

Management's Discussion and Analysis (MD&A) and operating results for the three-month and nine-month periods ended September 30, 2012

1. PTT and its subsidiaries' performance

The world economy slowed more than expected during the third quarter of 2012 (Q3/2012) as developing and emerging economies, especially China and India, were affected by a decline in exports and domestic consumption and investment. Meanwhile, the developed economies, specially the Euro Area, remain in recession as a result of austerity measures reducing domestic consumption and investment. Even so, an effort by the European Central Bank (ECB) in announcing a sterilized unlimited bond-buying program, also known as Outright Monetary Transaction (OMT), has led to a slight improvement in the sovereign debt crisis situation. As for the U.S., the economic recovery remains fragile leading the Federal Reserve (Fed) to launch a third round of quantitative easing (QE3) in late Q3/2012 in order to stimulate the economy until the labor market improves. As such, the IMF in October 2012 slightly revised down the world economic growth forecast to 3.3% from 3.5%, in 2012.

The International Energy Agency (IEA) reported in October 2012 that the global oil demand in Q3/2012 was 90.1 million barrels per day (MMBPD), increased from 89.0 and 89.5 MMBPD in Q2/2012 and Q3/2011 respectively. The average Dubai crude oil price in Q3/2012 was relatively stable at US\$ 106.3 per barrel, compared to US\$ 106.4 per barrel in the Q2/2012 while slightly decreased from US\$ 107.1 per barrel in Q3/2011. The supportive factors for high level of oil price came from the escalation of tension between Israel and Iran, unrest in Syria coupled with the stimulus measures.

The Thai economy in Q3/2012 expanded at a decreasing rate from Q2/2012 as the global economic slowdown continued to affect Thai exports and export-oriented manufacturing sector. Nonetheless, consumption spending via the stimulus measures coupled with public investment still played important roles in supporting economic expansion. The Bank of Thailand in October 2012 projected an expansion of 5.7% to the Thai economy in 2012, unchanged from the previous projection in July 2012.

The Government has implemented a policy to minimize expenditure burden. In August 2012, the Cabinet agreed to reduce 50 satang per liter of ULR 91 and ULG 95 retail prices for oil fund levy and to control the diesel price not to exceed 30 baht per liter. LPG price in transportation sector was raised 25 satang to 21.38 baht per kilogram in August 2012. LPG for fuel consumption in household sector still capped price at 18.13 baht per kilogram. In contrast, LPG for fuel consumption in industrial sector was raised to 29.56 baht per kilogram in August 2012 and to 30.13 baht per kilogram in September 2012. For NGV, in 14 August 2012, Energy Policy Management Committee (EPMC) agreed to maintain the capped price at 10.50 baht per liter until end of 2012.

As a result of the factors mentioned above, PTT and its subsidiaries' financial performance comparison of Q3/2012 with Q3/2011 and Q2/2012 as well as comparison of 9M/2012 with 9M/2011 are as follows:

