zero, the investment is reclassified to liabilities on the consolidated balance sheet.

The Company ceases to use the equity method upon a loss of ability to exercise significant influence over an investee. In accordance with R.O.C. SFAS 34, the carrying value of the investment upon the loss of significant influence remains as the carrying value of the investment. Any amount of the investee's additional paid-in capital and other adjustment items recorded in the consolidated stockholders' equity of the Company are eliminated in proportion to the amount of the investment sold and recorded as a gain or loss on disposal of investments. Cash dividends received during the year of change are applied as a reduction of the carrying amount of the investment. Dividends received in subsequent years are recorded in accordance with R.O.C. SFAS No. 32, "Accounting for Revenue Recognition."

Gain or loss on disposal of long-term investments is based on the difference between selling price and book value of investments sold. Any amount of the investee's additional paid-in capital and other adjustment items recorded in the consolidated stockholders' equity of the Company are eliminated in proportion to the amount of the investment sold and recorded as gain or loss on disposal of investments.

Property, Plant and Equipment

Property, plant and equipment are stated at cost. Interest incurred on loans used to finance the construction of property, plant and equipment is capitalized and depreciated accordingly. Maintenance and repairs are charged to expense as incurred. Significant renewals and improvements are treated as capital expenditures and are depreciated over their estimated useful lives. Upon disposal of property, plant and equipment, the original cost and accumulated depreciation are written off and the related gain or loss is classified as non-operating income or expense. Idle assets are classified as other assets at the lower of net book or net realizable value, with the difference charged to non-operating expenses.

Depreciation is recognized on a straight-line basis using the estimated economic life of the assets:

Buildings	3~55 years
Machinery and equipment	2~11 years
Transportation equipment	4~7 years
Furniture and fixtures	2~20 years
Leased assets and leasehold improvements	The lease period or estimated economic life, whichever is shorter

Intangible Assets

a. Trademarks are stated at cost and amortized over 10 years on a straight-line basis.

b. Goodwill generated from business combinations is not subject to amortization. After initial recognition, goodwill shall be carried at cost less any accumulated impairment losses. Whenever impairment indicators exist or at least annually, the Company completes the goodwill impairment test to determine whether goodwill is impaired. Goodwill impairment shall not be reversed once recognized.

c. Other intangible assets are mainly the technology license fee and land-use right which are stated at cost. The Company completes the impairment test for technology license fee at least annually before expected benefits are consumed by the Company. When expected benefits of technology license fee can be consumed by the Company, the technology license fee is amortized over estimated economic life on a straight-line basis and land-use right is amortized over 25 years on a straight-line basis.

Deferred Charges

Deferred charges are stated at cost and amortized on a straight-line basis as follows:

Intellectual property license fees	The shorter of contract term or estimated economic life of the related technology
Software	1~6 years

Bonds

Transaction costs related to the issuance of the bonds were allocated to liability and equity components of bonds in proportion to the allocation of the proceeds. For subsequent measurement of the liability components, the host contract is accounted for at amortized cost using the effective interest method. If the difference between the straight-line method and the effective interest method is immaterial, the bond discount may be amortized using the straight-line method and recorded as interest expense. Any embedded derivative instruments that are considered liability components and not clearly and closely related to the host debt instrument are measured at fair value and changes in fair value are recognized as a gain or loss on the valuation of the financial liability. The equity component is measured as the residual amount after deducting the fair value of the liability component at date of issuance from the proceeds received and is not subsequently remeasured.

In accordance with R.O.C. SFAS 34, since the economic and risk characteristics of the embedded derivative instrument and the host contract are not clearly and closely related, derivative financial instruments embedded in exchangeable bonds are bifurcated and accounted as financial liabilities at fair value through profit or loss.

When exchangeable bondholders exercise their right to exchange their bonds for reference shares, the book value of the bonds is offset against the book value of the investments in reference shares and the related stockholders' equity accounts, with the difference recognized as a gain or loss on disposal of investments.

In accordance with R.O.C. SFAS 34, since the economic and risk characteristics of the embedded call or put option are clearly and closely related to the host contract, the derivative financial instruments embedded in convertible bonds were not recognized separately.

If the convertible bondholders exercise their conversion right before maturity, the Company shall adjust the carrying amount of the liability component. The adjusted carrying amount of the liability component at conversion and the carrying amount of equity component are credited to common stock and additional paid-in capital - premiums. No gain or loss is recognized upon bond conversion.

Both the host contract and bifurcated embedded derivative financial instrument in exchangeable bonds are classified as current liabilities if the bondholders have the right to demand settlement of the bonds within 12 months of the bonds become exchangeable. In addition, the liability component of convertible bonds is classified as a current liability within 12 months of the date the bondholders may exercise the put right. After the put right expires, the liability component of the convertible bonds should be reclassified as a long-term liability if it meets the definition of a long-term liability in all other respects.

Pension Plan

All regular employees are entitled to a defined benefit pension plan that is managed by an independently administered pension fund committee. Fund assets are deposited under the committee's name in the Bank of Taiwan and hence, not associated with the Company. Therefore, fund assets are not to be included in the Company's financial statements. Pension benefits for employees of the Branch and overseas subsidiaries are provided in accordance with the local regulations.

The Labor Pension Act of the R.O.C. (the Act), which adopts a defined contribution plan, became effective on July 1, 2005. Employees eligible for the Labor Standards Law, a defined benefit plan, were allowed to elect either the pension calculation under the Act or continue to be subject to the pension calculation under the Labor Standards Law. Those employees that elected to be subject to the Act will have their seniority achieved under the Labor Standards Law retained upon election of the Act, and the Company will make monthly contributions of no less than 6% of these employees' monthly wages to the employees' individual pension accounts.

The accounting for UMC's pension liability is computed in accordance with R.O.C. SFAS No. 18, "Accounting for Pension." Net pension costs of the defined benefit plan are recorded based on an independent actuarial valuation. Pension cost components such as service cost, interest cost, expected return on plan assets, the amortization of net obligation at transition, pension gain or loss, and prior service cost, are all taken into consideration. UMC recognizes expenses from the defined contribution pension plan in the period in which the contribution becomes due.

Share-Based Payment

The Company used the intrinsic value method to recognize compensation cost for its employee stock options issued between January 1, 2004 and December 31, 2007, in accordance with Accounting Research and Development Foundation (ARDF) Interpretation Nos. 92-070~072. For options granted on or after January 1, 2008, the Company recognizes compensation cost using the fair value method in accordance with R.O.C. SFAS No. 39 "Accounting for Share-Based Payment." (R.O.C. SFAS 39)

Employee Bonus and Remunerations Paid to Directors and Supervisors

Employee bonus and remunerations paid to directors and supervisors are charged to expense at fair value and are no longer accounted for as an appropriation of retained earnings.

Treasury Stock

In accordance with R.O.C. SFAS No. 30, "Accounting for Treasury Stock", treasury stock held by the Company is accounted for under the cost method. The cost of treasury stock is shown as a deduction to consolidated stockholders' equity, while any gain or loss from selling treasury stock is treated as an adjustment to additional paid-in capital. The Company's stock held by its subsidiaries is also treated as treasury stock. Cash dividends received by subsidiaries from UMC are recorded as additional paid-in capital-treasury stock transactions.

For treasury stock sold to employees, the Company recognizes compensation cost in accordance with R.O.C. SFAS 39 and ARDF Interpretation No. 96-266 “Accounting for Treasury Stock Purchased by Employees” and ARDF Interpretation No. 98-111 “Determining the Grant Date of Share-Based Payment.”

Revenue Recognition

The Company recognizes revenue when persuasive evidence of an arrangement exists, the product or service has been delivered, the seller’s price to the buyer is fixed or determinable and collectability is reasonably assured. Most of the Company’s sales transactions have shipping terms of Free Carrier (FCA), by which title and the risk of loss or damage for the shipment are transferred to the customer upon delivery of the product to a carrier approved by the customer.

Allowance for sales returns and discounts are estimated based on history of customer complaints, historical experiences, management judgment and any other known factors that might significantly affect collectability. Such allowances are recorded in the same period in which sales are made. Shipping and handling costs are included in sales expenses.

Research and Development Expenditures

Research and development expenditures are charged to expenses as incurred.

Capital Expenditure versus Operating Expenditure

Expenditures are capitalized when it is probable that the Company will receive future economic benefits associated with the expenditures.

Income Tax

The Company adopted R.O.C. SFAS No. 22, “Accounting for Income Taxes” for inter-period and intra-period income tax allocation. The provision for income taxes includes deferred income tax assets and liabilities that are a result of temporary differences between carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes, loss carry-forward and investment tax credits. A valuation allowance on deferred income tax assets is provided to the extent that it is more likely than not that the tax benefits will not be realized. A deferred tax asset or liability is classified as current or noncurrent in accordance with the classification of its related asset or liability. However, if a deferred tax asset or liability does not relate to an asset or liability in the financial statements, its classification is based on the expected reversal date of the temporary difference.

According to R.O.C. SFAS No. 12, “Accounting for Income Tax Credits”, the Company recognizes the tax benefit from the purchase of equipment and technology, research and development expenditures, employee training, and certain equity investment by the flow-through method.

Income tax (10%) on unappropriated earnings is recorded as expense in the year when the stockholders have resolved that the earnings shall be retained.

The Income Basic Tax Act of the R.O.C. (the IBTA) became effective on January 1, 2006. Set up by the Executive Yuan, the IBTA is a supplemental 10% tax that is payable if the income tax payable determined by the R.O.C. Income Tax Act is below the minimum amount as prescribed by the IBTA. The IBTA is calculated based on taxable income as defined by the IBTA, which includes most income that is exempted from income tax under various legislations. The impact of the IBTA has been considered in the Company's income tax for the current reporting period.

Earnings per Share

Earnings per share is computed according to R.O.C. SFAS No. 24, "Earnings Per Share". Basic earnings per share is computed by dividing net income by the weighted-average number of common shares outstanding during the current reporting period. Diluted earnings per share is computed by taking basic earnings per share into consideration plus additional common shares that would have been outstanding if the dilutive share equivalents had been issued. Net income is also adjusted for interest and other income or expenses derived from any underlying dilutive share equivalents.

Asset Impairment

Pursuant to R.O.C. SFAS 35, the Company assesses indicators of impairment for all its assets within the scope of the standard at each balance sheet date. If impairment is indicated, the Company compares the asset's carrying amount with the recoverable amount of the assets or the cash-generating unit (CGU) associated with the asset and writes down the carrying amount to the recoverable amount where applicable. The recoverable amount is defined as the higher of fair value less the costs to sell, and the values in use. For previously recognized losses, the Company assesses at the balance sheet date if any indication that the impairment loss no longer exists or may have diminished. If there is any such indication, the Company recalculates the recoverable amount of the asset, and if the recoverable amount has increased as a result of the increase in the estimated service potential of the assets, the Company reverses the impairment loss so that the resulting carrying amount of the asset does not exceed the amount (net of amortization or depreciation) that would otherwise result had no impairment loss been recognized for the assets in prior years.

In addition, a goodwill-allocated CGU or group of CGUs is tested for impairment each year, regardless of whether impairment is indicated. If an impairment test reveals that the carrying amount, including goodwill, of CGU or group of CGUs is greater than its recoverable amount, it results in an impairment loss. The loss is first recorded against the CGU's goodwill, with any remaining loss allocated to other assets on a pro rata basis proportionate to their carrying amounts. The write-down of goodwill cannot be reversed in subsequent periods under any circumstances.

Impairment losses and reversals are classified as non-operating expenses and income, respectively.

Operating Segment Information

An operating segment is a component of an entity that has the following characteristics:

a. Engaging in business activities from which it may earn revenues and incur expenses;

b. Whose operating results are regularly reviewed by the entity's chief operating decision maker to make decisions about resources to be allocated to the segment and assess its performance; and

c. For which discrete financial information is available.

3. ACCOUNTING CHANGES

Notes, Accounts and Other Receivables

Effective January 1, 2011, the Company adopted the third revised R.O.C. SFAS 34. This change in accounting principles had no significant effect on consolidated net income or consolidated earnings per share for the year ended December 31, 2011.

Operating Segment Information

Effective January 1, 2011, the Company adopted R.O.C. SFAS No. 41, "Operating Segments" (R.O.C. SFAS 41), to present operating segment information. The newly issued R.O.C. SFAS 41 replaced R.O.C. SFAS No. 20, "Segment Reporting", the comparative operating segment information has been presented accordingly. This change in accounting principles had no effect on consolidated net income or consolidated earnings per share for the year ended December 31, 2011.

4. CASH AND CASH EQUIVALENTS

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Cash		
Cash on hand	4,470	3,971
Checking and savings accounts	13,795,814	10,656,261
Time deposits	31,737,840	27,347,736
Subtotal	45,538,124	38,007,968
Cash equivalents	3,532,004	4,584,757
Total	49,070,128	42,592,725

5. FINANCIAL ASSETS AT FAIR VALUE THROUGH PROFIT OR LOSS

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Current		
Listed stocks	202,081	256,685
Corporate bonds	493,850	399,309
Subtotal	695,931	655,994
Noncurrent		
Preferred stocks	26,295	29,026
Convertible bonds	93,416	43,680
Subtotal	119,711	72,706
Total	815,642	728,700

During the years ended December 31, 2010, 2011 and 2012, net gains (losses) arising from the changes in fair value of financial assets at fair value through profit or loss were NT$(222) million, NT$(324) million and NT$45 million, respectively.

6. ACCOUNTS RECEIVABLE, NET

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Accounts receivable	15,235,258	17,426,163
Less: Allowance for sales returns and discounts	(165,000)	(592,043)
Less: Allowance for doubtful accounts	(679,717)	(613,288)
Net	14,390,541	16,220,832

7. INVENTORIES, NET

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Raw materials	2,389,760	1,847,533
Supplies and spare parts	2,281,665	2,142,737
Work in process	7,784,470	9,369,975
Finished goods	3,209,746	2,567,077
Total	15,665,641	15,927,322
Less: Allowance for loss on decline in market value and obsolescence	(2,956,365)	(2,903,612)
Net	12,709,276	13,023,710

a. The Company recognized losses of NT$1,390 million and NT$7 million as a result of the net realizable value of inventory being lower than its cost, and the loss was included in the cost of goods sold for the years ended December 31, 2011 and 2012, respectively. However, as the circumstances that caused the net realizable value of inventory to be lower than its cost reversed, the Company recognized a reversal gain of NT$90 million for the year ended December 31, 2010.

b. Inventories were not pledged.

8. AVAILABLE-FOR-SALE FINANCIAL ASSETS

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Current		
Common stocks	5,124,780	4,330,880
Noncurrent		
Common stocks	18,767,614	14,703,506
Depositary receipts	37,400	299,908
Funds	30,210	113,326
Subtotal	18,835,224	15,116,740
Total	23,960,004	19,447,620

During the years ended December 31, 2010, 2011 and 2012, the net unrealized gains (losses) adjustments to consolidated stockholders' equity due to changes in fair value of available-for-sale assets were NT$(1,003) million, NT$(10,478) million and NT$1,172 million, respectively. Additionally, the Company recognized gains of NT$1,960 million, NT$1,492 million and NT$4,784 million due to the disposal of available-for-sale assets during the years ended December 31, 2010, 2011 and 2012, respectively.

UMC issued bonds that are exchangeable at any time on or after January 1, 2010 and prior to November 22, 2014, into common stocks originally classified as available-for-sale financial assets, noncurrent. Therefore, UMC reclassified the exchangeable shares to current assets.

9. FINANCIAL ASSETS MEASURED AT COST, NONCURRENT

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Common stocks	5,949,533	5,378,876
Preferred stocks	1,898,072	2,160,748
Funds	451,362	423,618
Total	8,298,967	7,963,242

The Company acquired 4.6 million shares of FIRST INTERNATIONAL TELECOM CORP. (FIRST INTERNATIONAL TELECOM) through private placement in March 2008 and 4 million shares of E-ONE MOLI ENERGY CORP. (E-ONE) through private placement in June 2009. The exchange of these securities listed above is restricted by Article 43 paragraph 8 of the Securities and Exchange Law. The above-mentioned restriction of FIRST INTERNATIONAL TELECOM and E-ONE were removed on April 25, 2011 and August 31, 2012, respectively.

10. LONG-TERM INVESTMENTS ACCOUNTED FOR UNDER THE EQUITY METHOD

a. Details of long-term investments accounted for under the equity method are as follows:

	As of December 31,			
	2011		2012	
Investee Companies	Amount	Percentage of Ownership or Voting Rights	Amount	Percentage of Ownership or Voting Rights
	NT$'000	%	NT$'000	%
Listed companies				
CRYSTALWISE TECHNOLOGY INC. (CRYSTALWISE) (Note A)	87,501	4.25	78,639	4.21
Unlisted companies				
NEWENERGY HOLDING LIMITED (NEWENERGY) (Note B)	—	—	185,143	100.00
ECP VITA LTD. (Note C)	—	—	—	100.00
ASEPOWER 1 S.R.L. (Note D)	—	—	—	75.00
MOS ART PACK CORP. (MAP) (Note E)	238,373	72.98	238,373	72.98
UNITED LIGHTING OPTO-ELECTRONIC INC. (UNITED LIGHTING) (Note F)	—	—	12,493	55.25
SHANDONG HUAHONG ENERGY INVEST CO., INC. (SHANDONG HUAHONG) (Note D)	725,381	50.00	688,008	50.00
WINAICO SOLAR PROJEKT 1 GMBH (Note D)	45,573	50.00	45,647	50.00
ACHIEVE MADE INTERNATIONAL LTD.	42,909	44.06	55,730	49.38
LIST EARN ENTERPRISE INC.	9,688	49.00	9,616	49.00
ALLIANCE OPTOTEK CORP.	77,545	47.99	16,547	47.99
MTIC HOLDINGS PTE. LTD.	214,918	46.49	189,012	45.44
YUNG LI INVESTMENTS, INC.	213,558	45.16	206,507	45.16
MEGA MISSION LIMITED PARTNERSHIP	1,298,748	45.00	1,458,458	45.00

	As of December 31,			
	2011		2012	
Investee Companies	Amount	Percentage of Ownership or Voting Rights	Amount	Percentage of Ownership or Voting Rights
	NT$'000	%	NT$'000	%
UNITED LED CORPORATION HONG KONG LIMITED	593,479	45.00	404,409	45.00
UNITECH CAPITAL INC.	700,433	42.00	667,781	42.00
LTI REENERGY CO., LTD. (LTI) (Note D)	2,918	40.00	4,264	40.00
HSUN CHIEH INVESTMENT CO., LTD.	2,749,884	36.49	2,673,856	36.49
UC FUND II	36,584	35.45	52,304	35.45
BEST ELITE INTERNATIONAL LIMITED (Note G, H)	3,141,108	34.90	3,776,610	35.03
EXOJET TECHNOLOGY CORP.	104,138	33.40	95,911	33.10
CTC CAPITAL PARTNERS I, L. P.	127,784	31.40	124,492	31.40
UNIMICRON HOLDING LIMITED	626,242	21.93	651,845	21.93
DAIWA QUANTUM CAPITAL PARTNERS I, L. P. (Note I)	59,984	12.50	57,721	12.50
TRANSLINK CAPITAL PARTNERS I, L. P. (Note I)	120,097	10.38	98,641	10.38
SHENYANG PIONEER U-LIGHTING OPTO-ELECTRONIC CO., LTD. (SHENYANG U-LIGHTING)	4,080	49.00	—	—
SOLAR GATE TECHNOLOGY CO., LTD.	39,417	32.73	—	—
HIGH POWER LIGHTING CORP.	15,552	20.24	—	—
Subtotal	11,188,393		11,713,368	
Total	11,275,894		11,792,007	

Note A: The Company acquired 2.7 million shares of CRYSTALWISE through private placement in August 2010. The exchange of these securities listed above is restricted by Article 43 paragraph 8 of the Securities and Exchange Law. The above-mentioned restriction of CRYSTALWISE will be removed on September 23, 2013. The Company determined it should apply the equity method to CRYSTALWISE because it was considered to have the significant influence according to Statements of Financial Accounting Standards through common Chairman of the Board.

Note B: On August 22, 2012, NEWENERGY has filed for liquidation through a decision at its stockholders' meeting. The liquidation has not been completed as of December 31, 2012.

Note C: On December 21, 2012, ECP VITA LTD. has filed for liquidation through a decision at its stockholders' meeting. The liquidation has not been completed as of December 31, 2012.

Note D: The Company uses the equity method to account for its investment in ASEPOWER 1 S.R.L., SHANDONG HUAHONG, WINAICO SOLAR PROJEKT 1 GMBH and LTI, which are jointly controlled entities.

Note E: On March 10, 2011, MAP has filed for liquidation through a decision at its stockholders' meeting. The liquidation has not been completed as of December 31, 2012.

Note F: On June 19, 2012, UNITED LIGHTING has filed for liquidation through a decision at its stockholders' meeting. The liquidation has not been completed as of December 31, 2012.

Note G: Not until March 2005 did the Company receive an offer of approximately 106 million ordinary shares from Best Elite International Limited (Best Elite), the holding company of HeJian Technology Corp. (HeJian). The offered shares represented approximately 50% of Best Elite's outstanding ordinary shares and approximately 15% of the total outstanding shares of Best Elite. The Company filed an inquiry with the Investment Commission of the Ministry of Economic Affairs on March 18, 2005 (Ref. No. 94-Lian-Tung-Tzu-0222), for their executive guidance with respect to the offer. Subsequent to Best Elite Board approval, the offered ordinary shares were placed in a trust while the Company awaited the Investment Commission's guidance. While in trust, the Company could not receive ownership (nor any potential stock dividend or cash dividend distributed) and is not the beneficiary thereof unless the Company received approval from the Investment Commission. In the event that any stock dividend or cash dividend was distributed, the Company's potential stake in Best Elite would have accumulated accordingly.

No response from the Investment Commission of the Ministry of Economic Affairs was received on the Company's inquiry for many years. In June 2011, the Company filed an application for the acquisition of the aforementioned donated Best Elite shares as well as for an additional purchase of Series B and B-1 preferred shares (Note H). Thereafter, on November 1, 2011, the Company received the approval letter from the Investment Commission of the Ministry of Economic Affairs (Ref. No. Jing-Shen-Er-Zi-10000274530). With such an approval, the Company was able to formally accept the ordinary shares, which have been held in trust since 2006. Based on the approval letter from the Investment Commission of the Ministry of Economic Affairs, which designated the ordinary shares offered by Best Elite as a donation, the Company recognized the said shares at their fair value of USD 23 million on the day of transfer, December 12, 2011, as a long term investment accounted for under the equity method with a corresponding gain recorded in other income.

Note H: On March 16, 2011, in order to achieve its global market objectives, the Company's Board of Directors approved an offer to the stockholders of Best Elite to purchase up to 30% of the preferred shares of Best Elite. In June 2011, the Company filed an application on the 15.34% donated shares (in trust as described above) as well as 20.41% of the preferred shares of Best Elite based on the said shareholders' offering.

Such purchase of 20.41% of the preferred shares of Best Elite was approved on November 1, 2011 in the same letter from the Investment Commission of the Ministry of Economic Affairs (Ref. No. Jing-Shen-Er-Zi-10000274530) granting approval for the Company's ownership of Best Elite ordinary shares placed in trust. Pursuant to such approval, the Company acquired by way of purchase at fair value Series B and B-1 preferred shares representing 19.56% of Best Elite's total outstanding shares on December 12, 2011 and the Company thereby increased its cumulative ownership in Best Elite to 34.90%. The Company accounts for its investment as a long term investment under the equity method in accordance with R.O.C. SFAS No.5, "Long-term investments under equity method."

Note I: The Company follows international accounting practices in equity accounting for limited partnerships because no equivalent type of business exists in R.O.C., and therefore, the Company uses the equity method to account for these investees.

b. The change of investees' equity was charged to the Company's equity. For the years ended December 31, 2011 and 2012, the changes charged to additional paid-in capital were decreases of NT$0.1 million and nil, respectively, and the changes charged to retained earnings were decreases of NT$273 million and NT$97 million, respectively.

c. Total gains (losses) arising from investments accounted for under the equity method were NT$115 million, NT$(312) million and NT$719 million for the years ended December 31, 2010, 2011 and 2012, respectively. Investment income amounted to NT$310 million, NT$376 million and NT$57 million for the years ended December 31, 2010, 2011 and 2012, respectively, and the related long-term investment balances of NT$4,396 million and NT$4,278 million as of December 31, 2011 and 2012, respectively, were determined based on the investees' financial statements audited by the other independent auditors.

d. The long-term equity investments were not pledged.

11. PROPERTY, PLANT AND EQUIPMENT

	As of December 31, 2011			
	Cost	Accumulated Depreciation	Accumulated Impairment	Book Value
	NT$'000	NT$'000	NT$'000	NT$'000
Land	2,065,194	—	(291,757)	1,773,437
Buildings	26,631,417	(11,617,004)	(1,061,634)	13,952,779
Machinery and equipment	559,032,330	(448,545,567)	(1,748,713)	108,738,050
Transportation equipment	64,918	(51,854)	—	13,064
Furniture and fixtures	4,378,308	(3,207,917)	(13,887)	1,156,504
Leasehold improvement	836,313	(200,498)	—	635,815
Construction in progress and prepayments	23,054,651	—	—	23,054,651
Total	616,063,131	(463,622,840)	(3,115,991)	149,324,300

	As of December 31, 2012			
	Cost	Accumulated Depreciation	Accumulated Impairment	Book Value
	NT$'000	NT$'000	NT$'000	NT$'000
Land	2,112,483	—	(251,140)	1,861,343
Buildings	25,957,299	(12,304,809)	(1,639,288)	12,013,202
Machinery and equipment	595,789,472	(469,573,758)	(2,707,998)	123,507,716
Transportation equipment	67,148	(50,426)	(38)	16,684
Furniture and fixtures	4,882,971	(3,527,649)	(22,846)	1,332,476
Leasehold improvement	1,753,124	(474,535)	—	1,278,589
Construction in progress and prepayments	18,844,025	—	—	18,844,025
Total	649,406,522	(485,931,177)	(4,621,310)	158,854,035

a. Total interest expense before capitalization amounted to NT$352 million, NT$554 million and NT$755 million for the years ended December 31, 2010, 2011 and 2012, respectively.

Detailsof capitalized interest are as follows:

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Land	383	—	143
Buildings	48,454	78	7,516
Machinery and equipment	284,605	245,844	288,987
Furniture and fixtures	1,557	1,661	13
Others	29	100	35
Total interest capitalized	335,028	247,683	296,694
Interest rates applied	1.04%~3.51%	1.02%~2.80%	0.17%~2.29%

b. Please refer to Note 28 for property, plant and equipment pledged as collateral.

12. OTHER INTANGIBLE ASSETS

	For the year ended December 31, 2011			
	Beginning Balance	Increase	Decrease	Ending Balance
Cost	NT$'000	NT$'000	NT$'000	NT$'000
Land-use right and others	—	301,691	—	301,691
Accumulated amortization				
Land-use right and others	—	(2,011)	—	(2,011)
Total	—	299,680	—	299,680

	For the year ended December 31, 2012			
	Beginning Balance	Increase	Decrease	Ending Balance
Cost	NT$'000	NT$'000	NT$'000	NT$'000
Technology license fee	—	1,344,681	—	1,344,681
Land-use right and others	301,691	38,793	(311,067)	29,417
Subtotal	301,691	1,383,474	(311,067)	1,374,098
Accumulated amortization				
Technology license fee	—	(67,234)	—	(67,234)
Land-use right and others	(2,011)	(4,499)	5,703	(807)
Subtotal	(2,011)	(71,733)	5,703	(68,041)
Total	299,680	1,311,741	(305,364)	1,306,057

The estimated aggregate amortization expense was NT$136 million for each of the five succeeding fiscal years.

13. OTHER ASSETS-OTHERS

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Leased assets	1,011,383	997,579
Deposits-out	1,349,528	1,383,327
Long-term prepayment	532,200	20,460
Others	124,663	96,840
Total	3,017,774	2,498,206

Please refer to Note 28 for Deposits-out pledged as collateral.

14. IMPAIRMENT LOSS

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Available-for-sale financial assets, noncurrent	—	34,560	228,200
Long-term investments accounted for under the equity method	20,802	105,115	223,695
Financial assets measured at cost, noncurrent	93,077	570,725	578,612
Property, plant and equipment	—	1,238,877	2,258,630
Goodwill	—	286,007	—
Others assets-others	—	11,206	80,557
Total	113,879	2,246,490	3,369,694

After considering objective evidence and the result of the impairment loss testing, the Company recognized impairment losses amounted to NT$114 million, NT$710 million and NT$1,031 million for its available-for-sale financial assets, noncurrent, long-term investments accounted for under the equity method, and financial assets measured at cost, noncurrent, respectively, for the years ended December 31, 2010, 2011 and 2012. The Company determined that goodwill and certain fixed assets would not generate expected future cash flows due to some subsidiaries' net operating profit being lower than expected. The Company determined the recoverable amounts of these assets based on the fair values less costs to sell. The impairment test revealed that the total carrying amount of these assets was greater than their total recoverable amount. After considering the relevant objective evidence, the Company recorded an impairment loss of nil, NT$1,536 million and NT$2,339 million for the years ended December 31, 2010, 2011 and 2012, respectively.

15. SHORT-TERM LOANS

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Unsecured bank loans	9,411,877	5,772,615

	For the years ended December 31,	
	2011	2012
Interest rates	0.54%~2.82%	0.55%~2.98%

The Company's unused short-term lines of credits amounted to NT$19,609 million and NT$8,293 million as of December 31, 2011 and 2012, respectively.

16. FINANCIAL LIABILITIES AT FAIR VALUE THROUGH PROFIT OR LOSS, CURRENT

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Derivatives embedded in exchangeable bonds	741,531	767,605

During the years ended December 31, 2010, 2011 and 2012, net gains (losses) arising from financial liabilities at fair value through profit or loss were NT$(546) million, NT$1,293 million and NT$643 million, respectively.

17. BONDS PAYABLE

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Unsecured exchangeable bonds payable	6,125,110	4,651,323
Unsecured convertible bonds payable	12,420,903	12,278,461
Unsecured domestic bonds payable	—	10,000,000
Less: Discounts on bonds payable	(1,141,225)	(705,431)
Total	17,404,788	26,224,353
Less: Current or exchangeable portion	(5,420,384)	(4,292,160)
Net	11,984,404	21,932,193

a. On December 2, 2009, UMC issued SGX-ST listed zero coupon exchangeable bonds. The terms and conditions of the bonds are as follows:

(a) Issue Amount: US$127.2 million

(b) Period: December 2, 2009 ~ December 2, 2014 (Maturity date)

(c) Redemption:

i. UMC may redeem the bonds, in whole or in part, after 12 months of the issuance and prior to the maturity date, at the principal amount of the bonds with an interest calculated at the rate of -0.5% per annum (the Early Redemption Price) if the closing price of the common shares of Unimicron Technology Corporation (Unimicron) on the TSE, translated into US dollars at the prevailing exchange rate, for a period of 20 consecutive trading days, the last of which occurs not more than 10 days prior to the date upon which notice of such redemption is published, is at least 130% of the exchange price then in effect translated into US dollars at the rate of NTD 32.197=USD 1.00.

ii. UMC may redeem the bonds, in whole, but not in part, at the Early Redemption Price if at least 90% in principal amount of the bonds has already been exchanged, redeemed or purchased and cancelled.

iii. UMC may redeem all, but not part, of the bonds, at the Early Redemption Price at any time, in the event of certain changes in the R.O.C.'s tax rules which would require UMC to gross up for payments of principal, or to gross up for payments of interest or premium.

iv. All, or any portion, of the bonds will be redeemable in US dollars at the option of bondholders on December 2, 2011 at 99% of the principal amount.

v. Bondholders have the right to require UMC to redeem all or any portion of the bonds at the Early Redemption Price if the common shares of the exchanged securities are officially delisted on the TSE for a period of five consecutive trading days.

vi. In the event that a change of control as defined in the indenture of the bonds occurs to UMC or Unimicron, the bondholders shall have the right to require UMC to redeem the bonds, in whole or in part, at the Early Redemption Price.

(d) Terms of Exchange

i. Underlying Securities: Common shares of Unimicron

ii. Exchange Period: The bonds are exchangeable at any time on or after January 1, 2010 and prior to November 22, 2014, into Unimicron common shares; provided, however, that if the exercise date falls within 5 business days from the beginning of, and during, any closed period, the right of the exchanging holder of the bonds to vote with respect to the shares it receives will be subject to certain restrictions.

iii. Exchange Price and Adjustment: The exchange price was originally NTD51.1875 per share, determined on the basis of a fixed exchange rate of NTD 32.197=USD 1.00. The exchange price will be subject to adjustments upon the occurrence of certain events set out in the indenture. The exchange price is NTD45.0059 per share on December 31, 2012.

(e) Redemption on the Maturity Date: On the maturity date, UMC will redeem the bonds at 97.53% of the principal amount unless, prior to such date:

i. UMC shall have redeemed the bonds at the option of UMC, or the bonds shall have been redeemed at option of the bondholder;

ii. The bondholders shall have exercised the exchange right before maturity; or

iii. The bonds shall have been redeemed or purchased by UMC and cancelled.

b. On December 2, 2009, UMC issued SGX-ST listed zero coupon exchangeable bonds. The terms and conditions of the bonds are as follows:

(a) Issue Amount: US$80 million

(b) Period: December 2, 2009 ~ December 2, 2014 (Maturity date)

(c) Redemption:

i. UMC may redeem the bonds, in whole or in part, after 12 months of the issuance and prior to the maturity date, at the principal amount of the bonds with an interest calculated at the rate of -0.5% per annum (the Early Redemption Price) if the closing price of the common shares of Novatek Microelectronics Corp., Ltd. (Novatek) on the TSE, translated into US dollars at the prevailing exchange rate, for a period of 20 consecutive trading days, the last of which occurs not more than 10 days prior to the date upon which notice of such redemption is published, is at least 130% of the exchange price then in effect translated into US dollars at the rate of NTD 32.197=USD 1.00.

ii. UMC may redeem the bonds, in whole, but not in part, at the Early Redemption Price if at least 90% in principal amount of the bonds has already been exchanged, redeemed or purchased and cancelled.

iii. UMC may redeem all, but not part, of the bonds, at the Early Redemption Price at any time, in the event of certain changes in the R.O.C.'s tax rules which would require UMC to gross up for payments of principal, or to gross up for payments of interest or premium.

iv. All, or any portion, of the bonds will be redeemable in US dollars at the option of bondholders on December 2, 2011 at 99% of the principal amount.

v. Bondholders have the right to require UMC to redeem all or any portion of the bonds at the Early Redemption Price if the common shares of the exchanged securities are officially delisted on the TSE for a period of five consecutive trading days.

vi. In the event that a change of control as defined in the indenture of the bonds occurs to UMC or Novatek, the bondholders shall have the right to require UMC to redeem the bonds, in whole or in part, at the Early Redemption Price.

(d) Terms of Exchange

i. Underlying Securities: Common shares of Novatek

ii. Exchange Period: The bonds are exchangeable at any time on or after January 1, 2010 and prior to November 22, 2014, into Novatek common shares; provided, however, that if the exercise date falls within 5 business days from the beginning of, and during, any closed period, the right of the exchanging holder of the bonds to vote with respect to the shares it receives will be subject to certain restrictions.

iii. Exchange Price and Adjustment: The exchange price was originally NTD108.58 per share, determined on the basis of a fixed exchange rate of NTD 32.197=USD 1.00. The exchange price will be subject to adjustments upon the occurrence of certain events set out in the indenture. The exchange price is NTD 91.1045 per share on December 31, 2012.

(e) Exchange of the Bonds:

As of December 31, 2012, certain bondholders have exercised their rights to exchange their bonds with the total principal amount of US$43 million into Novatek shares. Gains arising from the exercise of exchange rights during the year ended December 31, 2012 amounted NT$1,522 million and was recognized as gain on disposal of investment.

(f) Redemption on the Maturity Date: On the maturity date, UMC will redeem the bonds at 97.53% of the principal amount unless, prior to such date:

i. UMC shall have redeemed the bonds at the option of UMC, or the bonds shall have been redeemed at option of the bondholder ;

ii. The bondholders shall have exercised the exchange right before maturity; or

iii. The bonds shall have been redeemed or purchased by UMC and cancelled.

c. On May 24, 2011, UMC issued SGX-ST listed currency linked zero coupon convertible bonds. The terms and conditions of the bonds are as follows:

(a) Issue Amount: US$500 million

(b) Period: May 24, 2011 ~ May 24, 2016 (Maturity date)

(c) Redemption:

i. UMC may redeem the bonds, in whole or in part, after 3 years of the issuance and prior to the maturity date, at the principal amount of the bonds with an interest calculated at the rate of -0.25% per annum (the Early Redemption Amount) if the closing price of UMC's ADS on the New York Stock Exchange, for a period of 20 out of 30 consecutive ADS trading days, the last of which occurs not more than 5 ADS trading days prior to the date upon which notice of such redemption is published, is at least 130% of the conversion price. The Early Redemption Price will be converted into NTD based on the Fixed Exchange Rate (NTD 28.846=USD 1.00), and this fixed NTD amount will be converted using the prevailing rate at the time of redemption for payment in USD.

ii. UMC may redeem the bonds, in whole, but not in part, at the Early Redemption Amount if at least 90% in principal amount of the bonds has already been converted, redeemed or repurchased and cancelled.

iii. UMC may redeem all, but not part, of the bonds, at the Early Redemption Amount at any time, in the event of certain changes in the R.O.C.'s tax rules which would require UMC to gross up for payments of principal, or to gross up for payments of interest or premium.

iv. All or any portion of the bonds will be redeemable in at Early Redemption Amount at the option of bondholders on May 24, 2014 at 99.25% of the principal amount.

v. Bondholders have the right to require UMC to redeem all of the bonds at the Early Redemption Amount if UMC's ADS cease to be listed or admitted for trading on the New York Stock Exchange, or UMC's common shares cease to be listed on the Taiwan Stock Exchange.

vi. In the event that a change of control as defined in the indenture of the bonds occurs to UMC, the bondholders shall have the right to require UMC to redeem the bonds, in whole but not in part, at the Early Redemption Amount.

(d) Terms of Conversion

i. Underlying Securities: ADS of UMC

ii. Conversion Period: The bonds are convertible at any time on or after July 4, 2011 and prior to May 14, 2016, into UMC's ADS; provided, however, that if the exercise date falls within 8 business days from the beginning of, and during, any closed period, the right of the converting holder of the bonds to vote with respect to the ADS it receives will be subject to certain restrictions.

iii. Conversion Price and adjustment: The conversion price was originally USD 3.77 per ADS, determined on the basis of a Fixed Exchange Rate of NTD 28.846=USD 1.00. The conversion price will be subject to adjustments upon the occurrence of certain events set out in the indenture. The conversion price is USD 3.3402 per ADS on December 31, 2012.

(e) Redemption on the Maturity Date: On the maturity date, UMC will redeem the bonds at 98.76% of the principal amount unless, prior to such date:

i. UMC shall have redeemed the bonds at the option of UMC, or the bonds shall have been redeemed at option of the bondholder;

ii. The bondholders shall have exercised the conversion right before maturity; or

iii. The bonds shall have been redeemed or repurchased by UMC and cancelled.

In accordance with R.O.C. SFAS No. 36, "Financial Instruments: Disclosure and Presentation", the value of the conversion right of the convertible bonds was determined at issuance and recognized in additional paid-in capital—stock options amounting to NT$680 million, excluding issuance costs allocated to additional paid-in capital—stock options amounting to NT$3 million. The effective interest rate on the liability component of the convertible bonds was determined to be 0.82%.

d. In early June, 2012, UMC issued five-year and seven-year domestic unsecured corporate bonds totaling NT$10,000 million, with a face value of NT$1 million per unit. The five-year domestic unsecured corporate bond was issued in the amount of NT$7,500 million. Interest will be paid annually at 1.43%, and the principal will be repayable in June 2017 upon maturity. The seven-year domestic unsecured corporate bond was issued in the amount of NT$2,500 million. Interest will be paid annually at 1.63%, and the principal will be repayable in June 2019 upon maturity.

e. Repayments of the above-mentioned bonds in the future year are as follows:

Bonds repayable (Year)	Amount
	NT$'000
2014	4,651,323
2016	12,278,461
2017 and thereafter	10,000,000
Total	26,929,784

18. LONG-TERM LOANS

a. Details of long-term loans as of December 31, 2011 and 2012 are as follows:

Lender	As of December 31, 2011 NT$'000	Redemption
Secured Long-Term Loan from Bank of Taiwan (1)	466,667	Repayable quarterly from March 30, 2011 to December 30, 2013 and interest is paid monthly.
Secured Long-Term Loan from Bank of Taiwan (2)	1,437,160	Repayable quarterly from October 13, 2012 to July 13, 2016 and interest is paid monthly.
Secured Long-Term Loan from First Commercial Bank (1)	620,000	Repayable semiannually from June 30, 2012 to December 31, 2015 and interest is paid monthly.
Secured Long-Term Loan from First Commercial Bank (2)	200,000	Repayable semiannually from December 24, 2012 to June 24, 2016 and interest is paid monthly.
Secured Long-Term Loan from First Commercial Bank (3)	200,000	Bullet repayment on May 16, 2014 and interest is paid monthly.
Secured Long-Term Loan from First Commercial Bank (4)	400,000	Bullet repayment on June 27, 2014 and interest is paid monthly.
Secured Long-Term Loan from Mega International Commercial Bank	944,000	Repayable quarterly from June 30, 2012 to June 30, 2016 and interest is paid monthly.
Secured Syndicated Loans from Bank of Taiwan and 7 others	2,770,000	Repayable semiannually from February 10, 2012 to August 10, 2013 and interest is paid monthly.
Secured Syndicated Loans from Taiwan Cooperative Bank and 5 others	1,050,000	Repayable semiannually from October 25, 2010 to April 25, 2015 and interest is paid monthly.
Unsecured Long-Term Loan from Mega International Commercial Bank	1,000,000	Repayable quarterly from December 28, 2012 to December 28, 2015 and interest is paid monthly.
Unsecured Long-Term Loan from First Commercial Bank (1)	62,500	Repayable quarterly from May 22, 2011 to February 22, 2013 and interest is paid monthly.
Unsecured Long-Term Loan from First Commercial Bank (2)	150,000	Repayable quarterly from September 30, 2011 to June 30, 2013 and interest is paid monthly.
Unsecured Revolving Loan from China Trust Commercial Bank (Note A)	1,500,000	Settlement due on August 30, 2016 and interest is paid monthly.
Unsecured Revolving Loan from Chang Hwa Commercial Bank (Note B)	500,000	Settlement due on December 29, 2016 and interest is paid monthly.
Unsecured Long-Term Loan from Taishin Bank	400,000	Bullet Repayment on August 25, 2013 and interest is paid monthly.
Subtotal	11,700,327	
Less: Administrative expenses from syndicated loans	(7,678)	
Less: Current portion	(2,581,667)	
Total	9,110,982	

	For the year ended December 31, 2011
Interest Rates	1.14%~2.30%

Lender	As of December 31, 2012 NT$'000	Redemption
Secured Long-Term Loan from Bank of Taiwan (1)	233,333	Repayable quarterly from March 30, 2011 to December 30, 2013 and interest is paid monthly.
Secured Long-Term Loan from Bank of Taiwan (2)	1,347,338	Effective July 13, 2011 to July 13, 2016. Interest-only payment for the first year. Principal is repaid by 16 quarterly payments with interest payments due monthly.
Secured Long-Term Loan from First Commercial Bank (1)	542,500	Effective December 31, 2010 to December 31, 2015. Interest-only payment for the first year. Principal is repaid by 8 semiannually payments with interest payments due monthly.
Secured Long-Term Loan from First Commercial Bank (2)	175,000	Effective June 24, 2011 to June 24, 2016. Interest-only payment for the first year. Principal is repaid by 8 semiannually payments with interest payments due monthly.
Secured Long-Term Loan from First Commercial Bank (3)	200,000	Bullet repayment on May 16, 2014 and interest is paid monthly.
Secured Long-Term Loan from First Commercial Bank (4)	400,000	Bullet repayment on June 27, 2014 and interest is paid monthly.
Secured Long-Term Loan from Mega International Commercial Bank (1)	924,705	Effective June 30, 2011 to June 30, 2016, with the first payment due on the first anniversary date of the loan. Principal is repaid by 17 quarterly payments with interest payments due monthly.
Secured Long-Term Loan from Mega International Commercial Bank (2)	58,853	Effective August 1, 2012 to August 1, 2017. Interest-only payment for the 3 quarters of the first year. Principal is repaid by 17 quarterly payments (begin from the 4th quarter of the first year) with interest payments due monthly.
Secured Long-Term Loan from Taiwan Cooperative Bank	149,000	Effective May 25, 2012 to May 25, 2017. Interest-only payment for the 3 quarters of the first year. Principal is repaid by 17 quarterly payments (begin from the 4th quarter of the first year) with interest payments due monthly.
Secured Syndicated Loans from Bank of Taiwan and 7 others	1,385,000	Repayable semiannually from February 10, 2012 to August 10, 2013 and interest is paid monthly.
Secured Syndicated Loans from Taiwan Cooperative Bank and 5 others	750,000	Repayable semiannually from October 25, 2010 to April 25, 2015 and interest is paid monthly.
Unsecured Long-Term Loan from Bank of Taiwan	400,000	Repayable quarterly from October 31, 2015 to July 31, 2017 and interest is paid monthly.
Unsecured Long-Term Loan from Mega International Commercial Bank	3,692,308	Repayable quarterly from December 28, 2012 to December 28, 2015 and interest is paid monthly.
Unsecured Long-Term Loan from First Commercial Bank (1)	12,500	Repayable quarterly from May 22, 2011 to February 22, 2013 and interest is paid monthly.
Unsecured Long-Term Loan from First Commercial Bank (2)	50,000	Repayable quarterly from September 30, 2011 to June 30, 2013 and interest is paid monthly.

Lender	As of December 31, 2012	Redemption
	NT$'000	
Unsecured Long-Term Loan from E. Sun Bank	300,000	Repayable quarterly from December 24, 2015 to December 24, 2017 and interest is paid monthly.
Unsecured Revolving Loan from China Trust Commercial Bank (Note A)	2,500,000	Settlement due on August 30, 2016 and interest is paid monthly.
Unsecured Revolving Loan from Chang Hwa Commercial Bank (Note B)	1,000,000	Settlement due on December 29, 2016 and interest is paid monthly.
Unsecured Long-Term Loan from Taiwan Cooperative Bank	300,000	Repayable quarterly from March 24, 2016 to December 24, 2017 and interest is paid monthly.
Unsecured Long-Term Loan from Taishin Bank	400,000	Bullet Repayment on August 25, 2013 and interest is paid monthly.
Subtotal	14,820,537	
Less: Administrative expenses from syndicated loans	(3,071)	
Less: Current portion	(4,594,846)	
Total	10,222,620	

	For the year ended December 31, 2012
Interest Rates	1.24%~2.51%

Note A: UMC entered into a 5-year loan agreement with China Trust Commercial Bank, effective August 30, 2011. The agreement offered UMC a revolving line of credit of NT$2.5 billion starting from the first time use of the loan to the expiry date of the agreement, August 30, 2016. As of December 31, 2011 and 2012, the unused line of credit was NT$1 billion and nil, respectively.

Note B: UMC entered into a 5-year loan agreement with Chang Hwa Commercial Bank, effective December 29, 2011. The agreement offered UMC a revolving line of credit of NT$3 billion starting from the first time use of the loan to the expiry date of the agreement, December 29, 2016. As of December 31, 2011 and 2012, the unused line of credit was NT$2.5 billion and NT$2 billion respectively.

b. The long-term loans on December 31, 2012 will be repaid by installments with the last payment on December 24, 2017. Repayments in the coming years respectively are as follows:

Long-Term Loans repayable (Year)	Amount
	NT$'000
2013	4,594,846
2014	2,990,554
2015	2,323,887
2016	4,450,002
2017	461,249
Total	14,820,538

c. Please refer to Note 28 for property, plant and equipment pledged as collateral for long-term loans.

d. On December 19, 2012, the board of directors resolved to provide endorsement to NEXPOWER's syndicated loan from banks including Bank of Taiwan for the amount up to NT$1,400 million. As of December 31, 2012, the loan agreement along with related endorsement documents have not been signed, and the outstanding balance was nil.

19. PENSION PLAN

a. The Labor Pension Act of the R.O.C. (the Act), which adopts a defined contribution plan, became effective on July 1, 2005. Employees eligible for the Labor Standards Law, a defined benefit plan, were offered the options to elect the pension calculation under the Act or continue to be subject to the pension calculation under the Labor Standards Law. Those employees that elected to be subject to the Act will have their seniority achieved under the Labor Standards Law retained upon election of the Act, and the Company will make monthly contributions of no less than 6% of these employees' monthly wages to the employees' individual pension accounts. The Company has made monthly contributions based on each individual employee's salary or wage to employees' pension accounts beginning July 1, 2005 and a total of NT$422 million, NT$503 million and NT$522 million were contributed by the Company for the years ended December 31, 2010, 2011 and 2012, respectively. Pension benefits for employees of the Branch and subsidiaries overseas are provided in accordance with the local regulations, and during the years ended December 31, 2010, 2011 and 2012, the Company made contributions of NT$170 million, NT$165 million and NT$193 million, respectively.

b. The defined benefit plan under the Labor Standards Law is disbursed based on the units of service years and the average salary in the last month of the service year. Two units per year are awarded for the first 15 years of services while one unit per year is awarded after the completion of the fifteenth year. The total units shall not exceed 45 units. In accordance to the plan, the Company contributes an amount equivalent to 2% of the employees' total salaries and wages on a monthly basis to the pension fund deposited at the Bank of Taiwan in the name of an administered pension fund committee. Government authority will collect the fund as a Labor Retirement Fund and determine the allocation and investment policy of the assets. The defined benefit plan assets and obligations are measured as of December 31. The unrecognized net asset or obligation at transition based on actuarial valuation is amortized on a straight-line basis over 15 years.

c. Change in benefit obligation during the year:

	For the years ended December 31,	
	2011	2012
	NT$'000	NT$'000
Projected benefit obligation at beginning of year	(5,938,668)	(6,082,644)
Service cost	(107,189)	(83,084)
Interest cost	(107,813)	(109,236)
Benefits paid	58,482	106,322
Gain (Loss) on projected benefit obligation	94,765	(414,980)
Exchange gain (loss)	(82,221)	143,862
Projected benefit obligation at end of year	(6,082,644)	(6,439,760)

d. Change in pension assets during the year:

	For the years ended December 31,	
	2011	2012
	NT$'000	NT$'000
Fair value of plan assets at beginning of year	2,118,193	2,276,883
Actual return on plan assets	(19,379)	35,637
Contributions from employer	167,837	158,870
Benefits paid	(58,482)	(106,322)
Exchange gain (loss) and others	68,714	(115,806)
Fair value of plan assets at end of year	2,276,883	2,249,262

e. The funding status of the pension plan is as follows:

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Benefit obligation		
Vested benefit obligation	(1,038,313)	(1,152,480)
Non-vested benefit obligation	(2,451,362)	(2,728,767)
Accumulated benefit obligation	(3,489,675)	(3,881,247)
Effect from projected salary increase	(2,592,969)	(2,558,513)
Projected benefit obligation	(6,082,644)	(6,439,760)
Fair value of plan assets	2,276,883	2,249,262
Funded status	(3,805,761)	(4,190,498)
Unrecognized net transitional benefit obligation	1,243	1,119
Unrecognized loss	553,642	712,925
Prior service cost	(10,224)	—
Adjustment required to recognize minimum liabilities	(1)	—
Accrued pension liabilities recognized on the consolidated balance sheet	(3,261,101)	(3,476,454)

f. The components of the net periodic pension cost are as follows:

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Service cost	103,864	107,189	83,084
Interest cost	113,884	107,813	109,236
Expected return on plan assets	(55,487)	(50,128)	(61,935)
Amortization of unrecognized transitional net benefit obligation	28,293	124	124
Amortization of unrecognized pension loss	12,069	13,664	212,257
Amortization of prior service cost	(5,197)	(46,513)	(8,816)
Others	(48)	(1,371)	52,528
Net periodic pension cost	197,378	130,778	386,478

The actuarial assumptions underlying are as follows:

	For the year ended December 31, 2010		
	UMC	FORTUNE	UMC JAPAN
Discount rate	1.75%	2.00%	2.00%
Rate of salary increase	4.00%	3.00%	2.55%
Expected return on plan assets	1.75%	2.00%	3.65%

	For the year ended December 31, 2011		
	UMC	FORTUNE	UMC JAPAN
Discount rate	1.90%	2.00%	2.00%
Rate of salary increase	4.00%	3.00%	2.55%
Expected return on plan assets	1.90%	2.00%	3.20%

	For the year ended December 31, 2012		
	UMC	FORTUNE	UMC JAPAN
Discount rate	1.75%	1.75%	2.00%
Rate of salary increase	4.00%	3.00%	2.55%
Expected return on plan assets	1.75%	1.75%	4.78%

Expected future benefit payments are as follows:

Year	Amount
	NT$'000
2013	1,044,502
2014	21,796
2015	32,001
2016	49,505
2017	70,759
2018-2022	640,762

The Company expects to make pension fund contributions of NT$307 million in 2013.