	Q3/2011	Q2/2012	Q3/2012	% Inc.(Dec.)		9M/2011	9M/2012	Inc. (Dec.) %
				YoY	QoQ			
Dubai crude price (US\$/bbl)	107.1	106.4	106.3	(0.8%)	(0.1%)	106.1	109.6	3.3%
Sales & services	648,366	682,817	686,025	5.8%	0.5%	1,832,799	2,060,947	12.5%
: Exploration & Production	42,412	50,113	56,228	32.6%	12.2%	123,994	154,880	24.9%
: Natural gas ^{1/}	109,550	126,275	130,914	19.5%	3.7%	307,798	374,987	21.8%
: Oil ^{2/}	142,326	157,284	147,113	3.4%	(6.5%)	417,147	456,611	9.5%
: International Trading ^{3/}	394,211	392,572	395,630	0.4%	0.8%	1,090,858	1,205,315	10.5%
: Petrochemical ^{4/}	17,733	19,669	22,884	29.0%	16.4%	56,636	61,740	9.0%
: Coal ^{5/}	7,100	7,421	8,451	19.0%	13.9%	21,193	21,700	2.4%
: Others ^{6/}	687	1,348	1,041	51.5%	(22.8%)	2,075	3,266	57.4%
: Elimination	(65,653)	(71,865)	(76,236)	(16.1%)	(6.1%)	(186,902)	(217,552)	(16.4%)
EBITDA	52,886	59,554	56,309	6.5%	(5.5%)	159,774	174,529	9.2%
: Exploration & Production	29,379	36,600	40,193	36.8%	9.8%	85,538	112,435	31.4%
: Natural gas	16,832	14,976	12,067	(28.3%)	(19.4%)	52,315	43,007	(17.8%)
: Oil	3,236	4,556	2,906	(10.2%)	(36.2%)	10,350	12,255	18.4%
: International Trading	(43)	(344)	(2,195)	n.m.	n.m.	1,752	(2,255)	n.m.
: Petrochemical	1,192	801	970	(18.6%)	21.1%	3,163	2,311	(26.9%)
: Coal	2,040	2,588	2,322	13.8%	(10.3%)	6,076	6,109	0.5%
: Others	159	183	378	n.m.	n.m.	342	743	n.m.
: Elimination	91	194	(332)	n.m.	n.m.	238	(76)	n.m.
EBIT	40,126	44,012	38,641	(3.7%)	(12.2%)	120,468	126,033	4.6%
: Exploration & Production	21,391	26,621	28,530	33.4%	7.2%	60,306	80,761	33.9%
: Natural gas	13,638	11,626	8,654	(36.5%)	(25.6%)	42,985	32,867	(23.5%)
: Oil	2,655	3,980	2,312	(12.9%)	(41.9%)	8,517	10,515	23.5%
: International Trading								
- Excluded Effect of FX	(46)	(347)	(2,199)	n.m.	n.m.	1,742	(2,265)	n.m.
- Included Effect of FX	504	790	513	1.8%	(35.1%)	4,073	2,732	(32.9%)
: Petrochemical	873	553	718	(17.8%)	29.8%	2,456	1,556	(36.6%)
: Coal	1,663	1,535	986	(40.7%)	(35.8%)	4,723	2,995	(36.6%)
: Others	(139)	(152)	(29)	79.1%	80.9%	(501)	(323)	35.5%
: Elimination	91	196	(331)	n.m.	n.m.	240	(73)	n.m.
Depreciation	12,760	15,542	17,668	38.5%	13.7%	39,307	48,497	23.4%
Finance costs	4,570	4,794	5,006	9.5%	4.4%	13,443	14,268	6.1%
Gain (loss) on foreign exchange	(5,362)	(2,302)	3,408	n.m.	n.m.	(1,552)	4,038	n.m.
Income taxes	10,378	15,695	8,935	(13.9%)	(43.1%)	35,595	34,061	(4.3%)
Net income	21,471	8,513	36,054	67.9%	n.m.	88,670	81,954	(7.6%)
Earnings per share (Baht/share)^{7/}	7.52	2.98	12.62	67.9%	n.m.	31.09	28.69	(7.7%)

Notes : /1 Including the natural gas business, the consolidation of PTT Natural Gas Distribution Co., Ltd. (PTTNGD) PTT LNG Co., Ltd (PTTLNG), Combined Heat and Power Producing Company Limited (CHPP) and the proportionate consolidation of Trans Thai-Malaysia

(Thailand) Co.,Ltd. (TTM (T)), Trans Thai-Malaysia (Malaysia) Sdn. Bhd. (TTM (M)) and District Cooling System and Power Plant Co., Ltd. (DCAP).

/2 Including the oil marketing business, the consolidation of PTT (Cambodia) Co., Ltd. (PTTCL), Subic Bay Energy Co., Ltd. (SBECL), and PTT Retail Business Co., Ltd. (PTTRB) and the consolidated Thai Lube Blending Company Limited (TLBC) due to the 100% TLBC's shares together acquisition by PTTRB and PTT.

/3 Including the international trading business and the consolidation of PTT International Trading Pte Ltd (PTTT).

/4 Including the consolidation of PTT Polymer Marketing Co., Ltd. (PTTPM), PTT Polymer Logistics Co., Ltd. (PTTPL) and PTT Tank Terminal Co., Ltd. (PTT TANK), PTT Asahi Chemical Co., Ltd. (PTTAC), HMC Polymers Co., Ltd. (HMC) and PTT MCC BioChem Co.,Ltd. (PTT MCC)

/5 Including PTT Asia Pacific Mining Pty Ltd. (PTTAPM) which PTT Mining Limited (PTTML), a subsidiary of PTTI, holds 100% shareholding which increased from 60% shareholding due to additional investing on the acquisition of International Coal Holdings Limited (ICH) which has 40% shareholding in PTTAPM on March 15, 2011.

/6 Including the consolidation of Energy Complex Co., Ltd. (EnCo), Business Services Alliance Co., Ltd. (BSA), PTT Green Energy Pte Ltd (PTTGE) and PTT International Company Limited (PTTI).

/7 Basic earnings per share is calculated by dividing net income attributable to ordinary shareholders by the weighted average number of ordinary shares which are held by third parties during the periods.

1.1 Overall performance of PTT and its subsidiaries

Third quarter of 2012 compared with third quarter of 2011

In Q3/2012, sales revenue of PTT and its subsidiaries was Baht 686,025 million increasing by 5.8% from Q3/2011, though the average Dubai crude oil price decreased from US\$ 107.1 per barrel in Q3/2011 to US\$ 106.3 per barrel in Q3/2012. Earning before finance costs, income taxes, depreciation and amortization, and other non-operating income and expenses (EBITDA) rose by Baht 3,423 million or 6.5% principally due to the better performance of PTT Exploration and Production Company Limited (PTTEP). In addition, share of gain from investments in associates in Q3/2012 was Baht 13,217 million, increasing from Q3/2011 by 195.8% mainly resulted from the better performance of refinery and petrochemical associates. Although, there was the global economic recession and prolong EU debt crisis in Q3/2012, the supply shortage of petroleum due to planned and unplanned shut down of some refineries, for example, fired at Chevron's Richmond refinery in USA and PDVSA's Amuay refinery in Venezuela, boost the Gross Refinery Margin (GRM) in Q3/2012 compared with Q3/2011. Petrochemical associates also had the better performance because of the higher spread margin, especially Ethylene, due to planned and unplanned shut down and the reduction in Naphtha Cracker production in Asia resulting in lower productions in North East Asia. In addition, the spread margin of Aromatics, especially Benzene, increased since many Olefins plants especially in Asia, U.S. and Europe continued its production cut due to low Olefins demand together with planned maintenance plants shutdown, resulted in less Benzene by-products in the market. In Q3/2012, PTT and its subsidiaries had the gain on foreign exchange rate of 3,408 million, rose by 163.6% from loss on foreign exchange rate of Baht 5,362 million in Q3/2011, and corporate income taxes of Baht 8,935 million decreased from Q3/2011 by Baht 1,443 million or 13.9%. Therefore, net income of PTT and its subsidiaries in Q3/2012 increased by Baht 14,583 baht or 67.9% from Baht 21,471 million in Q3/2011 (or Bath 7.52 per share) to Baht 36,054 million of Q3/2012 (or Baht 12.62 per share)

Third quarter of 2012 compared with Second quarter of 2012

In Q3/2012, sales revenue of PTT and its subsidiaries was Baht 686,025 million, increasing by 0.5% from Q2/2012, while the average Dubai crude oil price slightly decreased from US\$ 106.4 per barrel in Q2/2012 to US\$106.3 per barrel. EBITDA dropped by Baht 3,245 million or 5.5% mainly due to the lower performance of Natural gas, International Trading and Oil businesses, though PTTEP had the better performance. Moreover, share of gain from investments in associates in Q3/2012 was Baht 13,217 million, increasing from the share of loss from investments in associates of Baht 4,354 million in Q2/2012 by 403.6%, mainly arose from the better performance of refinery and petrochemical associates. As a result of the dramatic decrease in crude oil price during late of Q2/2012, resulting from the prolong EU debt crisis, the positive sentiment regarding turmoil in oil producing countries as well as the increase in global supply, there was the stock loss and loss from inventory's net realizable value (NRV) in Q2/2012, while there was the stock gain in Q3/2012 due to the relieved market concerns on EU debt crisis and tighten supply in many regions as well as increasing demand from holiday and winter season. Moreover, the FED announced the Quantitative Easing 3 (QE3) which boosted GRM in Q3/2012. In addition, Petrochemical associates also had the better performance because of the higher utilization rate and increasing sales volume, partly from more feedstock supply from GSP to Olefins plants, while spread margin of Olefins and Aromatics squeezed, especially MEG, due to the drop in demands from polyester producers resulting in an unstable economy. Whereas the spread margin of Paraxylene products decreased because of the lower demand growth of intermediate and downstream products. Furthermore, PTTI recognized impairment losses of its investment in East Mediterranean Gas S.A.E. (EMG) amounting to Baht 3,972 million and PTTEP recognized impairment loss on Montara assets amounting to Baht 3,455 million in Q2/2012. Income taxes of PTT and its subsidiaries in Q3/2012 was Baht 8,935 million, decreasing from Q2/2012 by Baht 6,760 million or 43.1%. Consequently, net income of PTT and its subsidiaries increased by Baht 27,541 million or 323.5% from Baht 8,513 million (or Baht 2.98 per share) in Q2/2012 to Baht 36,054 million (or Baht 12.62 per share) in Q3/2012.