20. CAPITAL STOCK

a. UMC had 26,000 million common shares authorized to be issued, and 13,084 million shares were issued as of December 31, 2011, each at a par value of NT$10.

b. UMC had issued a total of 230 million ADSs, which were traded on the NYSE as of December 31, 2011. The total number of common shares of UMC represented by all issued ADSs was 1,148 million shares as of December 31, 2011. One ADS represents five common shares.

c. Among the employee stock options issued by UMC on June 19, 2009, 96,544 thousand options were exercised during the year ended December 31, 2011. The issuance process for 96,430 thousand shares was completed through the authority as of December 31, 2011. UMC recorded cash collected for the remaining 114 thousand shares still pending authorization as of December 31, 2011 under Capital collected in advance. The issuance process through the authority was subsequently completed on March 28, 2012.

d. On March 14, 2012, UMC cancelled 158 million shares of treasury stock, which were repurchased during the periods from January 7 to February 16, 2009, for the purpose of transferring to employees.

e. UMC had 26,000 million common shares authorized to be issued, and 12,952 million shares were issued as of December 31, 2012, each at a par value of NT$10.

f. UMC had issued a total of 230 million ADSs, which were traded on the NYSE as of December 31, 2012. The total number of common shares of UMC represented by all issued ADSs was 1,148 million shares as of December 31, 2012. One ADS represents five common shares.

g. Among the employee stock options issued by UMC on June 19, 2009, 122,131 thousand options were exercised during the year ended December 31, 2012. The issuance process for 121,827 thousand shares was completed through the authority as of December 31, 2012. UMC recorded cash collected for the remaining 304 thousand shares still pending authorization as of December 31, 2012 under Capital collected in advance.

21. EMPLOYEE STOCK OPTIONS

On September 30, 2004, December 22, 2005, October 9, 2007 and May 12, 2009, the Company was authorized by the Securities and Futures Bureau of the Financial Supervisory Commission, Executive Yuan, to issue employee stock options with a total number of 150 million, 350 million, 500 million and 500 million units, respectively. Each unit entitles an optionee to subscribe to 1 share of the Company's common stock. Settlement upon the exercise of the options will be made through the issuance of new shares by the Company. The exercise price of the options was set at the closing price of the Company's common stock on the date of grant. The contractual life is 6 years and an optionee may exercise the options in accordance with certain schedules as prescribed by the plan after 2 years from the date of grant. Detailed information relevant to the employee stock options is disclosed as follows:

Date of grant	Total number of options granted (in thousands)	Total number of options outstanding (in thousands)	Shares available to option holders (in thousands) (Note)	Exercise price (NTD) (Note)
October 13, 2004	20,200	—	—	$ 24.28
April 29, 2005	23,460	—	—	$ 22.37
August 16, 2005	54,350	—	—	$ 29.47
September 29, 2005	51,990	—	—	$ 26.89
January 4, 2006	39,290	—	—	$ 23.17
May 22, 2006	42,058	—	—	$ 25.19
August 24, 2006	28,140	—	—	$ 24.09
December 13, 2007	500,000	332,656	332,656	$ 18.03
June 19, 2009	300,000	132,350	132,350	$ 10.40
Total	1,059,488	465,006	465,006	

Note: The employee stock options granted prior to August 7, 2007, the effective date of capital reduction, were adjusted in accordance with the capital reduction rate. Each option unit entitles an optionee to subscribe for about 0.7 share of the Company's common stock. The exercise price of the options is also adjusted according to capital reduction rate. Each stock option unit granted after August 7, 2007 remains to be subscribed for 1 share of the Company's common stock.

a. A summary of the Company's stock option plan and related information for the years ended December 31, 2011 and 2012 is as follows:

	For the years ended December 31,					
	2011			2012		
	Options (in thousands)	Shares available to option holders (in thousands)	Weighted-average Exercise Price per share (NTD)	Options (in thousands)	Shares available to option holders (in thousands)	Weighted-average Exercise Price per share (NTD)
Outstanding at beginning of period	752,700	718,876	$ 16.05	560,526	547,724	$ 16.09
Exercised	(96,544)	(96,544)	$ 10.40	(25,588)	(25,588)	$ 10.40
Forfeited	(32,745)	(30,767)	$ 17.04	(38,969)	(35,544)	$ 18.23
Expired	(62,885)	(43,841)	$ 27.28	(30,963)	(21,586)	$ 24.37
Outstanding at end of period	560,526	547,724	$ 16.09	465,006	465,006	$ 15.86
Exercisable at end of period	422,148	409,652	$ 17.85	395,142	395,142	$ 16.71

b. The information on the Company's outstanding stock options as of December 31, 2012, is as follows:

		Outstanding Stock Options				Exercisable Stock Options		
Authorization Date	Range of Exercise Price(NTD)	Options (in thousands)	Shares available to option holders (in thousands)	Weighted-average Expected Remaining Years	Weighted-average Exercise Price per share (NTD)	Options (in thousands)	Shares available to option holders (in thousands)	Weighted-average Exercise Price per share (NTD)
2007.10.09	$ 18.03	332,656	332,656	0.95	$ 18.03	326,924	326,924	$ 18.03
2009.05.12	$ 10.40	132,350	132,350	2.46	$ 10.40	68,218	68,218	$ 10.40
		465,006	465,006	1.38	$ 15.86	395,142	395,142	$ 16.71

c. The Company used the intrinsic value method to recognize compensation costs for its employee stock options issued between January 1, 2004 and December 31, 2007. Compensation costs for these options were nil for the years ended December 31, 2011 and 2012. For options granted on or after January 1, 2008, the Company recognized compensation cost of NT$214 million and NT$78 million using the fair value method in accordance with R.O.C. SFAS 39 for the years ended December 31, 2011 and 2012, respectively.

The Company granted options prior to adopting R.O.C. SFAS 39. Pro forma information on net income and earnings per share using the fair value method is as follows:

	For the year ended December 31, 2010			
	Basic earnings per share		Diluted earnings per share	
	NT$'000		NT$'000	
Net income		23,898,905		23,898,905
Earnings per share (NTD)	$	1.91	$	1.87
Pro forma net income		23,538,509		23,538,509
Pro forma earnings per share (NTD)	$	1.88	$	1.84

	For the year ended December 31, 2011			
	Basic earnings per share		Diluted earnings per share	
	NT$'000		NT$'000	
Net income		10,609,695		10,663,057
Earnings per share (NTD)	$	0.84	$	0.81
Pro forma net income		10,537,737		10,591,099
Pro forma earnings per share (NTD)	$	0.84	$	0.80

	For the year ended December 31, 2012			
	Basic earnings per share		Diluted earnings per share	
	NT$'000		NT$'000	
Net income		7,819,448		7,900,786
Earnings per share (NTD)	$	0.62	$	0.59
Pro forma net income		7,812,610		7,893,948
Pro forma earnings per share (NTD)	$	0.62	$	0.59

The fair value of the options outstanding as of December 31, 2011 and 2012 were estimated at the date of grant using the Black-Scholes options pricing model with the following weighted-average assumptions. The factors before and after the adoption of R.O.C. SFAS 39 to account for share-based payments were as follows:

Factors	Before	After
Expected dividend yields	1.37%~1.71%	1.98%
Volatility factors of the expected market price of the Company's common stock	36.29%~47.85%	40.63%
Risk-free interest rate	1.85%~2.70%	1.01%
Weighted-average expected life	4~5 years	3.16~5.03 years

22. TREASURY STOCK

a. Changes in treasury stock during the years ended December 31, 2010, 2011 and 2012 are as follows:

For the year ended December 31, 2010
(In thousands of shares)

Purpose	As of January 1, 2010	Increase	Decrease	As of December 31, 2010
For transfer to employees	221,909	300,000	63,975	457,934

For the year ended December 31, 2011
(In thousands of shares)

Purpose	As of January 1, 2011	Increase	Decrease	As of December 31, 2011
For transfer to employees	457,934	—	—	457,934

For the year ended December 31, 2012
(In thousands of shares)

Purpose	As of January 1, 2012	Increase	Decrease	As of December 31, 2012
For transfer to employees	457,934	—	157,934	300,000

b. According to the Securities and Exchange Law of the R.O.C., the total shares of treasury stock shall not exceed 10% of UMC's issued stock, and the total purchase amount shall not exceed the sum of the retained earnings, additional paid-in capital – premiums and realized additional paid-in capital. As such, the maximum number of shares of treasury stock that UMC could hold as of December 31, 2011 and 2012, were 1,308 million shares and 1,295 million shares, while the ceiling amount were NT$69,786 million and NT$71,960 million, respectively.

c. In compliance with Securities and Exchange Law of the R.O.C., treasury stock should not be pledged, nor should it be entitled to voting rights or receiving dividends. Stock held by subsidiaries is treated as treasury stock. These subsidiaries have the same rights as other stockholders except for subscription to new stock issuance and voting rights.

d. As of December 31, 2011, UMC's subsidiary, FORTUNE VENTURE CAPITAL CORP., held 16 million shares of UMC's stock, with a book value of NT$12.70 per share. The closing price on December 31, 2011 was NT$12.70.

   As of December 31, 2012, UMC's subsidiary, FORTUNE VENTURE CAPITAL CORP., held 16 million shares of UMC's stock, with a book value of NT$11.70 per share. The closing price on December 31, 2012 was NT$11.70.

23. RETAINED EARNINGS AND DIVIDEND POLICIES

According to UMC's Articles of Incorporation, current year's earnings, if any, shall be distributed in the following order:

a. Payment of all taxes and dues;

b. Offset prior years' operation losses;

c. Set aside 10% of the remaining amount after deducting items (a) and (b) as a legal reserve;

d. Special capital reserve or reversal in accordance with relevant laws or regulations or as requested by the authorities in charge; (Note)

e. Set aside 0.1% of the remaining amount after deducting items (a), (b), (c) and (d) as directors' remuneration; and

f. After deducting items (a), (b), (c) and (d) above from the current year's earnings, no less than 5% of the remaining amount together with the prior years' unappropriated earnings is to be allocated as employee bonus, which will be settled through issuance of new shares of UMC, or cash. Employees of UMC's subsidiaries, meeting certain requirements determined by the board of directors, are also eligible for the employee stock bonus.

g. The distribution of the remaining portion, if any, will be recommended by the board of directors and resolved in the stockholders' meeting.

The policy for dividend distribution should reflect factors such as the current and future investment environment, fund requirements, domestic and international competition and capital budgets; as well as the benefit of stockholders, stock dividend equilibrium, and long-term financial planning. The board of directors shall make the distribution proposal annually and present it at the stockholders' meeting. UMC's Articles of Incorporation further provide that no more than 80% of the dividends to stockholders, if any, may be paid in the form of stock dividends. Accordingly, at least 20% of the dividends must be paid in the form of cash.

Note: In light of the amendment of the Corporate Governance Best-Practice Principles for TWSE/GTSM Listed Companies on March 31, 2011, UMC's Articles of Incorporation were revised and revisions approved in the stockholders' meeting held on June 15, 2011.

According to the regulation of Taiwan SFC, UMC is required to appropriate a special reserve in the amount equal to the sum of debit elements under stockholders' equity, such as unrealized loss on financial instruments and negative cumulative translation adjustment, at every year-end. Such special reserve is prohibited from distribution. However, if any of the debit elements is reversed, the special reserve in the amount equal to the reversal may be released for earnings distribution or offsetting accumulated deficit.

During the years ended December 31, 2011 and 2012, the amounts of the employee bonus and remunerations to directors were estimated. The board of directors estimated the amount by taking into consideration of UMC's Articles of Incorporation, government regulations and industry average. Estimated amount of employee bonus and remunerations paid to directors are charged to current income. If the board modified the estimates significantly in the subsequent periods, UMC will recognize the change as an adjustment to current income. Moreover, if the amounts were modified by the stockholders' meeting in the following year, the adjustment will be regarded as a change in accounting estimate and will be reflected in the consolidated statement of income in the following year. Upon stockholders' approval of the employee stock bonus, the distribution amount is determined by dividing the total approved bonus amount with the closing market price of UMC's stock one day prior to the approved date. Information about appropriations of the bonus to employees and directors can be obtained from the "Market Observation Post System" on the website of the TSE.

The appropriation and compensation of 2012 unappropriated retained earnings has not yet been approved by the stockholder's meeting as of the reporting date. Information on the board of directors' recommendations and stockholders' approval can be obtained from the "Market Observation Post System" on the website of the TSE.

The distributions of cash dividend, employee bonus and directors' remuneration for 2011 and 2012 were approved through the board of stockholders' meeting and the directors' meeting held on June 12, 2012 and March 13, 2013, respectively. The details of distribution are as follows:

	2011	2012
Cash Dividend	NT$0.50 per share	NT$0.40 per share
Employee bonus – Cash (in thousand NTD)	1,618,217	1,040,179
Directors' remuneration (in thousand NTD)	9,303	6,950

Employee bonus and directors' remuneration for 2011 were approved through the stockholders' meeting, which were consistent with the resolutions of meeting of Board of Directors held on March 14, 2012.

The aforementioned cash dividend for 2011 was adjusted to NT$0.49980232 per share due to the increase in outstanding common stock as a result of newly issued shares to settle employee stock options exercised. The distribution was approved through the Board of Directors' meeting held on June 20, 2012.

24. OPERATING COSTS AND EXPENSES

The Company's personnel, depreciation, and amortization expenses are summarized as follows:

	For the years ended December 31,								
	2010			2011			2012		
	Operating costs	Operating expenses	Total	Operating costs	Operating expenses	Total	Operating costs	Operating expenses	Total
	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000
Personnel expenses									
Salaries	13,201,139	5,135,151	18,336,290	12,265,469	4,764,634	17,030,103	12,096,177	4,499,346	16,595,523
Labor and health insurance	624,384	205,606	829,990	764,487	244,986	1,009,473	781,756	259,429	1,041,185
Pension	605,086	184,373	789,459	609,855	188,812	798,667	857,142	244,204	1,101,346
Other personnel expenses	145,400	59,881	205,281	142,316	72,735	215,051	141,524	53,068	194,592
Depreciation	27,941,023	1,972,982	29,914,005	29,775,956	2,103,701	31,879,657	32,759,537	2,223,257	34,982,794
Amortization	146,452	397,869	544,321	161,501	294,230	455,731	274,753	451,410	726,163

25. INCOME TAX

(1) Income tax expense consisted of :

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Current			
Domestic	1,432,898	442,326	827,889
Foreign	84,390	40,759	15,477
Subtotal	1,517,288	483,085	843,366
Deferred			
Domestic	103,115	406,928	1,289,122
Foreign	(14,289)	23,422	(3,450)
Subtotal	88,826	430,350	1,285,672
Income tax expense	1,606,114	913,435	2,129,038

(2) Reconciliation between the income tax expense and the income tax calculated on pre-tax financial statement income based on the statutory tax rate is as follows:

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Income tax on pre-tax income from continuing operations at statutory tax rate	4,315,216	1,594,660	1,360,503
Permanent and temporary differences			
Investment loss	(479,686)	(987,163)	(429,952)
Gain on disposal of investments	(289,103)	(157,537)	(775,564)
Investment in subsidiary	—	—	319,229
Others	(1,220,481)	(459,843)	230,845
Subtotal	(1,989,270)	(1,604,543)	(655,442)
Change in investment tax credit	2,363,985	441,053	1,596,902
Change in loss carry-forward	2,136,325	99,141	2,996,251
Change in valuation allowance against deferred income tax assets			
Investment tax credit	(3,095,208)	(720,397)	(1,412,352)
Loss carry-forward	(2,136,325)	(104,410)	(2,159,581)
Others	(295,209)	783,105	277,774
Subtotal	(5,526,742)	(41,702)	(3,294,159)
Effect of higher tax rate of subsidiary	41,549	35,333	23,819
Change in tax rate	202,628	—	—
Adjustment of prior year's tax expense	1,778	(875)	(13,839)
Income basic tax	2,289	18,491	7,985
Others	58,356	371,877	107,018
Income tax expense	1,606,114	913,435	2,129,038

(3) Significant components of deferred income tax assets and liabilities are as follows:

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Deferred income tax assets		
Investment tax credit	6,298,868	4,339,394
Depreciation	649,365	1,072,627
Loss carry-forward	7,307,779	5,646,652
Pension	566,051	611,482
Allowance on sales returns and discounts	38,448	108,785
Allowance for loss on decline in market value and obsolescence of inventories	457,013	518,072
Foreign investment gain or loss	787,073	539,254
Others	277,994	1,049,639
Total deferred income tax assets	16,382,591	13,885,905
Valuation allowance	(12,803,735)	(10,885,246)
Net deferred income tax assets	3,578,856	3,000,659
Deferred income tax liabilities		
Unrealized exchange gain	(260,015)	(273,810)
Depreciation	(15)	(983,132)
Others	(95,823)	(57,390)
Total deferred income tax liabilities	(355,853)	(1,314,332)
Total net deferred income tax assets	3,223,003	1,686,327
Deferred income tax assets – current	2,656,817	2,940,973
Deferred income tax liabilities – current	(305,925)	(298,896)
Valuation allowance	(2,085,934)	(1,751,702)
Net	264,958	890,375
Deferred income tax assets – noncurrent	13,725,774	10,944,932
Deferred income tax liabilities – noncurrent	(49,928)	(1,015,436)
Valuation allowance	(10,717,801)	(9,133,544)
Net	2,958,045	795,952
Total net deferred income tax assets	3,223,003	1,686,327

(4) UMC's income tax returns for all the fiscal years up to 2010 have been assessed and approved by the R.O.C. Tax Authority.

(5) UMC was granted several four or five-year income tax exemption periods with respect to income derived from the expansion of operations. The income tax exemption periods will expire on December 31, 2015.

(6) The Company earns investment tax credits for the amount invested in production equipment, research and development, employee training, and investment in high technology industry and venture capital.

As of December 31, 2012, the Company's unused investment tax credits were as follows:

Expiration Year	Investment tax credits earned	Balance of unused investment tax credits
	NT$'000	NT$'000
2013	1,890,302	1,889,355
2014	2,146,028	2,146,028
2015	304,011	304,011
Total	4,340,341	4,339,394

(7) As of December 31, 2012, the unutilized accumulated losses for the Company were as follows:

Expiration Year	Accumulated loss	Unutilized accumulated loss
	NT$'000	NT$'000
2013	1,185,211	1,185,211
2014	178,024	178,024
2015	149,827	149,827
2016	24,588	21,616
2017	1,447,962	1,447,962
2018	2,161,114	2,161,114
2019	1,571,628	1,571,274
2020	2,230,864	2,226,388
2021	10,440,087	10,430,802
2022	4,445,380	4,445,380
2032	13,013	12,064
Total	23,847,698	23,829,662

(8) The balance of UMC's imputation credit accounts as of December 31, 2011 and 2012 are NT$917 million and NT$707 million, respectively. The actual creditable ratio for 2011 and the expected creditable ratio for 2012 are 4.65% and 3.3%, respectively.

(9) UMC's earnings generated in the year ended December 31, 1997 and prior years have been fully appropriated.

26. EARNINGS PER SHARE

For the years ended December 31, 2011 and 2012, there were unsecured convertible bonds and employee stock options outstanding and the Company calculated the effect of employee bonus in accordance with the ARDF Interpretation No. 97-169. The Company is considered as a complex capital structure. Therefore, in consideration of such complex structure, the calculated basic and diluted earnings per share for the years ended December 31, 2010, 2011 and 2012, are disclosed as follows:

(shares expressed in thousands)	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Net income	23,898,905	10,609,695	7,819,448
Effect of dilution:			
Employee stock options	—	—	—
Employee bonus	—	—	—
Unsecured Convertible bonds	—	53,362	81,338
Adjusted net income assuming dilution	23,898,905	10,663,057	7,900,786
Weighted average shares outstanding	12,496,485	12,561,249	12,624,817
Effect of dilution:			
Employee stock options	88,117	50,765	28,298
Employee bonus	182,988	209,508	151,031
Unsecured Convertible bonds	—	420,158	652,022
Adjusted weighted average shares outstanding assuming dilution	12,767,590	13,241,680	13,456,168
Retroactively adjusted weighted average shares outstanding	12,496,485	12,561,249	12,624,817
Retroactively adjusted weighted average shares outstanding assuming dilution	12,767,590	13,241,680	13,456,168
Earnings per share-basic (in dollars)	1.91	0.84	0.62
Earnings per share-diluted (in dollars)	1.87	0.81	0.59

27. RELATED PARTY TRANSACTIONS

(1) Name and Relationship of Related Parties

Name of related parties	Relationship with the Company
UMCI LTD.	Equity Investee (liquidation completed on May 10, 2011)
UNITECH CAPITAL INC.	Equity Investee
MEGA MISSION LIMITED PARTNERSHIP	Equity Investee
MTIC HOLDINGS PTE. LTD.	Equity Investee
UNIMICRON HOLDING LIMITED	Equity Investee
HSUN CHIEH INVESTMENT CO., LTD.	Equity Investee
UNITED MICRODISPLAY OPTRONICS CORP.	Equity Investee (liquidation completed on June 23, 2011)
BEST ELITE INTERNATIONAL LIMITED	Equity Investee (since December 2011)
SILICON INTEGRATED SYSTEMS CORP. (SIS)	The Company’s director
UMC SCIENCE AND CULTURE FOUNDATION	The Company’s director
POWER LIGHT TECH CO., LTD. (PLT) (NOTE)	Subsidiary’s equity investee (NOTE)
EXOJET TECHNOLOGY CORP.	Subsidiary’s equity investee
MOS ART PACK CORP. (MAP)	Subsidiary’s equity investee (has filed for liquidation on March 10, 2011)
UNITED LIGHTING OPTO-ELECTRONIC INC. (UNITED LIGHTING) (NOTE)	Subsidiary’s equity investee (has filed for liquidation on June 19, 2012)
CRYSTAL MEDIA INC.	Subsidiary’s equity investee (ceased to be an subsidiary’s equity investee since April 2011)
SHENYANG PIONEER U-LIGHTING OPTO-ELECTRONIC CO., LTD.	Subsidiary’s equity investee (ceased to be an subsidiary’s equity investee since June, 2012)
UNITED LED CORPORATION HONG KONG LIMITED	Subsidiary’s equity investee
LTI REENERGY CO., LTD.	Subsidiary’s equity investee (since October 2011)
SOLAR GATE TECHNOLOGY CO., LTD.	Subsidiary’s equity investee
CRYSTALWISE TECHNOLOGY INC.	Subsidiary’s equity investee
WINAICO SOLAR PROJEKT 1 GMBH	Subsidiary’s equity investee
UNIMICRON CORPORATION	Subsidiary’s director
JINING SUNRICH SOLARENERGY CORPORATION (JINING SUNRICH)	Same general manager with subsidiaries
SUBTRON TECHNOLOGY CO., LTD.	Subsidiary’s supervisor (since October, 2010)
HEJIAN TECHNOLOGY (SUZHOU) CO., LTD.	Equity Investee’s subsidiary
All members of director, supervisor and key managers	The Company’s key management personnel

Note: On April 1, 2011, UNITED LIGHTING was merged with PLT. After the business combination, PLT is the surviving company and was renamed to UNITED LIGHTING OPTO-ELECTRONIC INC. On June 19, 2012, UNITED LIGHTING has filed for liquidation through a decision at its stockholders’ meeting.