First nine months of 2012 compared with First nine months of 2011

For the first 9-month of 2012 (9M/2012), sales revenue of PTT and its subsidiaries was Baht 2,060,947 million, increasing by 12.5% from the first 9-month of 2011 (9M/2011) mainly due to the increase in the sales prices of products. The average Dubai crude oil price increased from US\$ 106.1 per barrel in 9M/2011 to US\$ 109.6 per barrel in 9M/2012, resulting in increased EBITDA by Baht 14,755 million, or 9.2%. This increase was principally generated by the better performance of PTTEP and Oil Business. However, share of net income from investments in associates in 9M/2012 was amounting to Baht 19,152 million, decreased 26.7% from 9M/2011 owing to the lower performance of refinery associates. Despite the rising in crude oil price in comparison with 9M/2011, the decelerated global economic and the continuous debt crisis in Eurozone affected a volatility in oil market. Moreover, in 9M/2011, supply was tightening due to the turmoil in Middle East countries. As a result, stock gain decreased in 9M/2012 when compared with 9M/2011. For the petrochemical associates, their performances were reduced by the lower spread margins of almost all products, especially in LDPE, following weaker economic growth in Europe which is its major market. Moreover, in 9M/2011, there was the Paraxylene supply shortage following the shutdowns of Paraxylene

plants and the gradual increase in demand of new PTA plants in China, while in 9M/2012, the spread margin of Paraxylene declined mainly due to many PTA plants reduced their utilization rate after prolonging losses from operation, leading to lower spread margin compared with 9M/2011.

In 9M/2012, PTT and its subsidiaries had the gain on foreign exchange rate amounting to Baht 4,038 million, increased by 360.1% from the loss on foreign exchange rate amounting to Baht 1,552 million in 9M/2011. The income taxes of PTT and its subsidiaries in 9M/2012 was Baht 34,061 million, decreased by Baht 1,534 million or 4.3%. Nevertheless, PTTI recognized impairment losses of its investment in EMG amounting to Baht 3,972 million and PTTEP recognized impairment loss on Montara assets amounting to Baht 3,455 million. Consequently, the net income of PTT and its subsidiaries in 9M/2012 decreased by Baht 6,716 million or 7.6% from Baht 88,670 million in 9M/2011 (or Baht 31.09 per share) to Baht 81,954 million in 9M/2012 (or Baht 28.69 per share) of which 46% was generated from PTT itself, while 54% was contributed from the affiliates according to the shares of investment percentage.

Segmentation performance of PTT and its subsidiaries

1.2.1 Upstream Petroleum and Natural Gas Group

- **Petroleum Exploration and Production Business: PTT Exploration and Production Public Co., Ltd. (PTTEP)**

Third quarter of 2012 compared with Third quarter of 2011

In Q3/2012, sales revenue of PTTEP, a subsidiary of PTT, was Baht 56,228 million, increasing by Baht 13,816 million or 32.6% from Q3/2011, mainly due to the higher sales volume and average selling price, rose by 15.6% from US\$ 55.4 per barrel of oil equivalent (BOE) in Q3/2011 to US\$ 64.0 per BOE in Q3/2012 in relation to higher global oil price, and the average sale volume, rose from 264,961 barrel of oil equivalent per day (BOED) in Q3/2011 to 292,228 BOED in Q3/2012. This average sale volume increased resulted mainly from the Bongkot project, which the Bongkot South starting its production as required by the Gas Sale Agreement in June 2012 while the Bongkot North partially shut down for 15 days in Q3/2011, while there was no shutdown in Q3/2012. Moreover, there were the higher productions from 5 new wells of the Vietnam 16-1 project and from Beam Pump activities of the S1 project. However, in Q3/2012 the average sale volume of natural gas and condensate decreased mainly due to the ceasing production of the Arthit North project since November 2011 and the longer planned shutdown of the MTJDA-B17 project in Q3/2012.

EBITDA in Q3/2012 was Baht 40,193 million, increasing by Baht 10,814 million or 36.8% from Q3/2011 due to the increase in average sales price and sale volume as aforementioned, although the petroleum exploration expenses increased by Baht 1,592 million in Q3/2012 in relation to the higher sale revenue. The administrative expenses increased due to stamp duties from share acquisition of Cove Energy Plc. and export duties of Vietnam 16-1 project.

EBIT in Q3/2012 was Baht 28,530 million, increasing by Baht 7,139 million or 33.4% from Q3/2011 mainly due to the increase in EBITDA as aforementioned, even though the depreciation, depletion and amortization expense escalated mainly from the Bongkot project and the S1 project in relation to the increase in the completed assets of the Vietnam 16-1 project.

Third quarter of 2012 compared with Second quarter of 2012

In Q3/2012, sales revenue of PTTEP was Baht 56,228 million, increasing by Baht 6,115 million or 12.2% from Q2/2012, mainly due to the sales volume rose from 263,441 barrels of oil equivalent per day (BOED) in Q2/2012 to 292,228 BOED in Q3/2012 principally resulted from the higher production from 5 new wells of the Vietnam 16-1 project and the Bongkot South starting its production as required by the Gas Sale Agreement in June 2012 and no planned shutdown of the Bongkot North in Q3/2012 while there was a planned shutdown of 11 days in Q2/2012. However, the average sale volume of natural gas and condensate of the Arthit, the Contract 4 and the MTJDA-B17 projects in Q3/2012 decreased. The average selling price decreased from US\$ 64.17 per BOE in Q2/2012 to US\$ 64.0 per BOE in Q3/2012.

EBITDA in Q3/2012 was Baht 40,193 million, increasing by Baht 3,593 million or 9.8% from Q2/2012 due to the increase in the sales volume as aforementioned, together with the decrease of petroleum exploration expenses in Q3/2012 by Baht 415 million comparing with Q2/2012, which had the exploratory well write-off costs of the Bahrain 2 project and the Algeria Hassi Bir Rekaiz project. Even though, there were the increase in petroleum royalties and remuneration expense by amounting to Baht 694 million and the rose of administrative expenses due to the tax duties from acquisition Cove Energy Ltd and the export taxes duties of the Vitenam 16-1 Project in Q3/2012.

EBIT in Q3/2012 was Baht 28,530 million, increasing by Baht 1,909 million or 7.2% from Q2/2012, in line with the increase in EBITDA as aforementioned. However, there was the rose of depreciation and amortization expense mainly because of the increase in completed assets and production volume in the Bongkot, the Vietnam 16-1 and the S1 projects.

First nine months of 2012 compared with First nine months of 2011

In 9M/2012, sales revenue of PTTEP was Baht 154,880 million, increasing by Baht 30,886 million or 24.9% from 9M/2011, mainly due to the average sales price rose by 19.8% from US\$ 53.7 per barrel of oil equivalent (BOE) in 9M/2011 to US\$ 64.3 per BOE in 9M/2012 in relation to the higher global oil price. However, sales volume slightly declined from 269,831 barrels of oil equivalent per day (BOED) in 9M/2011 to 269,776 BOED in 9M/2012 mainly due to the drop of natural gas and condensate from the Arthit North project because of the production cease in November 2011, and the Arthit project production decreased in line with the new daily contract quantity, even though the crude oil sales volume increased from the Vietnam 16-1 and the S1 projects, as well as the natural gas and condensate sales volume increased from the Bongkot South.