(2) Significant Related Party Transactions

a. Operating revenues

	For the years ended December 31,					
	2010		2011		2012	
	Amount	Percentage	Amount	Percentage	Amount	Percentage
	NT$'000		NT$'000		NT$'000	
SIS	777,318	1	237,245	—	255,992	—
Others	303,829	—	253,881	—	225,196	—
Total	1,081,147	1	491,126	—	481,188	—

The sales price to the above related parties was determined through mutual agreement based on the market conditions. The collection period for overseas sales to related parties was net 60 days, while the terms for domestic sales were month-end 45~60 days. The collection period for third party overseas sales was net 30~60 days, while the terms for third party domestic sales were month-end 30~60 days.

b. Accounts receivable, net

	As of December 31,			
	2011		2012	
	Amount	Percentage	Amount	Percentage
	NT$'000		NT$'000	
SIS	3,954	—	70,070	—
JINING SUNRICH	124,851	1	12,067	—
Others	1,825	—	—	—
Total	130,630	1	82,137	—
Less: Allowance for sales returns and discounts	(77)		(396)	
Net	130,553		81,741	

c. Significant asset transactions

	For the year ended December 31, 2011			
	Item	Purchase price	Disposal amount	Disposal Gain
		NT$'000	NT$'000	NT$'000
MAP	Purchase of fixed assets	563,592	—	—

d. Key management personnel compensation disclosure

Item	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Salary, compensation, allowance, income from professional practice and bonus	343,682	336,653	263,041

For the years ended December 31,

28. ASSETS PLEDGED AS COLLATERAL

As of December 31, 2011

	Amount	Party to which asset(s) was pledged	Purpose of pledge
	NT$'000		
Deposit-out (Time deposit)	645,906	Customs	Customs duty guarantee
Deposit-out (Time deposit)	122,728	Science Park Administration	Collateral for land lease
Deposit-out (Time deposit)	43,800	Liquefied Natural Gas Business Division, CPC Corporation, Taiwan	Energy resources guarantee
Deposit-out (Time deposit)	26,624	Securities and Futures Investors Protection Center	Negotiation guarantee
Deposit-out (Time deposit)	1,246	Bureau of Energy, Ministry of Economic Affairs	Energy resources guarantee
Land	699,627	First Commercial Bank	Collateral for long- term loans
Buildings	2,007,176	Syndicated Loans from Bank of Taiwan and 7 others and Syndicated Loans from Taiwan Cooperative Bank and 5 others	Collateral for long- term loans
Machinery and equipment	9,071,782	Bank of Taiwan, Taiwan Cooperative Bank, First Commercial Bank, Mega International Commercial Bank, Syndicated Loans from Bank of Taiwan and 7 others and Syndicated Loans from Taiwan Cooperative Bank and 5 others	Collateral for long- term loans
Furniture and fixtures	84,204	Syndicated Loans from Bank of Taiwan and 7 others and Syndicated Loans from Taiwan Cooperative Bank and 5 others	Collateral for long- term loans
Construction in progress and prepayments	1,721,465	Bank of Taiwan, First Commercial Bank and Mega International Commercial Bank	Collateral for long- term loans
Total	14,424,558		

As of December 31, 2012

	Amount	Party to which asset(s) was pledged	Purpose of pledge
	NT$'000		
Deposit-out (Time deposit)	815,040	Customs	Customs duty guarantee
Deposit-out (Time deposit)	122,729	Science Park Administration	Collateral for land lease
Deposit-out (Time deposit)	52,800	Liquefied Natural Gas Business Division, CPC Corporation, Taiwan	Energy resources guarantee
Deposit-out (Time deposit)	1,246	Bureau of Energy, Ministry of Economic Affairs	Energy resources guarantee
Land	699,627	First Commercial Bank	Collateral for long-term loans
Buildings	1,814,811	Syndicated Loans from Bank of Taiwan and 7 others and Syndicated Loans from Taiwan Cooperative Bank and 5 others	Collateral for long-term loans
Machinery and equipment	7,480,728	Bank of Taiwan, Taiwan Cooperative Bank, First Commercial Bank, Mega International Commercial Bank, Syndicated Loans from Bank of Taiwan and 7 others and Syndicated Loans from Taiwan Cooperative Bank and 5 others	Collateral for long-term loans
Furniture and fixtures	60,702	Syndicated Loans from Bank of Taiwan and 7 others and Syndicated Loans from Taiwan Cooperative Bank and 5 others	Collateral for long-term loans
Construction in progress and prepayments	249,434	Bank of Taiwan, First Commercial Bank and Mega International Commercial Bank	Collateral for long-term loans
Total	11,297,117		

29. COMMITMENT AND CONTINGENT LIABILITIES

(1) The Company has entered into several patent license agreements and development contracts of intellectual property for a total contract amount of approximately NT$7.3 billion. Royalties and development fees payable in future years are NT$3.4 billion as of December 31, 2012.

(2) The Company signed several construction contracts for the expansion of its factory premises. As of December 31, 2012, these construction contracts amounted to approximately NT$7.8 billion and the unpaid portion of the contracts, which was not accrued, was approximately NT$4.7 billion.

(3) The Company entered into several operating lease contracts for land and office. These renewable operating leases will expire in various years through 2049. Future minimum lease payments under those leases are as follows:

For the years ended December 31,	Amount
	NT$'000
2013	465,508
2014	409,259
2015	377,037
2016	348,965
2017	308,400
2018 and thereafter	2,269,247
Total	4,178,416

Rental expense for the years ended December 31, 2010, 2011 and 2012 was NT$379 million, NT$399 million and NT$442 million, respectively.

30. SIGNIFICANT DISASTER LOSS

None.

31. SIGNIFICANT SUBSEQUENT EVENT

On April 25, 2012, in order to achieve its global market objectives, the Company's Board of Directors approved an offer to the stockholders of Best Elite International Limited (Best Elite) to purchase up to 64.97% of the shares of Best Elite. In August 2012, the Company filed an application for the purchase of 51.85% of the shares of Best Elite based on the said shareholders' offering.

Such purchase of 51.85% of the shares of Best Elite was approved on December 21, 2012 in the letter from the Investment Commission of the Ministry of Economic Affairs (Ref. No. Jing-Shen-Er-Zi-10100364120) granting approval for the Company's purchase of Best Elite shares. Pursuant to such approval, the Company acquired an additional 51.85% ownership in Best Elite by way of purchase at fair value for Ordinary shares, Series A-1, Series B and B-1 preferred shares. As of March 31, 2013, the Company's cumulative ownership in Best Elite was 86.88%.

In March, 2013, the Company issued another five-year and seven-year domestic unsecured corporate bonds totaling NT$10,000 million, with a face value of NT$1 million per unit. The five-year domestic unsecured corporate bond was issued in the amount of NT$7,500 million. Interest will be paid annually at 1.35%, and the principal will be repayable in March 2018 upon maturity. The seven-year domestic unsecured corporate bond was issued in the amount of NT$2,500 million. Interest will be paid annually at 1.50%, and the principal will be repayable in March 2020 upon maturity.

On March 29, 2013, the board of UMC Japan, one of the Company's subsidiaries, resolved to dispose its land and buildings.

32. RECLASSIFICATION

None.

33. FINANCIAL INSTRUMENTS

(1) Financial risk management objectives and policies

The Company's principal financial instruments, other than derivatives, are comprised of cash and cash equivalents, common stock, bonds, open-end funds, bank loans, and bonds payable. The main purpose of these financial instruments is to manage financing for the Company's operations. The Company also holds various other financial assets and liabilities such as notes receivable, accounts receivable, notes payable and accounts payable, which arise directly from its operations.

UMC also enters into derivative transactions, including forward currency contracts. The purpose of these derivative transactions is to mitigate foreign currency exchange risks arising from UMC's operations and financing activities.

The main risks arising from the Company's financial instruments include cash flow interest rate risk, foreign currency risk, commodity price risk, credit risk, and liquidity risk.

Cash flow interest rate risk

The Company's bank loans bear floating interest rates. The fluctuation of market interest will result in changes in the Company's future cash flows.

Foreign currency risk

The Company has foreign currency risk arising from purchases or sales. The Company utilizes spot or forward contracts to avoid foreign currency risk. The notional amounts of the foreign currency contracts are the same as the amount of the hedged items. In principle, the Company does not carry out any forward contracts for uncertain commitments.

Commodity price risk

The Company's exposure to commodity price risk is minimal.

Credit risk

The Company only trades with established and creditworthy third parties. It is the Company's policy that all customers who wish to trade on credit terms are subject to credit verification procedures. In addition, note and accounts receivable balances are monitored on an ongoing basis, which consequently minimizes the Company's exposure to bad debts.

With respect to credit risk arising from the other financial assets of the Company, it is comprised of cash and cash equivalents and certain derivative instruments, the Company's exposure to credit risk arising from the default of counter-parties is limited to the carrying amount of these instruments.

Although the Company only trades with established third parties, it will request collateral to be provided by third parties with less favorable financial positions.

Liquidity risk

The Company's objective is to maintain a balance of funding continuity and flexibility through the use of financial instruments such as cash and cash equivalents, bank loans and bonds.

(2) Information of financial instruments

a. Fair value of financial instruments

	As of December 31,			
	2011		2012	
Financial Assets	Book Value	Fair Value	Book Value	Fair Value
	NT$'000	NT$'000	NT$'000	NT$'000
Non-derivative				
Cash and cash equivalents	49,070,128	49,070,128	42,592,725	42,592,725
Financial assets at fair value through profit or loss	815,642	815,642	728,700	728,700
Receivables	15,320,229	15,320,229	17,164,115	17,164,115
Held-to-maturity financial assets	13,524	13,681	—	—
Restricted assets	20,331	20,331	17,135	17,135
Available-for-sale financial assets	23,960,004	23,960,004	19,447,620	19,447,620
Financial assets measured at cost	8,298,967	—	7,963,242	—
Long-term investments accounted for under the equity method	11,275,894	11,182,318	11,792,007	11,818,759
Prepayment for long-term investments	44,392	—	34,803	—
Deposits-out	1,349,528	1,349,528	1,383,327	1,383,327

	As of December 31,			
	2011		2012	
Financial Liabilities	Book Value	Fair Value	Book Value	Fair Value
	NT$'000	NT$'000	NT$'000	NT$'000
Non-derivative				
Short-term loans	9,411,877	9,411,877	5,772,615	5,772,615
Payables	23,284,495	23,284,495	22,430,897	22,430,897
Capacity deposits due within one year	3,031	3,031	34,896	34,896
Bonds payable (current portion included)	17,404,788	15,458,061	26,224,353	25,583,972
Long-term loans (current portion included)	11,692,649	11,692,649	14,817,466	14,817,466
Derivative				
Derivatives embedded in exchangeable bonds	741,531	741,531	767,605	767,605

b. The methods and assumptions used to measure the fair value of financial instruments are as follows:

i. The book values of short-term financial instruments approximate their fair value due to their short maturities. Short-term financial instruments include cash and cash equivalents, receivables, restricted assets, short-term loans, payables and capacity deposits due within one year.

ii. The fair value of financial assets at fair value through profit or loss and available-for-sale financial assets are based on the quoted market prices. If there are restrictions on the sale or transfer of an available-for-sale financial asset, the fair value of the asset will be determined based on similar but unrestricted financial assets' quoted market price with appropriate discounts for the restrictions.

iii. The fair value of held-to-maturity financial assets and long-term investments accounted for under equity method are based on the quoted market prices. If market prices are unavailable, the Company estimates the fair value based on the book values.

iv. The fair value of financial assets measured at cost and prepayment for long-term investments are unable to be estimated since there is no active market in trading those unlisted investments.

v. Deposits-out is certificates of deposit collateralized at Customs or other institutions. The fair value of deposits-out is based on their carrying amount since the deposit periods are primarily within one year and renewed upon maturity.

vi. The fair values of capacity deposits approximates their carrying amounts since the timing of settlements are uncertain and the discounted cash flow approach is not practicable.

vii. The fair value of bonds payable is determined by the market price or other information.

viii. The fair value of long-term loans is determined using discounted cash flow analysis, based on the Company's current incremental borrowing rates for borrowings with similar types.

ix. The fair value of derivative financial instruments is based on the amount the Company expects to receive (positive) or to pay (negative) assuming that the contracts are settled in advance at the balance sheet date or is determined by the market price or other information.

c. The fair value of the Company's financial instruments is determined by the quoted prices in active markets, or if the market for a financial instrument is not active, the Company establishes fair value by using a valuation technique:

	Active Market Quotation		Valuation Technique	
	As of December 31,			
Non-derivative Financial Instruments	2011	2012	2011	2012
	NT$'000	NT$'000	NT$'000	NT$'000
Financial assets				
Financial assets at fair value through profit or loss	815,642	728,700	—	—
Available-for-sale financial assets	23,960,004	19,376,858	—	70,762
Held-to-maturity financial assets	13,681	—	—	—
Long-term investments accounted for under the equity method	77,930	94,922	11,104,388	11,723,837
Financial liabilities				
Bonds payable (current portion included)	—	—	15,458,061	25,583,972
Long-term loans (current portion included)	—	—	11,692,649	14,817,466
Derivative Financial Instruments				
Financial liabilities				
Derivatives embedded in exchangeable bonds	—	—	741,531	767,605

d. For the years ended December 31, 2010, 2011 and 2012, the total change in fair value estimated by using valuation techniques and recognized in the consolidated statement of income were a net gain (loss) of NT$(139) million, NT$1,363 million and NT$(643) million, respectively.

e. During the years ended December 31, 2010, 2011 and 2012, total interest revenues for financial assets or liabilities that are not at fair value through profit or loss were NT$143 million, NT$229 million and NT$211 million, respectively, while interest expense for the years ended December 31, 2010, 2011 and 2012 were NT$352 million, NT$554 million and NT$755 million, respectively.

(3) UMC entered into forward contracts for hedging the exchange rate risk arising from the net assets or liabilities denominated in foreign currency. UMC entered into these derivative financial instruments in connection with its hedging strategy to reduce the market risk of the hedged items, and these financial instruments were not held for trading purpose. The relevant information on the derivative financial instruments entered into by UMC is as follows:

a. Transaction risk

(a) Credit risk

There is no significant credit risk exposure with respect to the above transactions as the counter-parties are reputable financial institutions with good global standing.

(b) Liquidity and cash flow risk

The cash flow requirements on forward contracts are limited to the forward contract's principal amount, which is the same as the underlying net assets or liabilities denominated in their foreign currencies at the settlement day. Therefore, no significant cash flow risk is anticipated since the working capital is sufficient to meet the cash flow requirements.

(c) Market risk

Forward contracts are intended for hedging purposes. Gains or losses arising from the fluctuations in exchange rates are likely to be offset against the gains or losses from the hedged items. As a result, no significant exposure to market risk is anticipated.

b. The presentation of derivative financial instruments in the financial statements is summarized as follows:

As of December 31, 2011 and 2012, the forward contracts were classified as financial assets at fair value through profit or loss amounted to nil, while the forward contracts were classified as financial liabilities at fair value through profit or loss amounted to nil. And for the changes in valuation, net gains (losses) of NT$194 million, NT$(143) million and nil were recorded under non-operating expense for the years ended December 31, 2010, 2011 and 2012, respectively.

(4) The Company uses the equity method to account for its investments in UNITED LED CORPORATION HONG KONG LIMITED, SHENYANG PIONEER U-LIGHTING OPTO-ELECTRONIC CO., LTD., SHANDONG HUAHONG ENERGY INVEST CO., INC., LTI REENERGY CO., LTD., WINAICO SOLAR PROJEKT 1 GMBH, ASEPOWER 1 S.R.L. and SOCIALNEX ITALIA 1 S.R.L., jointly controlled entities, since June 1, 2010, July 6, 2010, January 7, 2011, September 28, 2011, December 7, 2011, March 31, 2012 and March 31, 2012, respectively. Among them, UNITED LED CORPORATION HONG KONG LIMITED, SHENYANG PIONEER U-LIGHTING OPTO-ELECTRONIC CO., LTD. and SOCIALNEX ITALIA 1 S.R.L. ceased to be a jointly controlled entity since October 17, 2011, June 19, 2012 and June 30, 2012. The summarized financial information which the Company recognized is as follows:

Items	As of December 31, 2011	As of December 31, 2012
	NT$'000	NT$'000
Current assets	193,908	279,550
Noncurrent assets	1,316,824	1,092,577
Current liabilities	3,910	107,044
Long-term liabilities	84	504,878

Items	For the years ended December 31, 2011	For the years ended December 31, 2012
	NT$'000	NT$'000
Revenues	136,475	150,858
Expenses	115,640	171,967

(5) The Company acquired controlling interests in UNITED LIGHTING OPTO-ELECTRONIC INC. and SOCIALNEX ITALIA 1 S.R.L. through purchase and business combination in April 2011 and December 2012, respectively, and consolidated the income/earnings and expenses/losses of the subsidiary from the respective acquisition dates. Cash paid for acquisition and cash balance of subsidiaries acquired were as follows:

Items	For the years ended December 31, 2011	For the years ended December 31, 2012
	NT$'000	NT$'000
Cash paid for acquisition of subsidiaries	—	11,857
Less: Remaining cash payable for acquisition	—	(8,300)
Less: Cash balance of subsidiaries	(29,350)	(2,032)
Net cash paid (received) from acquisition of subsidiaries	(29,350)	1,525

(6) The functional currency of UMC and some of its subsidiaries is New Taiwan Dollar, while other subsidiaries have functional currencies in US Dollar, Japanese Yen or Chinese RMB. The exchange rates used to translate assets and liabilities denominated in foreign currencies are disclosed as follows:

	As of December 31, 2011			As of December 31, 2012		
	Foreign Currency (thousand)	Exchange Rate	NTD (thousand)	Foreign Currency (thousand)	Exchange Rate	NTD (thousand)
Financial Assets						
Monetary items						
USD	$ 1,205,374	30.20	$36,401,034	$ 1,494,046	28.97	$43,281,274
JPY	17,724,488	0.3887	6,888,793	11,346,947	0.3343	3,792,840
EUR	11,088	39.07	433,230	8,333	38.09	317,432
SGD	36,370	23.22	844,517	35,696	23.66	844,562
CNY	47,833	4.79	229,150	72,813	4.61	335,485
Non-Monetary items						
USD	80,903	30.21	2,444,092	44,993	28.98	1,303,900
CHF	1,764	32.10	56,624	2,324	31.73	73,741
Long-term investments accounted for under the equity method						
USD	223,950	30.17	6,757,058	254,210	28.94	7,357,606
SGD	9,313	23.08	214,918	8,089	23.37	189,012
Joint controlled entities						
EUR	1,120	40.69	45,573	1,192	38.28	45,647
CNY	155,324	4.70	729,461	149,297	4.61	688,008
Financial Liabilities						
Monetary items						
USD	687,961	30.31	20,851,703	649,042	29.08	18,874,144
JPY	7,486,308	0.3924	2,937,409	7,072,521	0.3386	2,394,756
EUR	7,230	39.36	284,563	6,931	38.68	268,109
SGD	25,851	23.40	604,925	30,192	23.84	719,785
CNY	21,482	4.81	103,337	33,241	4.62	153,688

34. PRE-DISCLOSURE FOR ADOPTION OF INTERNATIONAL FINANCIAL REPORTING STANDARDS

a. In accordance with Financial Supervisory Commission, Executive Yuan, R.O.C. (FSC), Announcement No. 0990004943, listed, over-the-counter and emerging stock companies should adopt International Financial Reporting Standards (IFRSs) which is translated and published by ARDF, as the criteria for preparation of financial reports, effective starting 2013. As such, a special project team was assembled and a project plan was developed to adopt IFRSs. Chitung Liu, the Chief Financial Officer is responsible for the coordination of the project.

The following table summarizes the progress to date against the key activities and target dates of the conversion plan:

Key Activity	Responsible Department	Progress to December 31, 2012
1. Assessment phase: (From June 1, 2009 to December 31, 2011)		
• Development of the adoption plan and assembly of project team	Accounting Department	Completed
• Internal IFRSs trainings for employees – First stage	Accounting Department	Completed
• Comparison and analysis of differences between R.O.C. SFAS and IFRSs accounting policies	Accounting Department	Completed
• Assessment on adjustments to current accounting policies	Accounting Department	Completed
• Assessment on selection of IFRSs 1 “First-time Adoption of International Financial Reporting Standards” optional exemptions	Accounting Department	Completed
• Assessment of changes required in the information systems and internal controls related to the adoption of IFRSs	Internal Audit Department and IT Department	Completed
2. Preparation phase: (From January 1, 2011 to December 31, 2012)		
• Adjustments on existing accounting policies to conform with IFRSs	Accounting Department	Completed
• Selection of IFRS 1 “First-time Adoption of International Financial Reporting Standards” optional exemptions	Accounting Department	Completed
• Modifications to information systems and internal control related to the adoption of IFRSs	Internal Audit Department and IT Department	Completed
• Internal IFRSs trainings for employees – Second stage	Accounting Department	Completed

Key Activity	Responsible Department	Progress to December 31, 2012
3. Execution phase: (From January 1, 2012 to December 31, 2013)		
• Implementation test of modified information system related to the adoption of IFRSs	IT Department	In preparation
• Preparation of IFRSs opening balance sheet and opening financial statements	Accounting Department	In preparation
• Preparation of comparative IFRSs financial statements	Accounting Department	In preparation

b. The major differences and influences assessed by the Company between accounting policies under R.O.C. SFAS and future adopted IFRSs are summarized as below:

(a) The Company assesses the material differences in accounting polices based on the IFRSs as approved by the FSC and the Guidelines Governing the Preparation of Financial Reports by Securities Issuers expected to become effective in 2013.

Accounting Issue	Difference
Employee benefits	Under IFRSs, the Company elects as an accounting policy to recognize all actuarial gains and losses in the period in which they occur in other comprehensive income and then recognized immediately in retained earnings. In accordance with R.O.C. SFAS, actuarial gains and losses from each defined benefit plan shall be applied the corridor method and assessed to determine if there was any excess amount which to be recognized as current period gains or losses on each reporting date.
Investments in Associates	Under IFRSs, an investor shall discontinue the use of the equity method from the date when it ceases to have significant influence over an associate and shall account for as financial instrument under relevant standards. On the loss of significant influence, the investor shall measure at fair value any investment the investor retains in the former associate. The investor shall recognize in profit or loss any difference between: (a) the fair value of any retained investment and any proceeds from disposing of the part interest in the associate; and (b) the carrying amount of the investment at the date when significant influence is lost. Moreover, an investor shall derecognize for all additional paid-in capital and equity adjustment items related to the former associate to current profit and loss, the cash dividend received thereafter shall be treated as dividend income.

Accounting Issue	Difference
	In accordance with R.O.C. SFAS, an investor shall discontinue the use of the equity method from the date when it ceases to have significant influence over an associate. The new investment cost should be the carrying amount of the former associate on the loss of significant influence. The additional paid-in capital and other equity adjustment items related to the former associate should be proportionately derecognized to current profit and loss, and the difference between the carrying amount plus the equity adjustment items and the amount proceed from the disposal shall be recognized as the disposal gain or loss. Any cash dividends received after the loss of significant influence, should be treated as the recovery of investment cost if the accumulated dividend amount was greater than the investor's holding interest in the former associate. Under R.O.C. SFAS, when the Company does not take up proportionately shares of its equity investee's issuance of new shares, the change in equity in net assets for the investment shall be adjusted in the additional paid-in capital and the long-term investments accounts. However, in accordance with IFRSs, for increase in shareholding (deemed acquisition), any difference between the cost of the investment and the investor's share of the net fair value of the associate's identifiable assets and liabilities is treated as goodwill and included in the carrying amount of the investment.
Business Combinations and Consolidated and Separate Financial Statements	In accordance with IFRSs, in a business combination achieved in stages, the acquirer shall remeasure its previously held equity interest in the acquiree at its acquisition-date fair value and recognize the resulting gain or loss, if any, in profit or loss or other comprehensive income, as appropriate. The acquirer shall recognize goodwill or gain on bargain purchase as of the acquisition date measured as the excess of (a) over (b) below: (a) the aggregate of: (i) the consideration transferred which generally is the fair value on acquisition date (ii) the fair value of acquiree's non-controlling interest, and (iii) in a business combination achieved in stages, the acquisition-date fair value of the acquirer's previously held equity interest in the acquiree. (b) the fair value of identifiable assets acquired and the liabilities assumed on acquisition date. In accordance with R.O.C. SFAS, goodwill is measured separately on each acquisition, and it excludes goodwill in non-controlling interest. In a step acquisition, the acquirer does not remeasure its previously held equity interest in the acquiree, therefore the acquisition would not result in gains or losses from remeasurements. In accordance with IFRSs, changes in a parent's ownership interest in a subsidiary which do not result in the loss of control is treated as an equity transaction. In accordance with R.O.C. SFAS, acquiring part of or all shares from subsidiaries' minority stockholders, shall be accounted for using acquisition method. When selling long-term investments accounted for under equity method, the differences between selling price and carrying amount shall be recognized as gains or losses at disposal of long-term equity investment.

Accounting Issue	Difference
Financial Instruments	In accordance with IFRSs, an entity is precluded from measuring the financial asset at fair value if the range of reasonable fair value estimates is significant and the probabilities of the various estimates cannot be reasonably assessed. Prior to adoption of IFRSs, in accordance with Criteria Governing the Preparation of Financial Reports by Securities Issuer, unlisted or emerging stock companies shall be classified as financial assets measured at cost. After adoption of IFRSs, unlisted and emerging stock companies will be reassessed in accordance with IFRSs and reclassified into available-for-sale financial assets or financial assets designated at fair value through profit or loss, or held for trading.

(b) The preliminary assessment on the quantitative impacts of the material differences between the existing accounting policies and the accounting policies to be adopted under IFRSs and the Guidelines Governing the Preparation of Financial Reports by Securities Issuers is as follows:

I. Reconciliation of the balance sheet as at January 1, 2012

	R.O.C. GAAP	Adjustments	IFRSs
	NT$'000	NT$'000	NT$'000
Current assets (b)(f)	84,057,514	(303,514)	83,754,000
Available-for-sale financial assets, non-current (a)	18,835,224	4,609,323	23,444,547
Financial assets measured at cost, non-current (a)	8,298,967	(5,245,009)	3,053,958
Property, plant and equipment (b)(c)	149,324,300	(7,462,738)	141,861,562
Intangible Assets (d)	350,860	1,132,921	1,483,781
Other non-current assets (a)(b)(c)(d)(f)(g)	18,964,881	8,755,129	27,720,010
Total Assets	279,831,746	1,486,112	281,317,858
Current liabilities (f)(g)	42,905,954	(66,178)	42,839,776
Accrued pension liabilities (e)	3,261,101	704,651	3,965,752
Other non-current liabilities(f)(g)	21,539,728	413,061	21,952,789
Total liabilities	67,706,783	1,051,534	68,758,317
Capital	130,844,556	—	130,844,556
Additional paid-in capital (a)(f)(g)	46,460,665	(100,746)	46,359,919
Retained earnings (a)(b)(c)(e)(f)(g)	24,499,124	575,195	25,074,319
Other items in stockholders' equity (a)(b)(c)(e)(f)(g)	12,156,099	(39,871)	12,116,228
Treasury stock	(6,223,357)	—	(6,223,357)
Minority interests/Non-controlling interests	4,387,876	—	4,387,876
Stockholders' equity	212,124,963	434,578	212,559,541

(a). Under IFRSs, the Company reclassified non-current financial assets measured at cost to non-current available-for-sale financial assets measured at fair value. In addition, when the Company discontinues the use of the equity method because it ceases to have significant influence over an associate, the Company measures at fair value any investment it retains in the former associate as well as eliminate all additional paid-in capital and equity adjustment items related to the former associate in current profit and loss, or at the date of transition to IFRSs recognized in retained earnings. This change in accounting principles caused non-current available-for-sale financial assets to increase by NT$4,609 million, non-current financial assets measured at cost to decrease by NT$5,245 million, other non-current assets to decrease by NT$15 million, additional paid-in capital to decrease by NT$0.3 million, retained earnings to decrease by NT$538 million, and other adjusting items in stockholders' equity to decrease by NT$113 million.