EBITDA in 9M/2012 was Baht 112,435 million, increasing by Baht 26,897 million or 31.4% from 9M/2011 due to the increase in the average sales price as aforementioned, together with the decrease in the petroleum exploration expenses by Baht 1,247 million. In 9M/2012, there were the exploratory well write-off costs of the Bahrain 2 and the Algeria Hassi Bir Rekaiz and Oman 44 projects, while there were higher exploratory well write-off costs in 9M/2011 of the Indonesia Semai II, the PTTEP Australasia, the Myanmar M7, and the Bongkot projects. However, there were the increase in petroleum royalties and remuneration in 9M/2012 because of the higher sales revenue and the increase in administrative expenses rose mainly due

to export tax duties of Vietnam 16-1 project starting its production in Q3/2011 and tax duties from the acquisition of Cove Energy Ltd.

EBIT in 9M/2012 was Baht 80,761 million, increasing by Baht 20,455 million or 33.9% from 9M/2011 mainly due to the increase in EBITDA as aforementioned. However, the depreciation and amortization expense escalated mainly due to the increase in completed assets of the Bongkot, the S1 and the Vietnam 16-1 projects, which production was started in Q3/2011, while the depreciation and amortization expense decreased in Arthit north and Arthit projects.

- **Natural Gas Business Group**

Third quarter of 2012 compared with Third quarter of 2011

Sales revenue of Natural Gas Business was Baht 130,914 million in Q3/2012 which increased by Baht 21,364 million or 19.5% from Q3/2011 due to the followings:

- The average natural gas sales volume (including natural gasoline derived from Dew Point Control Units) increased by 362 million cubic feet per day (mmcf) or 8.5% from 4,249 mmcf in Q3/2011 to 4,611 mmcf in Q3/2012 (calculated at heating value of 1,000 BTU per cubic foot). The demand of natural gas rose mainly from EGAT and GSP. The average natural gas selling price rose in all customer groups in relation to the increase in fuel oil price.

- The total product sales volume of the gas separation plants increased from 1,380,535 tons in Q3/2011 to 1,666,859 tons in Q3/2012 or increased by 20.7%, particularly in Ethane and Propane, as in Q3/2011 there was warranty shutdown in Ethane separation plant (ESP).

- The product selling price of the gas separation plant slightly dropped in relation to the global petrochemical price.

EBITDA of the gas business in Q3/2012 was Baht 12,067 million, which decreased from Q3/2011 by Baht 4,765 million or 28.3% because margin from the gas separation plant dropped due to product selling prices decreased in relation to petrochemical product prices in global market, while natural gas feedstock costs increased in relation to an increase in the fuel oil reference price. In addition, there was an increase in losses from NGV because of the higher cost of natural gas feedstock with continuous higher sales volume. As of September 30, 2012, the retail price of NGV was at Baht 10.50 per kilogram and capped selling price for the public transportation was at Baht 8.50 per kilogram. As of September 30, 2012, the accrual NGV selling compensation from the government was Baht 5,692 million. EBIT in Q3/2012 was Baht 8,654 million, decreasing from Q3/2011 by 36.5% in relation to the decrease in EBITDA.

Third quarter of 2012 compared with Second quarter of 2012

Sales revenue of Natural Gas Business was Baht 130,914 million in Q3/2012 which increased by Baht 4,639 million or 3.7% from Q2/2012 due to the followings:

- The average natural gas sales volume (including natural gasoline derived from Dew Point Control Units) increased by 104 mmcf or 2.3% from 4,507 mmcf in Q2/2012 to 4,611 mmcf in Q3/2012 (calculated at heating value of 1,000 BTU per cubic foot). The demand of natural gas rose mainly from IPP.

The average natural gas selling price in Q3/2012 increased from Q2/2012 in all customer groups except in industrial customer groups.

- The total product sales volume of the gas separation plants rose from 1,595,795 tons in Q2/2012 to 1,666,859 tons in Q3/2012 or increased by 4.5% mainly from propane.
- The product selling price of the gas separation plant dropped in relation to the global petrochemical price.