(b). Under IFRS, the acquisition of a non-controlling interest is not within the scope of business combination, and therefore, it is not in the scope of exemptions for business combination in IFRS 1, “First-time Adoption of International Financial Reporting Standards.” As a result, a retroactive adjustment is required to adjust the differences for acquisitions of non-controlling interests prior to the transition date. This change in accounting principles would cause current assets to decrease by NT$6 million, property, plant and equipment, net to increase by NT$1,754 million, other non-current assets to increase by NT$36 million, retained earnings to increase by NT$1,694 million and other adjusting in stockholders’ equity to increase by NT$90 million.

(c). Under R.O.C. SFAS, the Company’s property that is leased to another entity is recorded as rental property under other non-current assets. Under IFRSs, the Company reclassified these assets from other non-current assets to property, plant and equipment as they do not meet the definition of investment property. In addition, prepayment for equipment is reclassified from property, plant and equipment to other non-current assets as they do not meet the definition of property, plant and equipment. This change in accounting principles would cause property, plant and equipment, net to decrease by NT$9,308 million, other non-current assets to increase by NT$9,308 million while other adjustments would cause property, plant and equipment, net to increase by NT$92 million, other non-current assets decrease by NT$62 million, retained earnings to increase by NT$29 million and other adjusting in stockholders’ equity to increase by NT$2 million.

(d). Software, patent licenses and intellectual property are reclassified as intangible assets as it met the definition of intangible assets. This change would cause intangible assets to increase by NT$1,433 million and other non-current assets to decrease by NT$1,433 million. The land use rights of a subsidiary are reclassified to other non-current assets as they meet the definition of long-term operating lease since the ownership do not belong to the subsidiary. This would cause intangible assets to decrease by NT$300 million and other non-current assets to increase by NT$300 million.

(e). The Company elects exemption for employee benefits under the IFRS 1, “First-time Adoption of International Financial Reporting Standards”, and recognizes all unrecognized actuarial gains and losses in retained earnings. The exemption election for employee benefits would cause the accrued pension liabilities to increase by NT$705 million and retained earnings to decrease by NT$686 million, and decrease other adjusting items in stockholders’ equity by NT$19 million.

(f). Under the requirements of IAS 1 "Presentation of Financial Statements", deferred tax assets or liabilities are classified as non-current. Therefore, deferred tax assets or liabilities, current, are reclassified as non-current. Under the requirements of IAS 12, an entity shall offset deferred tax assets and liabilities if, and only if, the entity has a legally enforceable right to set off the current tax assets and liabilities; and if the deferred tax assets and liabilities relate to income taxes raised by the same taxation authority on either the same taxable entity or different taxable entities which intend, in each future period in which significant amounts of deferred tax are expected to be settled or recovered, to settle their current tax assets and liabilities either on a net basis or simultaneously. Under the requirements of IAS 12, if the tax base of the liability component of the compound financial instrument on initial recognition is equal to the initial carrying amount of the sum of the liability and equity components, the resulting taxable temporary differences should be recognized as deferred tax liability. The deferred tax is charged directly to the carrying amount of the equity component and subsequent changes in the deferred tax liability are recognized in profit or loss as deferred tax expense (income). Due to differences discussed above, current assets decreased by NT$298 million, other non-current assets increased by NT$656 million, current liabilities decreased by NT$33 million, other non-current liabilities increased by NT$380 million, addition paid-in capital decreased by NT$101 million, retained earnings increased by NT$106 million and other adjusting items in stockholders' equity increased by NT$6 million.

(g). Other adjustments would cause other non-current assets to decrease by NT$36 million, current liabilities to decrease by NT$33 million, other non-current liabilities to increase by NT$33 million, retained earnings to decrease by NT$30 million, additional paid-in capital to increase by NT$0.4 million and other adjusting items in stockholders' equity to decrease by NT$6 million.

II. Reconciliation of the balance sheet as at December 31, 2012

	R.O.C. GAAP	Adjustments	IFRSs
	NT$'000	NT$'000	NT$'000
Current assets (f)	80,917,522	(890,391)	80,027,131
Available-for-sale financial assets, non-current (a)(h)	15,116,740	4,858,997	19,975,737
Financial assets measured at cost, non-current (a)(h)	7,963,242	(4,801,124)	3,162,118
Property, plant and equipment (b)(c)	158,854,035	1,089,770	159,943,805
Intangible Assets (d)	1,357,492	1,440,667	2,798,159
Other non-current assets (b)(c)(d)(e)(f)(h)	16,749,887	381,868	17,131,755
Total Assets	280,958,918	2,079,787	283,038,705
Current liabilities (e)(f)	40,033,821	86,691	40,120,512
Accrued pension liabilities (e)	3,366,143	873,100	4,239,243
Other non-current liabilities(f)	32,538,009	1,609,901	34,147,910
Total liabilities	75,937,973	2,569,692	78,507,665
Capital	129,521,093	—	129,521,093
Additional paid-in capital (a)(f) (h)	46,994,672	(94,146)	46,900,526
Retained earnings (a)(b)(c)(e)(f)(g)(h)	25,905,225	(1,414,989)	24,490,236
Other items in stockholders' equity(a)(b)(c)(e)(f)(g)(h)	4,992,205	1,019,230	6,011,435
Treasury stock	(4,963,389)	—	(4,963,389)
Minority interests/Non-controlling interests	2,571,139	—	2,571,139
Stockholders' equity	205,020,945	(489,905)	204,531,040

(a). Under IFRSs, the Company reclassified non-current financial assets measured at cost to non-current available-for-sale financial assets measured at fair value. In addition, when the Company discontinues the use of the equity method because it ceases to have significant influence over an associate, the Company measures at fair value any investment the it retains in the former associate as well as eliminates all additional paid-in capital and equity adjustment items related to the former associate in current profit and loss, or at the date of transition to IFRSs recognized immediately in retained earnings. This change in accounting principles caused non-current available-for-sale financial assets to increase by NT$4,854 million, non-current financial assets measured at cost to decrease by NT$4,804 million, additional paid-in capital to decrease by NT$3 million, retained earnings to decrease by NT$929 million, and other adjusting items in stockholders' equity to increase by NT$982 million.

(b). Under IFRS, the acquisition of a non-controlling interest is not within the scope of business combination, and therefore, it is not in the scope of exemptions for business combination in IFRS 1, "First-time Adoption of International Financial Reporting Standards". As a result, a retroactive adjustment is required to adjust the differences for acquisitions of non-controlling interests prior to the transition date. This change in accounting principles would cause property, plant and equipment, net to increase by NT$383 million, other non-current assets to increase by NT$25 million, retained earnings to increase by NT$443 million and other adjusting in stockholders' equity to decrease by NT$35 million.

(c). Under R.O.C. SFAS, the Company's property that is leased to another entity is recorded as rental property under other non-current assets. Under IFRSs, the Company reclassified these assets from other non-current assets to property, plant and equipment as it does not meet the definition of investment property. In addition, prepayment for equipment is reclassified from property, plant and equipment to other non-current assets as they do not meet the definition of property, plant and equipment. This change in accounting principles would cause property, plant and equipment, net to increase by NT$654 million, other non-current assets to decrease by NT$654 million while other adjustments would cause property, plant and equipment, net to increase by NT$53 million, other non-current assets decrease by NT$53 million, retained earnings to decrease by NT$0.1 million and other adjusting in stockholders' equity to increase by NT$0.1 million.

(d). Software, patent licenses and intellectual property are reclassified as intangible assets as it met the definition of intangible assets. This change would cause intangible assets to increase by NT$1,469 million and other non-current assets to decrease by NT$1,469 million. The land use rights of a subsidiary are reclassified to other non-current assets as they meet the definition of a long-term operating lease since the ownership do not belong to the subsidiary. This would cause intangible assets to decrease by NT$29 million and other non-current assets to increase by NT$29 million.

(e). The Company elects the exemption for employee benefits under IFRS 1,"First-time Adoption of International Financial Reporting Standards", and recognizes all unrecognized actuarial gains and losses in retained earnings. The exemption election for employee benefits would cause other non-current assets to increase by NT$81 million, current liability to increase by NT$87 million, accrued pension liabilities to increase by NT$873 million, retained earnings to decrease by NT$885 million, and other adjusting items in stockholders' equity to increase by NT$7 million.

(f). Under the requirements of IAS 1 “Presentation of Financial Statements”, deferred tax assets or liabilities are classified as non-current. Therefore, deferred tax assets or liabilities, current, are reclassified as non-current. Under the requirements of IAS 12, an entity shall offset deferred tax assets and liabilities if, and only if, the entity has a legally enforceable right to set off the current tax assets and liabilities; and if the deferred tax assets and liabilities relate to income taxes raised by the same taxation authority on either the same taxable entity or different taxable entities which intend, in each future period in which significant amounts of deferred tax are expected to be settled or recovered, to settle their current tax assets and liabilities either on a net basis or simultaneously. Under the requirements of IAS 12, if the tax base of the liability component of the compound financial instrument on initial recognition is equal to the initial carrying amount of the sum of the liability and equity components, the resulting taxable temporary differences should be recognized as deferred tax liability. The deferred tax is charged directly to the carrying amount of the equity component and subsequent changes in the deferred tax liability are recognized in profit or loss as deferred tax expense (income). Due to differences discussed above, current assets decreased by NT$890 million, other non-current assets increased by NT$2,445 million, current liabilities decreased by NT$0.016 million, other non-current liabilities increased by NT$1,610 million, addition paid-in capital decreased by NT$100 million, retained earnings increased by NT$89 million and other adjusting items in stockholders’ equity decreased by NT$45 million.

(g). The Company decreased its equity interests in a foreign operation through capital reduction and return of capital, the proportional differences of the accumulated currency translation adjustments before and after the capital reduction is recognize in profit or loss under R.O.C. SFAS. Under IAS 21, as the entity did not lose control, significant influence or joint control over its foreign operation, it is not considered a partial disposal. Accordingly, none of the accumulated currency translation adjustments was reclassified to profit or loss. This difference result in a decrease of retained earnings by NT$233 million and an increase in other adjusting items in stockholders’ equity by NT$233 million.

(h). Other adjustments would cause non-current available-for-sale financial assets to increase by NT$5 million, non-current financial assets measured at cost to increase by NT$3 million, other non-current assets to decrease by NT$22 million, addition paid-in capital to increase by NT$9 million, retained earnings to increase by NT$100 million and other adjusting items in stockholders' equity to decrease by NT$123 million.

III. Reconciliation of the income statement for the year ended December 31, 2012:

	R.O.C. GAAP NT$'000	Adjustments NT$'000	IFRSs NT$'000
Operating revenues	115,674,763	—	115,674,763
Operating costs (a)(c)	(96,262,902)	(102,313)	(96,365,215)
Gross profit	19,411,861	(102,313)	19,309,548
Operating expenses (a)(c)	(15,907,230)	241,476	(15,665,754)
Other operating income and expenses (c)	—	(2,790,775)	(2,790,775)
Operating income	3,504,631	(2,651,612)	853,019
Non-operating income and expenses (a)(b)(c)	4,498,328	1,026,237	5,524,565
Income from continuing operations before income tax	8,002,959	(1,625,375)	6,377,584
Income tax expense (c)	(2,129,038)	(16,945)	(2,145,983)
Net income	5,873,921	(1,642,320)	4,231,601

(a). Under IFRS, the acquisition of a non-controlling interest is not within the scope of business combination, and therefore, it is not in the scope of exemptions for business combination in IFRS 1, "First-time Adoption of International Financial Reporting Standards". As a result, a retroactive adjustment is required to adjust the differences for acquisitions of non-controlling interests prior to the transition date. This would cause cost of goods sold to increase by NT$75 million, operating expenses to increase by NT$2 million and non-operating income to decrease by NT$1,174 million.

(b). The Company decreased its equity interests in a foreign operation through capital reduction and return of capital, the differences of the accumulated currency translation adjustments before and after the capital reduction is recognize in profit or loss under R.O.C. SFAS. Under IAS 21, as the entity did not lose control, significant influence or joint control over its foreign operation, it is not considered a partial disposal. Accordingly, none of the accumulated currency transaction adjustments was reclassified to profit or loss. This difference resulted in a decrease in non-operating income by NT$233 million.

(c). Other adjustments would cause cost of goods sold to increase by NT$27 million, operating expenses to decrease by NT$243 million, other operating expenses to increase by NT$2,791 million, non-operating income to increase by NT$2,433 million and income tax expense to increase by NT$17 million.

c. According to the requirements under IFRS 1, “First-time Adoption of International Financial Reporting Standards”, the Company prepares its first IFRS financial statements based on the effective IFRS standards and makes adjustments retrospectively, except for the optional exemptions provided and mandatory exceptions required under IFRS 1. The optional exemptions selected by the Company are as follows:

(a) IFRS 3 “Business Combinations” has not been applied to acquisitions of subsidiaries or of interests in associates and joint ventures, that occurred before December 31, 2011. Applying this exemption would result in the carrying amount of assets acquired and liabilities assumed in the business combination in accordance with previous GAAP, which are required to be recognized under IFRS, to be their deemed costs in accordance with IFRSs as at the date of acquisition. Subsequent to the date of acquisition, the assets and liabilities would be measured in accordance with IFRSs. The carrying amount of goodwill in the opening IFRS Balance Sheet is its carrying amount in accordance with previous GAAP at December 31, 2011, after testing for impairments and adjusting for recognition or de-recognition of intangibles under IFRS 1.

(b) The Company has recognized all cumulative actuarial gains and losses directly to retained earnings as at January 1, 2012.

d. The major differences described above are determined in accordance with the Traditional Chinese version of IFRSs approved and published by FSC in 2010. As to the additional IFRSs published by International Accounting Standards Board after 2011, adjustments will be included, following effective dates announced by the FSC, if any.

35. OPERATING SEGMENT INFORMATION

(1) Operations in different industries

The Company determined its operating segments based on business activities with discrete financial information regularly reported through the Company's internal reporting protocols to the Company's chief operating decision maker. The Company is organized into business units based on its products and services. As of December 31, 2012, the Company had the following segments: wafer fabrication and other. The primary service of the wafer fabrication segment is the manufacture of chips to the design specifications of our many customers by using our own proprietary processes and techniques. The company maintains a diversified customer base across industries, including communication, consumer electronics, computer, memory and others, while continuing to focus on manufacturing for high growth, large volume applications, including networking, telecommunications, internet, multimedia, PCs and graphics. The other segment primarily includes researching, developing, manufacturing, and providing solar energy and new generation light-emitting diode (LED), each of which discrete financial information was not regularly reported to the Company's chief operating decision maker separately.

Reportable segment information for the years ended December 31, 2011 and 2012 are as follows:

	For the year ended December 31, 2011				
	Wafer fabrication	Other	Subtotal	Adjustment and elimination	Consolidated
	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000
Segment revenues	108,637,136	8,068,373	116,705,509	(2,786)	116,702,723
Segment profit (loss)	10,431,014	(5,104,211)	5,326,803	3,140,113	8,466,916
Segment assets	260,337,674	29,505,139	289,842,813	(10,011,067) (Note)	279,831,746
Segment liabilities	52,090,012	15,651,907	67,741,919	(35,136)	67,706,783
Capital expenditure	46,865,115	6,461,000	53,326,115	—	53,326,115
Depreciation	30,239,235	1,675,833	31,915,068	—	31,915,068
Investment gain (loss) accounted for under the equity method	(3,158,287)	(294,087)	(3,452,374)	3,140,113	(312,261)
Income tax expense	868,431	45,004	913,435	—	913,435

	For the year ended December 31, 2012				
	Wafer fabrication	Other	Subtotal	Adjustment and elimination	Consolidated
	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000
Segment revenues	108,805,499	6,871,377	115,676,876	(2,113)	115,674,763
Segment profit (loss)	7,498,447	(5,501,437)	1,997,010	3,876,911	5,873,921
Segment assets	267,116,399	20,352,264	287,468,663	(6,509,745) (Note)	280,958,918
Segment liabilities	63,876,180	12,062,932	75,939,112	(1,139)	75,937,973
Capital expenditure	51,403,596	782,314	52,185,910	—	52,185,910
Depreciation	32,871,684	2,139,728	35,011,412	—	35,011,412
Investment gain (loss) accounted for under the equity method	(2,757,382)	(434,389)	(3,191,771)	3,910,298	718,527
Income tax expense	2,078,176	50,862	2,129,038	—	2,129,038

Note: The adjustment was primarily consisted of elimination entries for long-term investments accounted for under the equity method.

(2) Operations in different geographic areas

The geographic region to which revenue is assigned is based on the location of the external customers.

	For the years ended December 31,					
	2010		2011		2012	
	Net operating revenues	Long-lived assets	Net operating revenues	Long-lived assets	Net operating revenues	Long-lived assets
	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000
Taiwan	42,496,346	99,747,115	38,668,443	119,881,448	42,129,998	138,801,028
Singapore	36,464,132	34,109,669	28,960,294	29,992,937	32,048,567	21,989,707
China (includes Hong Kong)	4,240,244	3,204	4,860,475	300,656	6,081,805	3,449
Japan	2,619,626	1,906,803	2,249,313	2,307,902	2,918,334	500,336
America	21,343,348	29,092	20,908,177	20,905	15,370,089	16,406
Others	19,277,848	1,684	21,056,021	1,855	17,125,970	181,897
	126,441,544	135,797,567	116,702,723	152,505,703	115,674,763	161,492,823

36. U.S. GAAP RECONCILIATION

The accompanying consolidated financial statements have been prepared in conformity with generally accepted accounting principles in the Republic of China (R.O.C. GAAP), which differ in certain material respects from generally accepted accounting principles in the United States (U.S. GAAP). Such differences are disclosed below.

(1) Compensation

Employee bonus

Pursuant to the Company's Articles of Incorporation (AOI), certain employees of the Company are entitled to minimum bonus when certain objectively determinable financial criteria are met as at the year-end. The Company's AOI specifies that employee bonus can be settled in the form of cash or common shares or a combination of both, subject to stockholders' approval at the annual stockholder's meeting in the subsequent year. Under both R.O.C. and U.S. GAAP, employee bonus is charged to compensation expense and accrued based on management's estimate. The employee bonus is initially accrued during the current year based on management's estimate according to AOI with adjustment in the subsequent year after stockholders' approval. Compensation expense relating to stock bonus is determined based on the fair market value of the Company's common stock on the grant date. According to the R.O.C. ARDF Interpretation 96-052, "Accounting for Employee Bonus and Remunerations to Directors and Supervisors", compensation expense relating to stock bonus is determined based on the fair value of the Company's common stock at the date before the stockholders' meeting. Under U.S. GAAP, compensation expense relating to stock bonus is measured at the fair market value on the date of stock distribution.

Employee stock options

Under R.O.C. GAAP, for stock options granted prior to January 1, 2008, the Company applied the intrinsic value method to recognize the difference between the market price of the stock at grant date and the exercise price of its employee stock options as compensation expense. For stock options granted on or after January 1, 2008, the Company adopted R.O.C. SFAS 39 to recognize compensation cost using the fair value method which is consistent with U.S. GAAP. The Company amortized share-based compensation expense over the vesting period based on the grant-date fair value. The fair value of liability awards is remeasured at each reporting date with fair value changes charged to compensation expenses accordingly. Compensation expense is recognized on a graded-vesting basis over the requisite service period of the options.

The Company uses Black-Scholes option-pricing model in estimating the fair value of stock options. The main inputs and assumptions used in the model include the grant date stock price, exercise price of the option, volatility of the Company's stock, the expected option term, the risk-free rate and the Company's dividend yield. The Company determines expected volatility based on historical stock price volatility over the time period equal to the expected term of the employee stock options because the Company's shares have been publicly traded for a long time and determines the expected term based on historical stock option exercise data. The Company uses the average yield at grant date of Taiwan Government Bond with the remaining term similar to the expected option term as the risk-free interest rate. In addition, the Company used the historical distribution of cash dividends and the historical average market price of the Company's common stock to estimate future dividend yields. The estimates of option fair value are not expected to foresee future events or the values realized by employees who receive stock option. In addition, later events are not indicative of the rationality of the initial estimates of option fair value used by the Company.

The Company adjusts share-based compensation on an annual basis for changes in expected forfeitures based on the examination of latest employee stock options forfeiture activity. The effect of adjusting the forfeiture rate used for expense amortization is recognized in the corresponding period that the expected forfeiture rate is changed.

A summary of employee stock options activities as of December 31, 2012 and changes during the year then ended is presented below:

	For the year ended December 31, 2012			
	Number of options	Available shares (adjusted for capital reduction)	Weighted-average exercise price per share as adjusted	
	(In thousands)	(In thousands)	NT$	US$
Outstanding at beginning of period	560,526	547,724	16.09	0.55
Granted	—	—	—	—
Exercised	(25,588)	(25,588)	10.40	0.36
Forfeited	(38,969)	(35,544)	18.23	0.63
Expired	(30,963)	(21,586)	24.37	0.84
Outstanding at end of period	465,006	465,006	15.86	0.55
Fully vested and expected to vest at end of period	458,288	458,288	15.94	0.55
Exercisable at end of period	395,142	395,142	16.71	0.58

As of December 31, 2012, the total number of option units outstanding was 465 million units, the exercise price of the two remaining outstanding option plans were NT$10.40 and NT$18.03, respectively. The weighted-average remaining contractual life of outstanding options, fully vested and expected to vest options, and exercisable options was 1.38 years, 1.36 years and 1.21 years, respectively.

There have been no stock options granted since 2010. The total intrinsic value of the options exercised during 2010, 2011 and 2012 was nil, NT$222 million and NT$33 million, respectively. The total fair value of options vested during 2010, 2011 and 2012 was NT$574 million, NT$842 million and NT$181 million, respectively. Aggregate intrinsic value of outstanding options, fully vested and expected to vest options, and exercisable options at December 31, 2012 was NT$172 million, NT$163 million, and NT$89 million, respectively. As of December 31, 2012, unrecognized compensation expenses related to nonvested options granted under the employee stock options plan totaled NT$20 million. The weighted-average period of expense expected to be recognized is 0.46 years.

Under U.S. GAAP, the total share-based compensation effects in income and capitalization as part of inventory relating to employee stock options and treasury stock purchased by employees are summarized as follows:

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Net effects in income	(1,006,152)	(912,934)	(226,301)
Net effects on inventory capitalization	64,177	30,649	10,768

The following tables reflect the above noted differences between U.S. GAAP and R.O.C. GAAP relating to compensations:

	For the years ended December 31,		
	2010	2011	2012
	NT$'000	NT$'000	NT$'000
Net income impact of compensation adjustments:			
Employee stock options	(363,953)	(77,592)	(6,838)
Allocation to inventories, net of prior period allocations to inventories which are sold in current period	(32,898)	(27,950)	(3,029)
Total U.S. GAAP adjustment to net income relating to compensation	(396,851)	(105,542)	(9,867)

	As of December 31,	
	2011	2012
	NT$'000	NT$'000
Stockholders' equity impact of compensation adjustments:		
Employee stock options	3,567	538
Total U.S. GAAP adjustment to stockholders' equity relating to compensation	3,567	538

(2) Equity investees—Variance between U.S. GAAP and R.O.C. GAAP

The Company's proportionate share of the income (loss) and stockholders' equity from an equity investee under R.O.C. GAAP may differ from U.S. GAAP if the equity investee's net income (loss) and stockholders' equity are different under the two GAAPs. Those differences for the equity investees include accounting for compensation, income tax and investments in debt and equity securities.

(3) Investments in debt and equity securities

Change in fair value of investments

Unrealized gains (losses) on trading securities held at December 31, 2010, 2011 and 2012 was NT$(590) million, NT$(104) million and NT$11 million, respectively.

Investment in restricted stock, for which sale is restricted by governmental or contractual requirement is accounted for as an available-for-sale security or a cost method investment under R.O.C. GAAP, and its fair value should be adjusted for the effect of restriction. Under U.S. GAAP, however, a restricted investment with restricted period over one year does not meet the definition of an equity security with readily determinable fair value, and therefore, it is accounted for as a cost method investment. In 2011, certain investments were reclassified from cost method investment under R.O.C. GAAP to available-for-sale securities under U.S. GAAP as the restricted period of these investments terminates within one year from the reporting date. The Company recorded an adjustment to decrease other comprehensive income by NT$63 million as of December 31, 2011. These restricted investments were also classified as available-for-sale securities under R.O.C. GAAP at December 31, 2012, because the restriction expired in 2012.

When the Company loses its significant influence on an investment accounted for under the equity method and reclassifies it as an available-for-sale security, the proportionate share of an investee’s equity adjustments for other comprehensive income should remain as a part of the carrying amount of the investment under R.O.C. GAAP and the dividends received from the available-for-sale security which were declared from pre-acquisition profits are deducted from the cost of the security. However, under U.S. GAAP, all of the investee’s equity adjustments for other comprehensive income should be offset against the carrying amount of the investment at the time significant influence is lost, and the dividends received from the available-for-sale security are accounted for as dividend income. Accordingly, the accumulated other comprehensive income related to the unrealized gains on the same group of available-for-sale securities for each of the years ended December 31, 2010, 2011 and 2012, was decreased by NT$975 million, NT$975 million and NT$981 million, respectively. The difference in cost basis resulted in an adjustment to increase (decrease) disposal gain of NT$(1) million, NT$0.1 million and NT$6 million for the years ended December 31, 2010, 2011 and 2012, respectively, under U.S. GAAP for the disposal of these investments.