EBITDA of the gas business in Q3/2012 was Baht 12,067 million, which decreased from Q2/2012 by Baht 2,909 million or 19.4% due to the drop in profit margin of natural gas sold to industrial customer groups because the natural gas feedstock costs were higher than its selling prices which were related to fuel oil reference prices. Moreover, there were higher losses from NGV sales due to higher costs with continuous higher sales volume. Furthermore, margin of products from gas separation plant decreased due to an increase in natural gas feedstock costs in line with the fuel oil reference price. EBIT in this quarter was Baht 8,654 million, decreasing from Q2/2012 by 25.6% in relation to the decrease in EBITDA.

First nine months of 2012 compared with First nine months of 2011

Sales revenue of Natural Gas Business was Baht 374,987 million in 9M/2012 which increased by Baht 67,189 million or 21.8% from 9M/2011 due to the followings:

- The average natural gas sales volume (including natural gasoline derived from Dew Point Control Units) increased by 226 mmcf/d or 5.3% from 4,241 mmcf/d in 9M/2011 to 4,467 mmcf/d in 9M/2012 (calculated at heating value of 1,000 BTU per cubic foot). The demand of natural gas rose mainly from EGAT and industry groups. The average natural gas selling price in 9M/2012 increased from 9M/2011 in all customer groups in relation to the increase in fuel oil price.
- The total product sales volume of the gas separation plants rose from 4,319,712 tons in 9M/2011 to 4,719,606 tons in 9M/2012 or increased by 9.3%, especially Ethane and Propane, due to planned shutdown of the ethane separation plant in 9M/2011 for 29 days.
- The product price of the gas separation plant decreased in relation to the global petrochemical price.

EBITDA of the gas business was Baht 43,007 million in 9M/2012, which decreased from 9M/2011 by Baht 9,308 million or 17.8% mainly due to an increase in losses from NGV in this period in relation to the continuous increase in sales volume. Margin from the gas separation plants decreased due to an increase in natural gas feedstock costs in relation to an increase in the fuel oil reference price. EBIT was Baht 32,867 million in 9M/2012, decreasing from 9M/2011 by 23.5% in relation to the drop in EBITDA.

The details of all products sales volume from gas separation plants are as follows:

Unit : Ton	Q3/2011	Q2/2012	Q3/2012	Inc.(Dec.)		9M/2011	9M/2012	Inc. (Dec.)
				YoY	QoQ			
LPG	700,946	732,958	712,473	1.6%	(2.8%)	2,136,936	2,121,061	0.7%
Ethane	406,456	529,631	530,878	30.6%	0.2%	1,528,330	1,330,800	14.8%
Propane	110,669	154,067	231,176	n.m	50.0%	515,740	388,044	32.9%
NGL	162,464	179,139	192,332	18.4%	7.4%	538,600	479,807	12.3%
Total	1,380,535	1,595,795	1,666,859	20.7%	4.5%	4,719,606	4,319,712	9.3%

The details of reference products prices for the calculation of GSPs' products sales prices are as follows:

Unit : US\$/Ton	Q3/2011	Q2/2012	Q3/2012	Inc.(Dec.)		9M/2011	9M/2012	Inc. (Dec.)
				YoY	QoQ			
LPG ^{1/, 4/}	841	856	774	(8.0%)	(9.6%)	872	889	1.9%
Ethylene ^{2/}	1,160	1,184	1,195	3.0%	0.9%	1,224	1,210	(1.2%)
Propylene ^{2/}	1,394	1,284	1,252	(10.2%)	(2.5%)	1,414	1,272	(10.0%)
High Density Polyethylene ^{2/}	1,399	1,387	1,343	(4.0%)	(3.2%)	1,387	1,375	(0.8%)
Polypropylene ^{2/}	1,606	1,445	1,443	(10.1%)	(0.1%)	1,639	1,439	(12.2%)
Naphtha ^{3/}	869	815	835	(3.9%)	2.5%	869	863	(0.7%)

Note: 1/ Contract price (CP)

2/ South East Asia Spot Price

3/ MOP Singapore (MOP'S)

4/ LPG price is controlled by the Government via the Committee on Energy Policy Administration ("the Committee").

LPG ex-refinery price was fixed at Baht 10.996 per kilogram. However, on August 27, 2009, the Committee has approved the new LPG ex-refinery price to be capped at US\$ 332.7549 per ton with floating foreign exchange rate. The adjustment of the exchange rate will be based on the average exchange rate in the previous month.