Information on sales of available-for-sale equity securities for the years ended December 31, 2010, 2011 and 2012 is as follows:

	Proceeds from sales	Gross realized gains	Gross realized losses
	NT$’000	NT$’000	NT$’000
For the year ended December 31, 2010	3,694,372	1,959,472	—
For the year ended December 31, 2011	3,254,897	1,464,505	—
For the year ended December 31, 2012	4,888,442	3,521,415	48,048

Information on available-for-sale equity securities, including depositary receipts and funds, held at each balance sheet date is as follows:

	Fair Value	Total unrealized gains	Total unrealized losses	Net unrealized gains	Adjusted Cost
	NT$’000	NT$’000	NT$’000	NT$’000	NT$’000
As of December 31, 2010	37,298,738	23,853,204	45,951	23,807,253	13,491,485
As of December 31, 2011	24,054,645	12,141,186	393,001	11,748,185	12,306,460
As of December 31, 2012	19,447,620	8,309,078	85,435	8,223,643	11,223,977

As of December 31, 2011 and 2012, the Company had nine and four investments, respectively, with gross unrealized losses of NT$393 and NT$85 million, respectively, on available-for-sale equity securities with fair value of NT$972 million and NT$443 million, respectively. There were no significant investments that had been in a continuous loss position for 12 months or more as of December 31, 2011 and 2012. For the years ended December 31, 2010, 2011 and 2012, NT$1,959 million, NT$1,430 million and NT$4,748 million, respectively, was reclassified from other comprehensive income to the consolidated statements of income upon the disposal or impairment of available-for-sale securities. Such amounts were determined by average cost method. The Company did not transfer any available-for-sale securities to trading securities for the years ended December 31, 2011 and 2012.

Impairment of investments in securities

For individual securities classified as either available-for-sale or held-to-maturity, unrealized losses would be reported on the consolidated statements of income if evidence indicates that the value of an investment has been impaired and is unlikely to recover in the future. The Company determines whether a decline in fair value below cost is other than temporary pursuant to guidance from U.S. GAAP ASC 320-10-35, *Investments—Debt and Equity Securities*, since R.O.C. GAAP does not provide additional definition or guidance on how to assess the likelihood of future recovery. In general, a decline in market value below cost for a continuous period of six months is considered to be other than temporary unless there is persuasive evidence to the contrary. When determining the impairment or other-than-temporary decline, the Company considers, among other factors, all available information concerning the future prospects of investments including the investees' financial statements, analyst reports and industry specific publications, and observes whether there are significant adverse changes in the general market condition where the investees operate, significant deteriorations in their earnings performance, any significant going concerns issues and subsequent market fluctuation and recovery. The Company also considers its ability and intention to hold these investments for a reasonable period of time that will be sufficient to allow for any anticipated recovery in the security's market value. If the decline in fair value is judged to be other than temporary, the cost basis of the individual security is written down to fair value with a charge against earnings. The differences related to the accounting for impairment of investments in securities between R.O.C. GAAP and U.S. GAAP were insignificant for each of the years ended December 31, 2010, 2011, and 2012.

Adjustments due to change in ownership of equity investees and subsidiaries

The Company's ownership interest in a subsidiary or equity investee may change, for example, (1) when an equity investee or a subsidiary issues additional shares and the Company subscribes for these shares at a percentage higher or lower than its current ownership percentage in the equity investees or subsidiaries, (2) when the employees of the Company's subsidiaries or equity investees exercise their stock options, or (3) when the convertible bondholders of the Company's subsidiaries or equity investees exercise their conversion rights. Under R.O.C. GAAP, the change in the Company's proportionate share in the net assets of its equity investees or subsidiaries resulting from the issuance of additional shares of the investee's stock, at the rate not proportionate to its existing equity ownership in such investees, is recorded to the additional paid-in capital and long-term investments account for an equity method investee, or noncontrolling interest for a subsidiary. Under U.S. GAAP, pursuant to ASC 810-10-45, *Changes in a Parent's Ownership Interest in a Subsidiary*, a change in the Company's ownership interest while the Company retains its controlling financial interest in its subsidiary shall be accounted for as equity transactions. Nevertheless, a dilution of ownership interest in an equity method investee is recognized as a gain or loss, while an increase of ownership interest is accounted for as additional acquisition interest in an equity method investee, with the difference between the total cost of the additional investment and the proportionate share of the fair value of net assets treated as equity method goodwill.

In June 2010, the Company acquired additional ownership interests in a subsidiary. Under R.O.C. GAAP, the acquisition was accounted for using the purchase method of accounting, and after reducing the book values of those non-current assets acquired of NT$226 million to zero, the Company recognized an extraordinary gain of NT$68 million for the year ended December 31, 2010, as the fair value of the net assets acquired exceeded their cost. However, under U.S. GAAP, the acquisition was accounted for as an equity transaction. The difference between the fair value of the consideration paid and the book value of the noncontrolling interests is adjusted against stockholders' equity. As such, the Company reversed the extraordinary gain and the write-down of non-current assets recognized under R.O.C. GAAP, and recorded additional paid-in capital of NT$310 million as of December 31, 2010 under U.S. GAAP.

In June 2010, a non-affiliated company invested NT$259 million for newly issued shares of one of the Company's consolidated entities, reducing the Company's ownership interest from 100% to 50%. Due to this transaction, the Company became to jointly control the entity and accounted for the entity as a joint venture. Under R.O.C. GAAP, the reduction of equity interest is adjusted against additional paid-in capital. However, under U.S. GAAP, the Company accounted for the transaction as a deconsolidation of a subsidiary and remeasured the remaining holding interests by recognizing a gain or loss in net income attributable to the Company. Accordingly, the Company recognized an NT$5 million net loss for the year ended December 31, 2010 under U.S. GAAP.

Difference in application of equity accounting

Prior to 2006, certain available-for-sale investments under U.S. GAAP were accounted as equity method investments under R.O.C. GAAP. The differences in the application of equity method led to different cost basis under R.O.C. GAAP and U.S. GAAP and resulted in an adjustment to accumulated other comprehensive income related to unrealized losses on available-for-sale securities of NT$2,090 million as of December 31, 2010, 2011 and 2012.

Under R.O.C. GAAP, if the carrying amount of non-current asset or disposal group will be recovered principally through sale rather than through continuing use and the asset or disposal group meets the criteria to be available for immediate sale in its present condition subject only to terms that are usual and customary for a sale and the sale is highly probable, the asset or disposal group would be classified as held-for-sale asset measured at the lower of carrying amount and fair value less costs to sell and separately presented in the balance sheet. For the sale to be highly probable, the management must be committed to a plan to sell the asset completely within one year, and the asset must be actively marketed for sale at a price that is reasonable compared to its current fair value. Equity-method investment shall be classified as held-for-sale asset if it meets all the above criteria. Under U.S. GAAP, ASC 360-10 *Property, Plant, and Equipment*, the criteria to classify long-lived asset or disposal group to held-for-sale asset is similar to R.O.C. GAAP. However, ASC 360-10 does not apply to financial instruments including investments in equity securities accounted for under the cost or equity method. As such, equity method investments are not classified as held-for-sale assets but shall continue to be accounted for under the equity method until the significance influence is lost.

As of December 31, 2012, the Company reclassified held-for-sale assets of NT$313 million under R.O.C. GAAP to equity method investment under U.S. GAAP. The proportional equity pick up from the equity investment was insignificant for the year ended December 31, 2012.

Under R.O.C. GAAP, when an investor holds 20% or more of an investee's outstanding voting securities but without the controlling power, unless it is evidenced that the investor does not have significant influence over the investee, the investor's investment in the investee's equity securities, including preferred shares, shall be accounted for using the equity method. When an investor invests in preferred stock of an investee, equity method accounting is necessary if the investor has the ability to exercise its significant influence over the investee. Therefore, when determining the excess of cost of investment over underlying equity in net assets of the investee, and recognizing subsequent pick up of equity method gains or losses, the Company takes its preferred shareholdings into consideration. In addition, excess of investment cost over the underlying net assets will be treated as equity-method goodwill as a component of the carrying value of the equity-method investment. If, however, there is excess of underlying net assets over the investment cost, the investee's non-current assets, as components of the equity-method investment balance, will be subject to pro rata reduction with the remaining unallocated bargain purchase recognized immediately as an extraordinary gain.

Under U.S. GAAP, however, equity-method accounting only applies to investments in common stock and in-substance common stock that give the investor the ability to exercise significant influence over operating and financial policies of an investee. Unless when the investment in common stock and in-substance common stock is reduced to zero, at which time the Company's other forms of investment, including preferred shares, may be required to report losses up to the Company's investment carrying amount. Pursuant to ASC 323-10-15-13, in-substance common stock is an investment in an entity that has risk and reward characteristics that are substantially similar to that entity's common stock. An investor shall consider all of the characteristics of the securities: subordination, risks and rewards of ownership and obligation to transfer value, when determining whether an investment in an entity is substantially similar to an investment in the entity's common stock.

After considering all the characteristics mentioned above, the Company concluded that its investment in Best Elite Series B and B-1 preferred shares is not in-substance common stock based on certain rights that are substantially different from ordinary shares. In particular, the following factors demonstrate that the Series B and B-1 are not in substance common stock:

(1) Subordination—the Series B and B-1 preferred shares each have a stated liquidation preference of 125% of the original issuance price plus any declared and unpaid preference dividends to such class of preferred shares. The liquidation preference is substantive considering Best Elite's ordinary shares at the time of the purchase accounted for more than "little or none" of its total equity on a fair value basis, and the Series B and B-1 preferred shares are entitled to receive Series B and B-1 liquidation preference amounts prior to any distribution to other classes of shares of Best Elite in liquidation; and

(2) Risks and rewards of ownership—the Series B and B-1 preferred shareholders are entitled to dividend in preference to all other classes of equity stock when dividends are declared. Such preference dividend must be paid first, in full, to these shareholders prior to distribution to others. Accordingly, the rights of Series B and B-1 preferred shares to profits are substantially different from ordinary shares. The Series B and B-1 preferred shareholders also participate in the ordinary share dividend on an if-converted basis and they do not participate in losses, except, as with equity generally, their value could potentially become zero in liquidation. In addition, as described above, the risk to the Series B and B-1 is substantially lower than ordinary shares because the Series B and B-1 have substantively more favorable treatment in liquidation.

The investment in the Best Elite preferred shares of NT$2,342 million and NT$2,358 million was reclassified from long-term investment accounted for under the equity method to financial assets measured at cost as of December 31, 2011 and 2012, respectively, under U.S. GAAP. The Company also reversed the effects of the pro rata reduction for the bargain purchase and recognized an equity-method goodwill of NT$521 million, as a component of the equity-method investment balance for its investment in Best Elite ordinary shares. Additionally, the Company reversed the investment gain of NT$105 million and NT$669 million for the years ended December 31, 2011 and 2012, respectively, from the preferred shares recognized under R.O.C. GAAP.

(4) Fair value measurement

ASC 820-10, *Fair Value Measurements and Disclosures*, defines fair value, provides a framework for measuring fair value under current standards in U.S. GAAP, and requires additional disclosure about fair value measurements. The fair value hierarchy gives the highest priority to unadjusted quoted prices in active markets for identical assets or liabilities (Level 1) and the lowest priority to unobservable inputs (Level 3). Each level of inputs used are described as following:

Level 1 inputs are unadjusted quoted prices in active markets for identical assets or liabilities that the reporting entity has the ability to access at the measurement date;

Level 2 inputs are inputs other than quoted prices included within Level 1 that are observable for the asset or liability, either directly or indirectly, such as quoted prices for similar assets or liabilities in active markets, quoted prices for identical or similar assets or liabilities in markets that are not active, and valuations with inputs which are observable for substantially the full term of the asset or liability. The fair values of the available-for-sale financial assets with restrictions on the sale or transfer are determined based on identical but unrestricted financial assets' quoted market price with discounts for the restrictions that are insignificant. One of the Company's equity fund investments was classified as available-for-sale financial assets and its fair value is determined based on the redemption value provided every quarter. The Company issued exchangeable bonds which contain a compound derivative instrument, comprising of the exchange option with a fixed foreign exchange rate feature and a call option. The compound derivative instrument is classified as liabilities carried at fair value through profit or loss. The derivatives are fair valued using the option pricing model. The valuation model uses the market-based observable inputs including share price, volatility, credit spread, and swap rates. Some of the Company's non-public instruments classified as financial assets measured at cost, noncurrent and long-term investments accounted for under the equity method were considered to be impaired. The fair value was determined based on the contract selling price or the transaction price of the newly issued shares which the Company considered to be quoted prices in a market that was not active.

Level 3 inputs are unobservable inputs that are significant to the fair value of the asset or liability. Some of the Company's equity investments in non-public funds classified as financial assets measured at cost, noncurrent were considered to be impaired. The fair value of the non-publicly traded funds was determined using the net asset values of the funds. The fair value measurements of our private equity instruments classified as financial assets measured at cost, noncurrent are determined using the market approach by reference to the market multiples derived from the inputs include the private company's current operating and future expected performance based on evaluation of the latest available financial statements; changes in the industry and market prospects of the Company based on publicly available information. Due to the absence of quoted market price, the fair value measurement of some of the Company's long-term investment in non-publicly traded equity instruments that are accounted for under equity method were determined to be impaired using the discounted cash flow model, considering the investee's current and future expected operating performance, industry trends, and competitive advantages. As for the property, plant and equipment impairment, fair value was determined based on observable inputs by reference to comparable sales data and published market price with insignificant adjustment for economic lives, local price index, capacity utilization, equipment-related inflation indices and physical condition. Refer to Note 36(6) for goodwill impairment.

The following table summarizes the assets and liabilities measured and recorded at fair value on a recurring basis at December 31, 2011 and 2012:

December 31, 2011		Fair value measurements at reporting date using		
Items	Fair Value	Level 1	Level 2	Level 3
	NT$'000	NT$'000	NT$'000	NT$'000
Financial assets at fair value through profit or loss, current	695,931	695,931	—	—
Financial assets at fair value through profit or loss, noncurrent	119,711	119,711	—	—
Available-for-sale financial assets, current	5,124,780	5,124,780	—	—
Available-for-sale financial assets, noncurrent	18,929,865	18,835,224	94,641	—
Financial liabilities at fair value through profit or loss, current	741,531	—	741,531	—

December 31, 2012		Fair value measurements at reporting date using		
Items	Fair Value	Level 1	Level 2	Level 3
	NT$'000	NT$'000	NT$'000	NT$'000
Financial assets at fair value through profit or loss, current	655,994	655,994	—	—
Financial assets at fair value through profit or loss, noncurrent	72,706	72,706	—	—
Available-for-sale financial assets, current	4,330,880	4,330,880	—	—
Available-for-sale financial assets, noncurrent	15,116,740	15,045,978	70,762	—
Financial liabilities at fair value through profit or loss, current	767,605	—	767,605	—

The following table summarizes the assets measured at fair value on a nonrecurring basis for the years ended December 31, 2011 and 2012:

December 31, 2011		Fair value measurements during reporting period using			
Items	Fair Value	Level 1	Level 2	Level 3	Total Losses
	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000
Financial assets measured at cost, noncurrent	225,938	—	32,447	193,491	(570,725)
Long-term investments accounted for under the equity method	374,690	—	81,348	293,342	(114,463)
Property, plant and equipment, net	7,532,528	—	—	7,532,528	(1,238,877)
Other assets	—	—	—	—	(11,206)
Goodwill	—	—	—	—	(1,500,344)

Financial assets measured at cost, long-term investments accounted for under the equity method, property, plant and equipment, net, other assets and goodwill with a total carrying amount of NT$11,569 million were written down to their fair values in total of NT$8,133 million, resulting in an aggregate impairment charge of NT$3,436 million included in earnings for the year ended December 31, 2011.

December 31, 2012		Fair value measurements during reporting period using			
Items	Fair Value	Level 1	Level 2	Level 3	Total Losses
	NT$'000	NT$'000	NT$'000	NT$'000	NT$'000
Financial assets measured at cost, noncurrent	202,058	—	134,125	67,933	(585,060)
Long-term investments accounted for under the equity method	201,689	—	185,143	16,546	(223,695)
Property, plant and equipment, net	5,961,772	—	—	5,961,772	(3,186,525)
Other assets and deferred charges	53,927	—	—	53,927	(85,911)

Financial assets measured at cost, long-term investments accounted for under the equity method, property, plant and equipment, net and other assets and deferred charges with a total carrying amount of NT$10,500 million were written down to their fair values in total of NT$6,419 million, resulting in an aggregate impairment charge of NT$4,081 million included in earnings for the year ended December 31, 2012.

The following table summarizes the financial instruments not recorded at fair value but for which the fair value is disclosed as of December 31, 2011 and 2012:

The fair value of bonds payables was estimated by the market price or estimated using the option pricing model. The model uses market-based observable inputs including share price, volatility, credit spread and swap rates. The fair value of long-term loans was determined using discounted cash flow model, based on the Company's current incremental borrowing rates of similar loans.

The fair values of the Company's short-term financial instruments including cash and cash equivalents, held to maturity financial assets-current, restricted assets, deposits-out, short-term loans and capacity deposits approximated their carrying amount due to their maturities within one year.

December 31, 2011	Fair value measurements during reporting period using		
Items	Level 1	Level 2	Level 3
	NT$'000	NT$'000	NT$'000
Bonds payables (current portion included)	—	16,557,479	—
Long-term loans (current portion included)	—	11,692,649	—
Long-term investments accounted for under the equity method with quoted market price	77,930	—	—

December 31, 2012	Fair value measurements during reporting period using		
Items	Level 1	Level 2	Level 3
	NT$'000	NT$'000	NT$'000
Bonds payables (current portion included)	10,049,710	15,929,060	—
Long-term loans (current portion included)	—	14,817,466	—
Long-term investments accounted for under the equity method with quoted market price	94,922	—	—

(5) *Convertible bond liabilities*

The Company issued convertible bonds in May 2011. Under R.O.C. GAAP, the bonds contain both a liability component and an equity component. The conversion right is classified in stockholders' equity at its fair value at issuance. Under U.S. GAAP, the conversion right was determined to be a contract indexed to the Company's own stock and, if it existed on a freestanding basis, would be classified in stockholders' equity, meeting the scope exception described in ASC 815-10-15-74. As such, the conversion right is not considered to be a derivative instrument that is required to be bifurcated from the host contract.

In addition, under R.O.C. GAAP, the issuance costs are allocated proportionally to the equity and liability components. The amount allocated to the equity components is accounted for as a reduction of equity and the amount allocated to the liability component is accounted for as a bond discount. The issuance costs allocated to the liability component are amortized over the contractual life of the bonds using the effective interest rate method. Under U.S. GAAP, however, the entire issuance costs are reported as deferred charges and amortized over the contractual life of the bonds using the effective interest rate method. As of December 31, 2011 and 2012, the balance of deferred charges was NT$52 million and NT$39 million under U.S. GAAP, respectively.

Based on the above differences, the Company reclassified the equity component under R.O.C. GAAP to bonds payable under U.S. GAAP, and reclassified issuance costs allocated to the liability and equity components under R.O.C. GAAP to deferred charges under U.S. GAAP. The Company also adjusted the differences resulting from the subsequent amortization of the bond discount and deferred charges as well as the subsequent redemption of the bonds. The difference in cost basis resulted in an adjustment to decrease interest expense of NT$77 million and NT$13 million for the years ended December 31, 2011 and 2012, respectively. Additionally, the Company recalculated the capitalized interest which resulted in an adjustment to decrease property, plant and equipment, net by NT$89 million for the year ended December 31, 2012. The impact to property, plant and equipment, net was insignificant for the year ended December 31, 2011.

As of December 31, 2011 and 2012, the Company redeemed NT$1,823 million and NT$142 million, respectively, of convertible bonds which resulted in an adjustment to decrease redemption gain of NT$57 million and NT$2 million for the years ended December 31, 2011 and 2012 under U.S. GAAP, respectively.

(6) Goodwill and business combinations

In accordance with R.O.C. GAAP, goodwill is measured separately on each acquisition, and it excludes goodwill in non-controlling interest. In a step acquisition, the acquirer does not re-measure its previously held equity interest in the acquiree, therefore, the acquisition does not result in gains or losses from re-measurements. Goodwill is not amortized and is subject to annual impairment tests or whenever events and circumstances change indicating goodwill may be impaired. The assessment of impairment includes identifying the goodwill-allocated cash generating unit (CGU), determining the recoverable amount of CGU by using a discounted cash flow analysis, and ultimately comparing the recoverable amount with the carrying amount of CGU including goodwill. If the CGU's carrying amount is greater than its recoverable amount, an impairment loss is recognized. The impairment of goodwill cannot be reversed. When the fair value of identifiable net assets acquired exceeds the cost, the difference should be assigned to non-current assets acquired (except for financial assets not under equity method, assets to be disposed, deferred tax assets, prepaid pension or other retirement benefits cost) proportionate to their respective fair values. If these assets are all reduced to zero value, the remaining excess should be recognized as extraordinary gain.

Under U.S. GAAP, in a business combination achieved in stages, the acquirer shall re-measure its previously held equity interest in the acquiree at its acquisition-date fair value and recognize the resulting gain or loss. The acquirer shall recognize goodwill as of the acquisition date measured as the excess of (a) the aggregate of: (i) the consideration transferred, (ii) the fair value of any non-controlling interest in the acquiree, and (iii) the fair value of any previously held equity interest in the acquiree; over (b) the fair value of identifiable assets acquired and the liabilities assumed on the acquisition date; or gain on bargain purchase in which the amount as the excess of (b) exceeds the aggregate of the amounts specified in (a), after performing required reassessment of measurement procedures. Goodwill is not amortized and is subject to an annual impairment test or more frequently when events and circumstances indicate a possible impairment may exist. The first step of the impairment test is to compare the fair value of the reporting unit with its carrying value, including goodwill. If the carrying value of the reporting unit exceeds its fair value, the second step of the impairment test is to compare the implied fair value of the reporting unit goodwill with its carrying value. If the carrying amount of goodwill exceeds its fair value, the excess is recognized as impairment loss on the consolidated statements of income. Impairment of goodwill cannot be subsequently reversed.

On November 30, 2010, the Company acquired additional stocks issued by NEXPOWER, which increased the Company's ownership interest from 45.79% to 57.67%. Prior to the acquisition date, the Company accounted for its 45.79% interest in NEXPOWER as an equity-method investment. As a result of the acquisition, the Company obtained control over NEXPOWER and the results of NEXPOWER's operations have been included in the consolidated financial statements since that date. The Company expects to achieve the integration of the Company's overall resources.

Under R.O.C. GAAP, a change in the Company's proportionate share in the net assets of an equity investee resulting from its acquisition of additional stock issued by the equity investee at a rate not proportionate to its existing equity ownership is charged to the additional paid-in capital and long-term investments accounts. However, the acquisition of a controlling interest in NEXPOWER was regarded as a business combination under U.S. GAAP. The sum of the fair value of the consideration transferred, non-controlling interests and equity interest previously held by the acquirer exceeding the fair value of identifiable net assets is recorded as goodwill.

The fair value of consideration transferred, non-controlling interests and equity interest previously held by the acquirer were determined based on the price of newly issued shares, which was supported by valuation analysis using the market approach. The fair value of consideration transferred was NT$3,500 million, paid in cash, and the fair value of noncontrolling interests was NT$5,128 million. The acquisition-date fair value of the previous equity interest was NT$3,487 million and the Company recognized a gain of NT$443 million as a result of remeasuring its equity interest previously held in NEXPOWER before the business combination.

The following table summarizes the estimated fair values of the assets acquired and liabilities assumed at the acquisition date:

As of November 30, 2010	NT$ million
Cash	5,853
Receivables	938
Inventories	1,133
Property, plant and equipment	9,403
Other assets	144
Total identifiable assets acquired	17,471
Current liabilities	1,433
Non-current liabilities	5,422
Total liabilities assumed	6,855
Net identifiable assets acquired	10,616
Goodwill	1,499
Net assets acquired	12,115

The goodwill recognized is attributable primarily to expected consolidation synergies of NEXPOWER, and none of the goodwill is expected to be deductible for income tax purposes. As of December 31, 2010, there was no change in the recognized amount of goodwill resulting from the acquisition of NEXPOWER.

In September 2011, due to operating profits and cash flows were lower than expected since November 2010, given sharp deterioration in market condition, NEXTPOWER revised its earnings forecast for the next five years and determined that some of its long lived assets were impaired pursuant to ASC 360. The impairment loss also served as an indicator that goodwill might also be impaired. Accordingly, the Company conducted a two-step process to identify and measure the amount of impairment loss, if any.

As the carrying amount of NEXPOWER exceeded its fair value which was estimated by using the discounted cash flow based on earnings forecasts, its goodwill was considered to be impaired. To calculate the implied fair value of goodwill, the Company allocated the fair value to each asset and liability account. As most of the value in the reporting unit is in its long lived assets, the fair value of the machinery and equipment was determined and impaired as described in Note 36(7). The fair value of assets and liabilities other than long lived assets were determined to approximate their book values given their short-term nature. The Company did not identify any value to be ascribed to intangible assets not previously identified. The excess of the reporting unit's fair value over the total amounts allocated to each asset (except goodwill) and liability account would be the implied fair value of goodwill. As the carrying amount exceeded the implied fair value of NEXPOWER's goodwill, the Company recognized a goodwill impairment loss of NT$ 1,499 million in 2011 under U.S. GAAP, within the Other segment. While the impairment assessment resulted in a full writedown of goodwill under both R.O.C. GAAP and U.S. GAAP, the amount of the charge was different due to the difference in carrying values of goodwill under each GAAP.

(7) *Impairment of long-lived assets (excluding goodwill and other indefinite lived assets)*

Under R.O.C. GAAP and U.S. GAAP, long-lived assets are evaluated for impairment at each balance sheet date or whenever events and changes in circumstances indicate that an asset or asset group may be impaired and the carrying amounts of these assets may not be recoverable. Under R.O.C. GAAP, the Company determines whether an asset is impaired by comparing the carrying amount to its recoverable amount, which is the higher of the asset's fair value less costs to sell or the value in use determined by the future discounted cash flows to be generated by the asset and recognizes an impairment loss, if any, to the extent that its carrying amount exceeds its recoverable amount.

Under U.S. GAAP, pursuant to ASC 360, a two-step impairment test is required if impairment is indicated and the measurement model is as follows:

1. The carrying amount is first compared with the undiscounted cash flows. If the carrying amount is lower than the undiscounted cash flows, no impairment loss is recognized.
2. If the carrying amount is higher than the undiscounted cash flows, an impairment loss is measured as the difference between the carrying amount and fair value.

In 2011 and 2012, given the sharp deterioration in market condition, two of our subsidiaries had lower than expected operating profits and cash flows and revised its earnings forecast for the next five years and determined that some of their long-lived assets were impaired pursuant to ASC 360.

The impairment loss measured as the difference between the carrying amount and fair value for the years ended December 31, 2010, 2011 and 2012 was nil, NT$1,250 million and NT$3,272 million under U.S. GAAP, respectively. There was no GAAP difference recognized in 2010 and 2011. In 2012, due to the difference in carrying values of long-lived assets under R.O.C. and U.S. GAAP based on different accounting for acquisition of noncontrolling interest as described in Note 36(3), the amount of impairment recognized under R.O.C. GAAP was NT$2,339 million.

Additionally, under R.O.C. GAAP, for previously recognized losses, if there is evidence that impairment losses recognized no longer exist or have diminished, and the recoverable amounts of the long-lived assets increase because of an increase in the assets' estimated service potential, the losses may be reversed to the extent that the resulting carrying values of the assets do not exceed the carrying values had no impairment loss been recognized in prior years. Whereas impairment losses recognized cannot be reversed under U.S. GAAP. There were no reversal of impairment recognized on long-lived assets under R.O.C. GAAP for the years ended December 31, 2010, 2011 and 2012.

(8) Earnings per share (EPS)

Under R.O.C. GAAP, basic earnings per share is calculated by dividing net income attributable to common stockholders by the weighted-average number of shares outstanding during the year. Diluted earnings per share is calculated by taking basic earnings per share plus the effect of additional common shares that would have been outstanding if the dilutive share equivalents had been issued. Net income is also adjusted for the interest and other income or expenses derived from any underlying dilutive share equivalents, such as convertible bonds. The weighted-average number of shares outstanding are adjusted retroactively for stock dividends issued and capitalization of additional paid-in capital. Anti-dilutive effects are not included in the dilutive EPS calculation. The shares distributed for employee bonus are treated as outstanding as of their grant date in the calculation of basic earnings per share. For employee bonus that may be distributed in shares, the number of shares to be distributed is taken into consideration assuming the distribution will be made entirely in shares when calculating diluted earnings per share.

Under U.S. GAAP, basic earnings per share is calculated by dividing net income attributable to common stockholders by the weighted-average number of shares outstanding during the year. The shares distributed for employee bonus are included in the computation of basic earnings per share from the grant date. The reciprocal shareholdings held by equity investees are also deducted from the computation of weighted-average number of shares outstanding. Diluted earnings per share is calculated by taking basic earnings per share plus the effect of additional common shares that would have been outstanding if the dilutive share equivalents had been issued. The net income attributable to common stockholders would also be adjusted for the interest and other income or expenses derived from any underlying dilutive share equivalents as under R.O.C. GAAP. For employee bonus that may be distributed in shares, the number of shares to be distributed is not taken into consideration until they are granted or the stockholders' approval is obtained. Additionally, the dilutive effect of outstanding employee options generally should be reflected in diluted EPS by application of treasury stock method. The "assumed proceeds" include the exercise price of the options, any tax benefits that will be credited on exercise to additional paid-in capital, and the average measured but unrecognized compensation expense during the period. Accordingly, the Company reversed the dilutive adjustment under R.O.C. GAAP and calculated the dilutive effect of outstanding employee options by applying treasury stock method under U.S. GAAP.

The reconciliation of the numerators and denominators used in computing the basic and diluted earnings per share under U.S. GAAP are as below:

	For the year Ended December 31, 2012		
	Income (Numerator)	Shares (Denominator)	Per-Share Amount
	In thousands	In thousands	In dollar NT$
Net Income attributable to the Company	5,055,197	—	—
Basic EPS			
Income available to common stockholders	5,055,197	12,463,761	0.41
Effect of dilutive securities			
Employee stock options	—	24,034	—
Unsecured convertible bonds	(16,156)	652,022	(0.03)
Diluted EPS			
Income attributable to common stockholders including assumed conversions	5,039,041	13,139,817	0.38

As of December 31, 2012, there were 332,656 thousand issued and outstanding stock options which were not included in the computation of diluted earnings per share due to their antidilutive effect.

	For the year Ended December 31, 2011		
	Income (Numerator)	Shares (Denominator)	Per-Share Amount
	In thousands	In thousands	In dollar NT$
Net Income attributable to the Company	8,745,675	—	—
Basic EPS			
Income available to common stockholders	8,745,675	12,400,193	0.71
Effect of dilutive securities			
Employee stock options	—	38,534	—
Unsecured convertible bonds	(10,699)	420,158	(0.03)
Diluted EPS			
Income attributable to common stockholders including assumed conversions	8,734,976	12,858,885	0.68

As of December 31, 2011, there were 397,189 thousand issued and outstanding stock options which were not included in the computation of diluted earnings per share due to their antidilutive effect.

	For the year Ended December 31, 2010		
	Income (Numerator)	Shares (Denominator)	Per-Share Amount
	In thousands	In thousands	In dollar NT$
Net Income attributable to the Company	23,616,120	—	—
Basic EPS			
Income available to common stockholders	23,616,120	12,335,428	1.91
Effect of dilutive securities			
Employee stock options	—	63,658	—
Diluted EPS			
Income attributable to common stockholders including assumed conversions	23,616,120	12,399,086	1.90

As of December 31, 2010, there were 484,340 thousand issued and outstanding stock options which were not included in the computation of diluted earnings per share due to their antidilutive effect.

(9) Treasury stock and related disposal

Some of the Company's subsidiaries and investees also hold the Company's stocks as investments. Under R.O.C. GAAP, reciprocal shareholdings held by subsidiaries, but not equity investees, are recorded as treasury stocks on the Company's books. Under U.S. GAAP, however, reciprocal shareholdings, whether being held by subsidiaries or equity investees, are recorded as treasury stocks on the Company's books. Therefore, as of December 31, 2011 and 2012, the Company recognized treasury stocks of NT$2,092 million for reciprocal shareholdings held by equity-method investees. The Company also reversed accumulated other comprehensive income related to unrealized gains of NT$1,428 million, NT$849 million and NT$688 million for the years ended December 31, 2010, 2011 and 2012, respectively, and eliminated investment gains of NT$81 million, NT$179 million and NT$80 million for the years ended December 31, 2010, 2011 and 2012, respectively.

(10) Stock dividends

Under R.O.C. GAAP, the stock dividends are recorded at par value and charged to retained earnings. Under U.S. GAAP, if the ratio of distribution is less than 25 percent of the same kind of outstanding shares, the fair value of the shares issued should be charged to retained earnings. There have been no stock dividends issued since 2009, the adjustment of NT$291,285 million remains the same as of December 31, 2011 and 2012.

(11) Pension

Under R.O.C. GAAP, R.O.C. SFAS 18 requires a minimum pension liability to be measured as the excess of accumulated benefit obligation over the fair value of the plan assets, and allows the unrecognized items, including prior service costs or credits, actuarial gains or losses, and transition obligations or assets, to be reported in disclosure shown as a plan's funded status.

Under U.S. GAAP, ASC 715-30, *Defined Benefit Plans—Pension*, requires an employer to recognize an asset for a plan's overfunded status or a liability for a plan's underfunded status with an offsetting adjustment to accumulated other comprehensive income (AOCI).

The amounts related to pensions recognized in AOCI, net of tax, excluding amounts related to equity-method investees, are shown as below:

	As of December 31, 2012	
	Net gain/ (loss)	Prior service cost
	NT$'000	NT$'000
The amounts arose during the period	(418,098)	—
The amounts reclassified as components of net periodic benefit cost	232,606	(47,995)
The amounts recognized in AOCI as of December 31, 2012	(721,858)	—
The amounts expected to be recognized as components of net periodic benefit cost during 2013	(99,717)	—

(12) Tax effect of U.S. GAAP adjustments

Under U.S. GAAP, the income tax expense was NT$1,624 million, NT$931 million and NT$2,675 million for the years ended December 31, 2010, 2011 and 2012, respectively. Undistributed earnings generated after 1997 are subject to a 10% tax in compliance with the Income Tax Law of the R.O.C. Under R.O.C GAAP, the 10% tax on undistributed earnings is recorded as an expense at the time shareholders resolve that its earnings shall be retained. Under U.S. GAAP, 10% income tax impact is provided in the period the income is earned, assuming that no earnings are distributed. Any reduction in the liability will be recognized when the income is distributed upon the stockholders' approval in the subsequent year. Tax on undistributed earnings may be offset by the Company's available tax credits carried forward, where applicable. As such, the incremental tax accrued on undistributed earnings may be offset by a corresponding reduction in valuation allowance, where applicable. In 2010, 2011 and 2012, the Company accrued NT$2,156 million, NT$877 million and NT$650 million, respectively, for 10% tax on undistributed earnings in Taiwan under U.S. GAAP. The additional tax expense was offset by a corresponding reduction in the valuation allowance under U.S. GAAP.

Moreover, additional tax benefit (expense) and deferred tax assets or liabilities would be adjusted for the reconciled items between R.O.C. GAAP and U.S. GAAP due to temporary difference. For the year ended December 31, 2012, the Company recognized total tax expense and other comprehensive income items of NT$584 million and NT$409 million, respectively, to reconcile R.O.C. GAAP to U.S. GAAP, with the balance of NT$175 million adjusted to reduce deferred tax asset, noncurrent, in connection with the recognition of the book-to-tax basis difference on the Company's investment in UMCJ, immediately following its decision to dissolve and liquidate UMCJ. While R.O.C. GAAP requires subsequent changes in deferred tax balances as of the beginning of the year to be recorded in equity, if the deferred tax is related to an equity classified item, ASC 740, *Income Taxes*, requires all such changes to be recognized as current income tax expense.

As of December 31, 2012, the Company reported valuation allowance NT$9,149 million to reduce deferred tax assets to an amount that is more likely than not realizable, representing a decrease of NT$2,778 million from the prior year.

Under U.S. GAAP, the Company adopted the provisions regarding uncertainty in income tax positions prescribed in ASC 740-10, which clarifies that tax position are measured based on the maximum amount that is more likely than not to be realized. Tax positions that are not at least more likely than not to be sustained on their technical merits are not recognized. Unlike ASC 740-10, R.O.C. SFAS 22 contained no guidance on uniform criteria for an enterprise to recognize and measure potential tax benefits associated with uncertain tax positions.

A reconciliation of the beginning and ending amounts of unrecognized tax benefits is as follows:

	For the years ended December 31,	
	2011	2012
	NT$	NT$
	(In millions)	
Balance at January 1	82	69
Increases due to positions taken in current year	69	778
Decreases relating to settlements with taxing authorities	(82)	—
Balance at December 31	69	847

As of December 31, 2011 and 2012, unrecognized tax benefit of NT$69 million and NT$429 million, respectively, which if recognized would affect the Company's effective tax rate. In addition, settlement of the unrecognized tax benefit, if needed, can be by use of cash or deferred tax assets. Further, the Company is unaware of any positions for which it is reasonably possible that the total amount of unrecognized tax benefits will significantly change within the next twelve months.

The Company reports interest and penalties relating to unrecognized tax benefits as interest expenses and other expenses, respectively. As of December 31, 2011 and 2012, no interest or penalties were accrued.

The Company is subject to taxation in Taiwan and other foreign jurisdictions. As of December 31, 2012, tax year of 2011 is open to Tax Authority's examination in Taiwan, while in other foreign jurisdictions, years 2007-2011 are open to relevant Tax Authority's examination.

(13) Gross profit and operating income

Under R.O.C. GAAP, gains and losses from disposal of property, plant and equipment, gains and losses from foreign currency exchange, and impairment losses of long-lived assets, are presented as non-operating income or expenses in the consolidated statement of income. Under U.S. GAAP, these non-operating income or expenses would be reclassified to be included in the determination of operating income.

(14) Capital reduction and return from foreign subsidiaries

Under R.O.C. GAAP, as the Company decreases its equity interests in a foreign operation through capital reduction and return of capital, the proportional difference of the accumulated currency translation adjustments before and after the capital reduction is recognized in profit or loss. However, under U.S. GAAP, foreign currency translation gains and losses that have been recorded as a component of other comprehensive income during the period for which settlement was not planned or anticipated remain in that account until partial or complete sale or complete or substantially complete liquidation of the investment in the foreign entity. In 2012, two of the Company's foreign subsidiaries returned part of its capital by cash. Under R.O.C. GAAP, the difference of the accumulated currency translation adjustments before and after the capital reduction was recognized as exchange gain. Given the capital return was not made in connection with the sale or substantially complete liquidation of these foreign subsidiaries, the Company reversed the exchange gain under R.O.C. GAAP, and recorded as cumulative translation adjustment of NT$233 million as of December 31, 2012 under U.S. GAAP.

(15) Inventory

Under R.O.C. GAAP, the write down of inventory for the lower of cost or net realizable value may be reversed in subsequent periods if market conditions improve. Under U.S. GAAP, the write down to lower of cost or market creates a new cost basis that subsequently cannot be marked up. Upon the sale of the related inventory, the difference between these two GAAPs is resolved. During the years ended December 31, 2010, 2011 and 2012, there was no material difference between cost of sales under R.O.C. GAAP and U.S. GAAP as a result of this GAAP difference.

Under R.O.C. GAAP, inventory is stated at the lower of cost or net realizable value, while under U.S. GAAP, inventory is stated at the lower of cost or market. ASC 330-10-20 defines "market" as current replacement cost (by purchase or reproduction) provided it meets both of the following conditions: (1) market should not exceed the net realizable value; and (2) market should not be less than net realizable value reduced by an allowance for an approximately normal profit margin. Net realizable value is defined as the estimated selling price in the ordinary course of business less reasonably predictable costs of completion and disposal. The market value of the Company's work in progress and finished goods is measured at the contractual sales price less predictable costs of completion, while that of the raw materials is the replacement cost by purchase. Normally, the market floor of net realizable value reduced by an allowance for a normal profit margin is not applicable because the Company's inventory is manufactured by contract, serving the specific requirements of its customers. Additionally, as the rule of lower of cost or market is intended to provide a means of measuring the residual usefulness of an inventory expenditure and the term "market" may be thought of in terms of the equivalent expenditure which would have to be made in the ordinary course at that date to procure corresponding utility, in the event when the estimated selling price, reduced by the costs of completion, is lower than current replacement cost, net realizable value would be determined to be the more appropriate measurement of utility. Therefore, the accounting for inventory at the lower of cost or net realizable value under R.O.C. GAAP is not materially different from the accounting for inventory at the lower of cost or market under U.S. GAAP.

Reconciliation of Consolidated Net Income

	For the years ended December 31,			
	2010	2011	2012	
	NT$'000	NT$'000	NT$'000	US$'000
Consolidated net income, R.O.C. GAAP	23,845,956	8,466,916	5,873,921	202,200
Compensation	(396,851)	(105,542)	(9,867)	(340)
Equity investees	(42,404)	(11,475)	3,168	110
Investments in debt and equity securities				
Change in fair value of investments in securities	(786)	137	(36,207)	(1,246)
Difference in application of equity accounting	—	(104,636)	(669,333)	(23,041)
Adjustments due to change in ownership of investees	(233,761)	(105,626)	(1,251,083)	(43,067)
Convertible bond liabilities	—	20,580	26,967	928
Goodwill and business combinations	452,112	(1,307,545)	—	—
Treasury stock and related disposal	(80,524)	(179,028)	(80,492)	(2,771)
Capital reduction and return from foreign subsidiaries	—	—	(232,820)	(8,014)
Tax effect of U.S. GAAP adjustments	—	(69,326)	(514,769)	(17,720)
Consolidated net income, U.S. GAAP	23,543,742	6,604,455	3,109,485	107,039
Attributable to:				
the Company	23,616,120	8,745,675	5,055,197	174,017
noncontrolling interests	(72,378)	(2,141,220)	(1,945,712)	(66,978)
	23,543,742	6,604,455	3,109,485	107,039
Basic earnings per share under U.S. GAAP (in dollars)	1.91	0.71	0.41	0.01
Diluted earnings per share under U.S. GAAP (in dollars)	1.90	0.68	0.38	0.01
Weighted-average number of shares outstanding-basic (in thousands)	12,335,428	12,400,193	12,463,761	12,463,761
Weighted-average number of shares outstanding-diluted (in thousands)	12,399,086	12,858,885	13,139,817	13,139,817

Statement of Comprehensive Income (Loss)

	For the years ended December 31,			
	2010	2011	2012	
	NT$'000	NT$'000	NT$'000	US$'000
Net income	23,543,742	6,604,455	3,109,485	107,039
Attributable to:				
the Company	23,616,120	8,745,675	5,055,197	174,017
noncontrolling interests	(72,378)	(2,141,220)	(1,945,712)	(66,978)
Other comprehensive income (loss), net of tax				
Cumulative translation adjustment	(5,192,884)	3,176,545	(2,807,036)	(96,628)
Attributable to:				
the Company	(4,971,823)	3,162,457	(2,803,630)	(96,511)
noncontrolling interests	(221,061)	14,088	(3,406)	(117)
Unrealized losses on securities	(3,056,478)	(12,745,112)	(3,447,107)	(118,661)
Attributable to:				
the Company	(3,056,478)	(12,745,112)	(3,447,107)	(118,661)
noncontrolling interests	—	—	—	—
Unrecognized pension cost	(590,007)	32,185	(233,487)	(8,037)
Attributable to:				
the Company	(600,625)	32,185	(233,487)	(8,037)
noncontrolling interests	10,618	—	—	—
Other comprehensive income (loss)	(8,839,369)	(9,536,382)	(6,487,630)	(223,326)
Comprehensive income (loss)	14,704,373	(2,931,927)	(3,378,145)	(116,287)
Attributable to:				
the Company	14,987,194	(804,795)	(1,429,027)	(49,192)
noncontrolling interests	(282,821)	(2,127,132)	(1,949,118)	(67,095)
	14,704,373	(2,931,927)	(3,378,145)	(116,287)

Statement of Accumulated Other Comprehensive Income (Loss) attributable to the Company

	Cumulative translation adjustment	Unrealized gains (losses) on securities	Unrecognized pension cost	Accumulated other comprehensive income (loss)
	NT$'000	NT$'000	NT$'000	NT$'000
Balance at December 31, 2010	(5,360,151)	24,743,822	(520,556)	18,863,115
Other comprehensive income (loss)	3,162,457	(12,745,112)	32,185	(9,550,470)
Balance at December 31, 2011	(2,197,694)	11,998,710	(488,371)	9,312,645
Other comprehensive loss	(2,803,630)	(3,447,107)	(233,487)	(6,484,224)
Balance at December 31, 2012	(5,001,324)	8,551,603	(721,858)	2,828,421

Reconciliation of Consolidated Stockholders' Equity

	As of December 31		
	2011	2012	
	NT$'000	NT$'000	US$'000
Stockholders' equity, R.O.C. GAAP	212,124,963	205,020,945	7,057,520
Compensation	3,567	538	19
Equity investees	(260,363)	130,600	4,495
Investments in debt and equity securities			
Difference in application of equity accounting	(104,636)	(643,765)	(22,161)
Adjustments due to change in ownership of investees	1,773,549	397,087	13,669
Convertible bond liabilities	(521,944)	(488,574)	(16,818)
Goodwill and business combinations	(7,615)	(7,615)	(263)
Treasury stock and related disposal	(2,044,381)	(1,883,334)	(64,831)
Pension	(254,179)	(721,858)	(24,849)
Tax effect of U.S. GAAP adjustments	(69,326)	(174,666)	(6,013)
Stockholders' equity, U.S. GAAP	210,639,635	201,629,358	6,940,768

Movements in Consolidated Stockholders' Equity in accordance with U.S. GAAP

	For the years ended December 31,			
	2010	2011	2012	
	NT$'000	NT$'000	NT$'000	US$'000
Balance at January 1	213,240,491	225,122,624	210,639,635	7,250,934
Compensation	1,549,083	890,370	209,601	7,215
Cash dividends	(6,233,002)	(14,033,575)	(6,316,435)	(217,433)
Adjustment of additional paid-in capital and retained earnings accounted for under the equity method	(52,670)	1,418	8,094	278
Changes in additional paid-in capital for purchases of subsidiary shares	408,011	(310,113)	(12,181)	(419)
Cumulative translation adjustment on foreign long-term investment	(4,971,823)	3,162,457	(3,213,059)	(110,605)
Change in fair value of marketable securities	(3,201,421)	(13,324,883)	(3,608,154)	(124,205)
Treasury stock and related disposal	(4,618,121)	758,799	241,539	8,314
Exercise of employees' stock options	2,542	1,004,050	266,116	9,160
Pension	(600,625)	32,185	(233,487)	(8,037)
Tax effect of U.S. GAAP adjustments	—	—	409,429	14,094
Changes in noncontrolling interests	5,984,039	(1,409,372)	(1,816,937)	(62,545)
Net income attributable to the Company	23,616,120	8,745,675	5,055,197	174,017
Balance at December 31	225,122,624	210,639,635	201,629,358	6,940,768
Total Stockholders' equity attributable to:				
the Company	218,650,997	205,577,380	198,384,040	6,829,053
noncontrolling interests	6,471,627	5,062,255	3,245,318	111,715
	225,122,624	210,639,635	201,629,358	6,940,768

Summarized U.S. GAAP consolidated balance sheet and statement of operations information is presented below:

	As of December 31,		
	2011	2012	
	NT$'000	NT$'000	US$'000
Current assets	84,055,511	80,604,889	2,774,695
Non-current assets	195,404,755	198,447,598	6,831,241
Current liabilities	42,946,840	39,538,661	1,361,055
Non-current liabilities	25,873,791	37,884,468	1,304,113

	For the years ended December 31,			
	2010	2011	2012	
	NT$'000	NT$'000	NT$'000	US$'000
Net operating revenues	126,441,544	116,702,723	115,674,763	3,981,919
Cost of goods sold	(89,929,148)	(95,594,489)	(96,330,930)	(3,316,039)
Operating income	21,393,686	2,572,552	706,103	24,306
Net income	23,543,742	6,604,455	3,109,485	107,039
Less: Net loss attributable to noncontrolling interests	(72,378)	(2,141,220)	(1,945,712)	(66,978)
Net income attributable to the Company	23,616,120	8,745,675	5,055,197	174,017

A reconciliation of the significant balance sheet accounts under R.O.C. GAAP to the amounts determined under U.S. GAAP is as follows:

	As of December 31,		
	2011	2012	
	NT$'000	NT$'000	US$'000
Cash and cash equivalents:			
As reported under R.O.C. GAAP	49,070,128	42,592,725	1,466,187
Reclassification to marketable securities	(8,000)	(104,235)	(3,588)
As adjusted under U.S. GAAP	49,062,128	42,488,490	1,462,599
Held-to-maturity financial assets:			
As reported under R.O.C. GAAP	13,524	—	—
Reclassification from cash & cash equivalents	8,000	104,235	3,588
As adjusted under U.S. GAAP	21,524	104,235	3,588

	As of December 31,		
	2011	2012	
	NT$'000	NT$'000	US$'000
Available-for-sale financial assets:			
As reported under R.O.C. GAAP	23,960,004	19,447,620	669,454
Reclassification from financial assets measured at cost, noncurrent	157,253	—	—
Change in fair value of investment in securities	(62,612)	—	—
As adjusted under U.S. GAAP	24,054,645	19,447,620	669,454
Long-term investment under cost method, equity method & others:			
As reported under R.O.C. GAAP	19,619,253	19,790,052	681,241
Reclassification to available-for-sale financial assets	(157,253)	—	—
Difference in application of equity accounting	(104,636)	(330,594)	(11,380)
Equity investees	49,566	136,704	4,706
Treasury stock and related disposal	(2,044,381)	(1,883,334)	(64,831)
As adjusted under U.S. GAAP	17,362,549	17,712,828	609,736
Property, plant and equipment, total cost:			
As reported under R.O.C. GAAP	616,063,131	649,406,522	22,354,785
Business combination and ownership change in consolidated entities	17,703,713	8,735,193	300,695
Convertible bond liabilities—capitalized interest	—	(104,078)	(3,583)
As adjusted under U.S. GAAP	633,766,844	658,037,637	22,651,897
Property, plant and equipment, accumulated depreciation:			
As reported under R.O.C. GAAP	(463,622,840)	(485,931,177)	(16,727,407)
Business combination and ownership change in consolidated entities	(14,103,959)	(6,280,960)	(216,212)
Convertible bond liabilities—capitalized interest	—	15,181	523
As adjusted under U.S. GAAP	(477,726,799)	(492,196,956)	(16,943,096)
Property, plant and equipment, accumulated impairment:			
As reported under R.O.C. GAAP	(3,115,991)	(4,621,310)	(159,081)
Business combination and ownership change in consolidated entities	(1,845,830)	(2,071,266)	(71,300)
As adjusted under U.S. GAAP	(4,961,821)	(6,692,576)	(230,381)
Bonds Payable:			
As reported under R.O.C. GAAP	11,984,404	21,932,193	754,981
Conversion right and issuance costs of convertible bonds	573,523	439,033	15,113
As adjusted under U.S. GAAP	12,557,927	22,371,226	770,094

Cash Flows Information

The Company applies R.O.C. SFAS No. 17, "Statement of Cash Flows" which is similar to U.S. GAAP. The principal differences between the two standards relate to classification. Under R.O.C. GAAP, all certificates of deposit are classified as cash and cash equivalents. Under U.S. GAAP, cash equivalents are short-term, highly liquid investments that are readily convertible to cash with original maturities of three months or less. As of December 31, 2010, 2011 and 2012, the amount of time deposit with original maturities more than three months was NT$238 million, NT$8 million and NT$104 million, respectively. Summarized cash flow information under U.S. GAAP would be presented as follows:

	For the years ended December 31,			
	2010	2011	2012	
	NT$'000	NT$'000	NT$'000	US$'000
Net cash inflows (outflows) from:				
Operating activities	53,495,013	41,653,800	40,535,119	1,395,357
Investing activities	(46,276,452)	(54,890,561)	(49,244,648)	(1,695,169)
Financing activities	(10,173,874)	9,922,989	3,587,749	123,503
Effect of exchange rate changes on cash and cash equivalents	(424,041)	1,342,294	(1,451,858)	(49,978)
Net decrease in cash and cash equivalents	(3,379,354)	(1,971,478)	(6,573,638)	(226,287)
Cash and cash equivalents at January 1	54,412,960	51,033,606	49,062,128	1,688,886
Cash and cash equivalents at December 31	51,033,606	49,062,128	42,488,490	1,462,599

Net income attributable to the Company and transfers (to) from noncontrolling interests are as follows:

	For the years ended December 31,			
	2010	2011	2012	
	NT$'000	NT$'000	NT$'000	US$'000
Net income attributable to the Company	23,616,120	8,745,675	5,055,197	174,017
Transfers (to) from noncontrolling interests				
Increase (Decrease) in the Company's paid-in capital for additional purchasing of subsidiaries' common shares	408,011	(310,113)	(12,181)	(419)
Increase (Decrease) in the Company's paid-in capital for subsidiaries' employees exercise of the stock options	(25,500)	(15,511)	3,838	132
Net transfers (to) from noncontrolling interests	382,511	(325,624)	(8,343)	(287)
Change from net income attributable to the Company and transfers from noncontrolling interests	23,998,631	8,420,051	5,046,854	173,730

Exit or disposal activities

During Q3 2012, the Company's Board of Directors approved the closure of the Company's foundry operation in Japan. The closure is intended to integrate the Company's manufacturing resources and reduce operating costs. Following this closure, the Company will maintain its presence in Japan, through its global customer service logistics network, leveraging manufacturing facilities in Taiwan and Singapore.

In connection with the decision to close UMCJ, the Company announced the provision of one-time termination benefits plan in Japan. Total termination cost expected to be recognized was approximately NT$770 million in accordance with ASC 420, *Exit or Disposal Cost Obligations*, of which NT$628 million was incurred and recognized as operating and manufacturing related expenditures within the Wafer fabrication segment for the year ended December 31, 2012. The Company paid NT$94 million in 2012, with the remaining cost to be paid in 2013 according to the UMCJ closure plan.

Concentration of credit risk

The Company designs, develops, manufactures and markets a variety of semiconductor products. Financial instruments that potentially subject the Company to significant concentrations of credit risk consist principally of cash and cash equivalents and trade accounts and notes receivable. The Company limits its exposure to credit loss by depositing its cash and cash equivalents with high credit quality financial institutions. The Company's revenues and trade accounts and notes receivable are derived primarily from the sale of production foundry wafers, including memory and logic products and wafers. For the years ended December 31, 2010, 2011, and 2012, the Company distributed its products on a global basis but mainly to customers in Asia (67.87%, 64.04%, and 71.91%, respectively), America (16.88%, 17.92%, and 13.29%, respectively) and others (15.25%, 18.04%, and 14.80%, respectively). The Company's sales are primarily derived from wafer sales and denominated in US Dollars. Two customers' revenue represented 11% and 11%, respectively, of the consolidated revenue for the year ended December 31, 2010, and two customers' revenue represented 13% and 10%, respectively, of the consolidated revenue for the year ended December 31, 2011, and two customers' revenue represented 14% and 12%, respectively, of the consolidated revenue for the year ended December 31, 2012. The Company routinely assesses the financial strength of substantially all customers. The Company also requires collateral for certain sales to mitigate the credit risk.

New accounting pronouncements

In December 2011, the FASB issued ASU 2011-11 *Balance Sheet* (Topic 210) Disclosures about Offsetting Assets and Liabilities. The new requirement is about disclosure of the nature of an entity's rights of setoff and related arrangements associated with its financial instruments and derivative instruments. The Update is designed to make financial statements that are prepared under U.S. GAAP more comparable to those prepared under IFRSs. The ASU is effective for annual reporting periods beginning on or after January 1, 2013, and interim periods within those annual periods, with retrospective application required. This standard is not expected to have a material impact on the Company's future consolidated financial statements.

In July 2012, the FASB issued ASU 2012-02 *Intangibles—Goodwill and Other* (Topic 350) Testing Indefinite-Lived Intangible Assets for Impairment. The amendment is intended to simplify testing of indefinite-lived intangible assets for impairment providing the option to perform "qualitative" assessment first. If, after assessing the totality of events and circumstances, an entity concludes that it is not more likely than not that the indefinite-lived intangible asset is impaired, the requirement to perform quantitative impairment test is eliminated by this standard. The amendment is effective for annual and interim impairment tests performed for fiscal years beginning after September 15, 2012, with early adoption permitted. This standard is not expected to have a material impact on the Company's consolidated financial statements.

In January 2013, the FASB issued ASU 2013-01 *Balance Sheet* (Topic 210) Clarifying the Scope of Disclosures about Offsetting Assets and Liabilities. The amendments in this Update clarify that the scope of the disclosures under U.S. GAAP is limiting the scope of the new balance sheet offsetting disclosures to derivatives, repurchase agreement and reverse repurchase agreement, and securities lending and securities borrowing transactions to the extent that they are (1) offset in the financial statements or (2) subject to an enforceable master netting arrangement or similar agreement. The ASU is effective for fiscal years beginning on or after January 1, 2013, and interim periods within those annual periods, with retrospective for all comparative periods presented required. This standard is not expected to have a material impact on the Company's consolidated financial statements.

In February 2013, the FASB issued ASU 2013-02 *Comprehensive Income* (Topic 220) Reporting of Amounts Reclassified Out of Accumulated Other Comprehensive Income. The amendment requires an entity to provide information about reclassification adjustments out of accumulated other comprehensive income by component, either on the face of the statement where net income is presented or in the notes, based on its source and the income statement line items affected by the reclassification. If a component is not required to be reclassified to net income in its entirety (e.g., the net periodic pension cost), the Company would instead cross reference to the related footnote for additional information (e.g., the pension footnote). The amendment is effective prospectively for reporting periods beginning after December 15, 2012. The Company is currently evaluating the impact that the adoption of ASU 2013-02 will have on its consolidated financial statements.

In February 2013, the FASB issued ASU 2013-04 *Liabilities* (Topic 405) Obligations Resulting from Joint and Several Liability Arrangements for Which the Total Amount of the Obligation Is Fixed at the Reporting Date. This Update requires an entity to measure obligations resulting from joint and several liability arrangements for which the total amount of the obligation within the scope of this guidance is fixed at the reporting date, as the sum of (a) the amount the reporting entity agreed to pay on the basis of its arrangement among its co-obligors and (b) any additional amount the reporting entity expects to pay on behalf of its co-obligors. It also requires an entity to disclose the nature and amount of the obligation as well as other information about those obligations. The ASU is effective for fiscal years beginning after December 15, 2013 with early adoption permitted. This standard is not expected to have a material impact on the Company’s consolidated financial statements.

In February 2013, the FASB issued ASU 2013-05 *Foreign Currency Matters* (Topic 830) Parent’s Accounting for the Cumulative Translation Adjustment upon Derecognition of Certain Subsidiaries or Groups of Assets within a Foreign Entity or of an Investment in a Foreign Entity. The amendments in this Update clarify the applicable guidance for the release of the cumulative translation adjustment under current U.S. GAAP. The amendment clarifies the cumulative translation adjustment should be released into net income when the sale of an investment in a foreign entity includes both (1) events that result in the loss of a controlling financial interest in a foreign entity and (2) events that result in an acquirer obtaining control of an acquiree in which it held an equity interest immediately before the acquisition date. The ASU is effective for fiscal years beginning after December 15, 2013. The amendments should be applied prospectively to derecognition events occurring after the effective date. Prior periods should not be adjusted. An entity is permitted to early adopt the amendments, and should apply them as of the beginning of the entity’s fiscal year of adoption. The Company is currently evaluating the potential impact, if any, that the adoption of ASU 2013-05 will have on its consolidated financial statements.

Exhibit 1.1

(Translation)
Articles of Incorporation of United Microelectronics Corporation

Last Updated: June 15, 2011

Section I General Provisions

Article 1 The Company shall be incorporated as a company limited by shares under the Company Law and its name shall be "United Microelectronics Corporation."

Article 2 The scope of business of the Company shall be as follow:

1. Integrated circuits;
2. Various semiconductor parts and components, such as Hybrid Circuits, IC Cards and Circuit Modules, etc.;
3. Parts and components of microcomputers, microprocessors, peripheral support and system products, such as Contact Image Sensors (CIS) and Liquid Crystal Displays (LCD), etc.;
4. Parts and components of Semiconductor memory and its systems products;
5. Parts and components of semiconductor and its systems products used in digital signal acquisition and transmission system;
6. Parts and components of semiconductor and its systems products used in telecommunication systems;
7. Testing and packaging of integrated circuits
8. Production of mask; research and development, design, production, sales, promotion and after sale service of all above items and their application products.
9. Also engage in export/import trade business in relation to the business of the Company.

Article 2-1 The Company may act as a guarantor.

Article 2-2 When the Company becomes a shareholder of limited liability in other companies, the total amount of its investment may not be subject to the restriction of not exceeding 40% of its own paid-in capital as provided in Article 13 of the Company Law.

Article 3 The Company shall have its head-office in Hsinchu Science-based Industrial Park and, if necessary, may set up branches or business offices in and out of this country upon a resolution of its Board of Directors and approval from the competent government authority.

Article 4 Public notices of the Company shall be made in accordance with Article 28 of the Company Law.

Section II Shares

Article 5 The total capital amount of the Company shall be Two Hundred and Sixty billion New Taiwan Dollars accounting for Twenty Six billion shares, at a par value of Ten New Taiwan Dollars (NT$10) per share. Board of Directors is authorized to issue the unissued shares in installments. The issue price per share will be determined by the Board of Directors pursuant to the ROC Company Law or relevant securities-related laws and regulations.

The capital, within fifteen billion New Taiwan Dollars, is for corporate bonds with equity warrants, which is one thousand and five hundred million shares, at a par value of ten New Taiwan Dollars (NT$10) per share. Board of Directors is authorized to issue the unissued shares in installments depending on the business needs of the Company.

Moreover, the capital, within twenty billion New Taiwan Dollars, is for warrant, which is two billion shares at a par value of Ten New Taiwan Dollars (NT$10) per share. Board of Directors is authorized to issue the unissued shares in installments depending on the business needs of the Company.

Article 6 The share certificate of the Company can be all name-bearing share certificates and shall be signed by, and affixed with the seals or by signature of, at least three directors of the Company, and issued after duly authentication pursuant to the law.

The Company can also deliver shares by wiring into account books based on related regulations, rather printing physical shares. When issuing other securities, the same rule applies.

Article 7 Registration for transfer of shares shall all be suspended 60 days before the convocation of any ordinary shareholders' meeting, 30 days before the convocation of extraordinary shareholders' meeting, or 5 days before the record day for distribution of dividend, interest and bonus or any other benefit as scheduled by the Company.

Section III Shareholders' Meeting

Article 8 Shareholders' meeting shall be of two types, namely general and extraordinary shareholders' meeting; the former shall be convened once a year by the Board of Directors in accordance with laws within six months after the close of each accounting fiscal year and the latter shall be convened in accordance with laws whenever necessary.

Article 9 In case a shareholder is unable to attend a shareholders' meeting, he/she may issue proxy printed by the Company setting forth the scope of authorization by signing or affixing his/her seal on the proxy form for the representative to be present on his/her behalf.

Article 10 Unless otherwise provided in the Laws, a shareholder of the Company shall have one vote for each share held by him.

Article 11 Unless otherwise provided in the Company Law, Securities and Exchange Act or other Laws, resolution shall be made at the meeting attended by shareholders holding and representing majority of the total number of issued and outstanding shares and at which meeting a majority of the shareholders shall vote in favor of the resolution.

Section IV Directors and Audit Committee

Article 12 The Company shall have nine (9) to eleven (11) directors to be elected at a shareholders' meeting through nominating system from persons of legal capacity to serve a term of three years. A director or supervisor may be re-elected.

At least three (3) directors or one-fifth of all directors, whichever is higher, shall be the independent directors. The qualification, the limitations of shareholding and concurrently serving other positions, the methods of nomination and election and other related matters shall be subject to the applicable laws.

Article 13 The Company shall set forth the Audit Committee, which comprises of all the independent directors. The seats, the term, the authorities, the rules governing meetings and the resources the Company shall provide upon the committee's exercise of authority shall be governed by the charter of Audit Committee, which will be set forth separately.

Article 13-1 The Company established a Remuneration Committee, of which the number of members, duration of duty, rights of duty, rules of procedure, and resources that the Company must provide during period of duty shall be separately determined by the Charter of the Remuneration Committee.

Article 14 The Company has to purchase D&O for directors during their terms.

Article 15 The Board of Directors shall be organized by directors. The Chairman of the Board shall be elected by majority of directors present at a meeting attended by more than two thirds of directors. The directors may also elect a vice Chairman of the Board whenever they may deem necessary to carry out the Company's activities. The Chairman of the Board shall internally be the Chairman of the meeting of shareholders, Board of Directors and managing directors' meeting and externally represent the Company.

Article 16 In case the Chairman of the Board of Directors is on leave or unable to perform his duties for cause, the vice Chairman of the Board of Directors, if any, shall act as the Chairman. If there is no vice Chairman of the Board or the vice Chairman of the Board is also on leave or unable to perform his duties for cause, the Chairman of the Board shall designate a director to act as the chairman. If no such designation, the directors shall elect one from among themselves.

Article 16-1 In case a board member is unable to attend the Board of Directors' meeting, he/she may issue proxy setting forth the scope of authorization by signing or affixing his/her seal on the proxy form for another board member to present on his/her behalf. The representative shall serve as the proxy for one director only.

Other than demanded by ROC Company Law, Securities and Exchange Act or other Laws, the resolution of the board of directors shall be adopted by a majority of the directors present at the meeting attended by more than half of the directors.

Article 17 Remunerations for all directors shall be decided by the Board of Directors authorized by a meeting of shareholders according to involvements and contributions to the Companies' operation and at the normal rate adopted by other firms of the same industry.

Article 18 The Board of Directors shall have the following functions and responsibilities:

1. Examination and review of operational policy and medium and long-term development plans.
2. Review of and supervision over execution of annual business plans.
3. Approval of budget and examination of the final settlement of account.
4. Examination of capital increase/decrease plans.
5. Examination of earnings distribution or loss making up programs.
6. Examination and approval of important contracts.
7. Examination of Articles of Incorporation or amendments thereof.
8. Approval of organizational by-laws and important business rules.
9. Decision in establishment, reorganization or removal of branch offices.
10. Approval of major capital expenditure plans.
11. Appointment and discharge of managers.
12. Execution of resolutions adopted at shareholders' meeting.
13. Examination of matters proposed by general manager for decision.
14. Convocation of shareholders' meeting and making business reports.
15. Other matters to be handled in accordance with the laws.

Article 19 Except for the authority provided under Paragraph 4, Article 14-4 of the Securities and Exchange Act, the authorities granted to each of the supervisor under the Company Act, the Securities and Exchange Act and other laws shall be granted to and exercised by the Audit Committee. Provisions of Paragraph 4, Article 14-4 of the Securities and Exchange Act which are relating to the supervisor's activities and capacity of being the representative of a company provided under the Company Act shall apply mutatis mutandis to each independent director, a member of the Audit Committee.

Section V Managers

Article 20 The Company may have one Chief Executive Officer and several managers, whose appointments, discharge, and remunerations shall be subject to provisions in Article 29 of the ROC Company Law as well as related regulations. The title and scope of authority of the managers are to be determined by the board of directors, and the board of directors can authorize the chairman to determine.

Section VI Accounting

Article 21 The Board of Directors shall prepare at the close of each accounting fiscal year for the Company (1) Business Report, (2) Financial Statements, (3) Proposal of Distribution of Earnings or Making Up of Loss, etc. and submit the same to the general shareholders meeting for acceptance.

Article 22 After making the final settlement of account, the Company shall allocate the net profit ("earnings"), if any, according to the following sequence:

1. Payment of taxes.
2. Making up loss for preceding years.
3. Setting aside 10% for legal reserve.
4. Appropriating or reversing special reserve by government officials or other regulations
5. Allocation of 0.1% of residual amount after deducting the amounts stated in Items 1 through 4 above for remuneration of directors
6. The amount of no less than 5% of the residual amount after distribution of item 1 to 4, plus undistributed earnings from previous years, shall be distributed as bonus to employees in the form of cash or new shares. The employees to receive stock bonus may include certain qualified employees from affiliate companies and the qualification of such employees is to be decided by the board of directors.
7. The rest shall be distributed according to the distribution plan proposed by the board of directors according to the dividend policy in paragraph two of this clause and submitted to the shareholders' meeting for approval.

Because the company is still in its growth stage, the dividend policy of the Company shall be determined pursuant to the factors, such as the investment environment, capital requirement, domestic and overseas competition environment and capital budget of the Company current or future, as well as shareholders interest, balance of dividend and long term financial plan of the Company. The Board of Directors shall propose the distribution plan and submit to the shareholders' meeting every year. The distribution of shareholders dividend shall be allocated as cash dividend in the range of 20% to 100%, and stock dividend in the range of 0% to 80%.

Section VII Additional Rules

Article 23 The organization by-law of the Company shall be provided otherwise.

Article 24 In regard to all matters not provided for in these Articles of Incorporation, the Company Law, Securities and Exchange Act or other Laws shall govern.

Article 25 These Article of Incorporation were enacted on Feb. 21, 1980 and amended on Feb. 21, 1981 for the first time, on May 16, 1981 for the second time, on Aug. 8, 1981 for the third time, on Oct. 20, 1981 for the fourth time, on Jan. 15, 1982 for the fifth time, on Apr. 28, 1983 for the sixth time, on Mar. 19, 1984 for the seventh time, on Aug. 7, 1984 for the eighth time, on Apr. 30, 1985 for the ninth time, on Apr. 26, 1986 for the tenth time, on May 23, 1987 for the eleventh time, on Mar. 5, 1988 for the twelfth time, on March 25, 1989 for the thirteenth time, on June 6, 1989 for the fourteenth time, on Apr. 14, 1990 for the fifteenth time, on Jun. 29, 1991 for the sixteenth time, on May 7, 1992 for the seventeenth time, on Apr. 22, 1994 for the eighteenth time, on May 4, 1995 for the nineteenth time, on Jun. 21, 1995 for the twentieth time, on Apr. 11, 1996 for the twenty-first time, on Jun. 24, 1997 for the twenty-second time, on May 5, 1998 for the twenty-third time, on May 13, 1999 for twenty-fourth time, on Jul. 30, 1999 for twenty-fifth time, on Apr. 7, 2000 for twenty-sixth time, on May 30, 2001 for the twenty-seventh time, on June 3, 2002 for the twenty-eighth time, on June 9, 2003 for the twenty-ninth time, on June 1, 2004 for the thirtieth time, on June 13, 2005 for the thirty-first time, on June 12, 2006 for the thirty-second time, on June 11, 2007 for the thirty-third time, and on June 13, 2008 for the thirty-fourth time,, and on June 15, 2011 for the thirty-fifth time.

Exhibit 8.1

List of Significant Subsidiaries of United Microelectronics Corporation

Company	Jurisdiction of Incorporation	Percentage of Ownership as of December 31, 2012
UMC Group (USA)	California, U.S.A.	100.00%
United Microelectronics (Europe) B.V.	The Netherlands	100.00%
UMC Capital Corp.	Cayman Islands	100.00%
TLC Capital Co., Ltd.	Taiwan, R.O.C.	100.00%
UMC New Business Investment Corp.	Taiwan, R.O.C.	100.00%
Green Earth Limited	Samoa	100.00%
Fortune Venture Capital Corp.	Taiwan, R.O.C.	100.00%
UMC Japan	Japan	100.00%
UMC Investment (Samoa) Limited	Samoa	100.00%
Unitruth Investment Corp.	Taiwan, R.O.C.	100.00%
UMC Capital (U.S.A)	California, U.S.A.	100.00%
ECP VITA PTE. LTD.	Singapore	100.00%
Soaring Capital Corp.	Samoa	100.00%
Unitruth Advisor (Shanghai) Co., Ltd.	China	100.00%
Tera Energy Development Co., Ltd.	Taiwan, R.O.C.	100.00%
Nexpower Technology Corp.	Taiwan, R.O.C.	57.33%
Wavetek Microelectronics Corporation	Taiwan, R.O.C.	74.69%
Everrich Energy Corp.	Taiwan, R.O.C.	89.38%
Everrich Energy Investment (HK) Limited	China	89.38%
Everrich (Shandong) Energy Co., Ltd.	China	89.38%
Unistars Corp.	Taiwan, R.O.C.	72.04%
Topcell Solar International Co. Ltd.	Taiwan, R.O.C.	69.91%
Smart Energy Enterprises Limited	China	89.38%
Smart Energy ShanDong Corporation	China	89.38%
Wavetek Microelectronics Investment (HK) Limited	China	74.69%
NPT Holding Limited	Samoa	57.33%
NLL Holding Limited	Samoa	57.33%
SOCIALNEX ITALIA 1 S.R.L.	Italy	57.33%
TERA ENERGY USA INC.	U.S.A.	100.00%
UMC (BEIJING) LIMITED	China	100.00%

Exhibit 12.1

CERTIFICATION OF OUR CHIEF EXECUTIVE OFFICER

I, Po-Wen Yen, certify that:

1. I have reviewed this annual report on Form 20-F of United Microelectronics Corporation;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the company as of, and for, the periods presented in this report;

4. The company’s other certifying officer and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the company and have:

   (a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the company, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

   (b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;

   (c) Evaluated the effectiveness of the company’s disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

   (d) Disclosed in this report any change in the company’s internal control over financial reporting that occurred during the period covered by this report that has materially affected, or is reasonably likely to materially affect, the company’s internal control over financial reporting; and

5. The company’s other certifying officer and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the company’s auditors and the audit committee of the company’s board of directors (or persons performing the equivalent functions):

   (a) All significant deficiencies and material weaknesses in the design or operation of internal controls over financial reporting which are reasonably likely to adversely affect the company’s ability to record, process, summarize and report financial information; and

   (b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the company’s internal controls over financial reporting.

Date: April 26, 2013

By: /s/ Po-Wen Yen

Name: Po-Wen Yen

Title: Chief Executive Officer

Exhibit 12.2

CERTIFICATION OF OUR CHIEF FINANCIAL OFFICER

I, Chitung Liu, certify that:

1. I have reviewed this annual report on Form 20-F of United Microelectronics Corporation;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the company as of, and for, the periods presented in this report;

4. The company's other certifying officer and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the company and have:

   (a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the company, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

   (b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;

   (c) Evaluated the effectiveness of the company's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

   (d) Disclosed in this report any change in the company's internal control over financial reporting that occurred during the period covered by this report that has materially affected, or is reasonably likely to materially affect, the company's internal control over financial reporting; and

5. The company's other certifying officer and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the company's auditors and the audit committee of the company's board of directors (or persons performing the equivalent functions):

   (a) All significant deficiencies and material weaknesses in the design or operation of internal controls over financial reporting which are reasonably likely to adversely affect the company's ability to record, process, summarize and report financial information; and

   (b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the company's internal controls over financial reporting.

Date: April 26, 2013

By: /s/ Chitung Liu
Name: Chitung Liu
Title: Chief Financial Officer

Exhibit 13.1

CERTIFICATION OF PERIODIC FINANCIAL REPORT
Pursuant to 18 U.S.C. Section 1350

In connection with the Annual Report of United Microelectronics Corporation, or the Company, on Form 20-F for the fiscal year ended December 31, 2012 as filed with the Securities and Exchange Commission on the date hereof, or the Report, I, Po-Wen Yen, Chief Executive Officer of the Company, hereby certify, pursuant to 18 U.S.C.§ 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, to the best of my knowledge, that:

1. The Report fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934; and
2. The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Date: April 26, 2013

By: /s/ Po-Wen Yen
Name: Po-Wen Yen
Title: Chief Executive Officer

* A signed original of this written statement required by Section 906 of the Sarbanes-Oxley Act of 2002 has been provided to us and will be retained by us and furnished to the Securities and Exchange Commission or its staff upon request.

Exhibit 13.2

CERTIFICATION OF PERIODIC FINANCIAL REPORT
Pursuant to 18 U.S.C. Section 1350

In connection with the Annual Report of United Microelectronics Corporation, or the Company, on Form 20-F for the fiscal year ended December 31, 2012 as filed with the Securities and Exchange Commission on the date hereof, or the Report, I, Chitung Liu, Chief Financial Officer of the Company, hereby certify, pursuant to 18 U.S.C.§ 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, to the best of my knowledge, that:

1. The Report fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934; and
2. The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Date: April 26, 2013

By: /s/ Chitung Liu
Name: Chitung Liu
Title: Chief Financial Officer

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* A signed original of this written statement required by Section 906 of the Sarbanes-Oxley Act of 2002 has been provided to us and will be retained by us and furnished to the Securities and Exchange Commission or its staff upon request.

Exhibit 15.1

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in the following Registration Statements pertaining to the employee stock option plans of United Microelectronics Corporation:

1. Registration Statement (Form S-8 No. 333-102605) pertaining to the Employee Stock Option Plan,
2. Registration Statement (Form S-8 No.333-126889) pertaining to the Employee Stock Option Plan and the 2004 Employee Stock Option Plan, and
3. Registration Statement (Form S-8 No.333-142809) pertaining to the 2004 Employee Stock Option Plan and 2005 Employee Stock Option Plan

of our reports dated April 26, 2013, with respect to the consolidated financial statements and the effectiveness of internal control over financial reporting of United Microelectronics Corporation, included in its Annual Report (Form 20-F) for the year ended December 31, 2012 filed with the Securities and Exchange Commission.

/s/Ernst & Young
Ernst & Young
Taipei, Taiwan,
Republic of China
April 26, 2013