1.2.2 Downstream Petroleum Business Group

● Oil Business Group

Third quarter of 2012 compared with Third quarter of 2011

Sales revenue of Oil Business in Q3/2012 was Baht 147,113 million, increasing by Baht 4,787 million or 3.4% from Q3/2011, resulting from higher sales volume which rose by 75 million liters or 1.3% from 5,590 million liters or equivalent to 382,174 barrels per day in Q3/2011 to 5,665 million liters or equivalent to 387,288 barrels per day in Q3/2012, mainly due to the increase in sales volume of LPG, though sales volume of fuel oil decreased. The average price of Dubai crude oil also decreased from US\$ 107.1 per barrel in Q3/2011 to US\$ 106.3 per barrel in Q3/2012.

EBITDA in Q3/2012 was Baht 2,906 million, decreasing from Q3/2011 by Baht 330 million or 10.2% due to the decrease in aviation fuel margin, while gasoline margins increased. Moreover, there was an increase in operating expense. EBIT in this quarter was Baht 2,312 million, dropping by Baht 343 million as a result of the decrease in EBITDA as aforementioned.

Third quarter of 2012 compared with Second quarter of 2012

Sales revenue of Oil Business in Q3/2012 was Baht 147,113 million, decreasing by Baht 10,171 million or 6.5% from Q2/2012. Sales volume dropped by 194 million liters or 3.3% from 5,859 million liters or equivalent to 404,968 barrels per day in Q2/2012 to 5,665 million liters or equivalent to 387,288 barrels per day in Q3/2012, mainly due to the decrease in sales volume of fuel oil and diesel. In addition, the average price of Dubai crude oil slightly decreased from US\$ 106.4 per barrel in Q2/2012 to US\$ 106.3 per barrel in Q3/2012.

EBITDA in Q3/2012 was Baht 2,906 million, dropped from Q2/2012 by Baht 1,650 million or 36.2% due to the decrease in aviation fuel and diesel margins while gasoline margins increased. EBIT in this quarter was Baht 2,312 million, dropping by Baht 1,668 million as a result of the decrease in EBITDA as aforementioned.

First nine months of 2012 compared with First nine months of 2011

Sales revenue of Oil Business in 9M/2012 was Baht 456,611 million, increasing by Baht 39,464 million or 9.5% from 9M/2011. The main reason was that sales volume rose by 923 million liters or 5.7% from 16,273 million liters or equivalent to 374,917 barrels per day in 9M/2011 to 17,195 million liters or equivalent to 394,717 barrels per day in 9M/2012, mainly due to the increase in sales volume of all products, especially gasoline, diesel and LPG. The average price of Dubai crude oil also increased from US\$ 106.1 per barrel in 9M/2011 to US\$ 109.6 per barrel in 9M/2012.

EBITDA in 9M/2012 was Baht 12,255 million, increasing from 9M/2011 by Baht 1,905 million or 18.4% due to the increase in diesel and aviation fuel margins. EBIT in 9M/2012 was Baht 10,515 million, rising by Baht 1,998 million, as a result of the increase in EBITDA as aforementioned.

- **International Trading Business Group**

Third quarter of 2012 compared with Third quarter of 2011

Sales revenue of international trading business was Baht 395,630 million in Q3/2012, increasing by Baht 1,419 million or 0.4% from Q3/2011. Sales volume in this quarter also increased by 1,493 million liters or 9.3% from 16,098 million liters or equivalent to 1,100,618 barrels per day in Q3/2011 to 17,591 million liters or equivalent to 1,202,711 million barrels per day in this quarter mainly due to the rise in sales volume of crude oil and finished oil from the out – out activity.

Although EBITDA in Q3/2012 was Baht 2,195 million loss, EBIT, which recognized effect on foreign exchange, in this quarter was Baht 513 million, increasing by Baht 9 million from Q3/2011 as better performance of PTT International Trading Pte., Ltd. (PTTT), while margin of International Trading business decreased mainly due to the drop of condensate margins in relation to price structure.

Third quarter of 2012 compared with Second quarter of 2012

Sales revenue of international trading business was Baht 395,630 million in Q3/2012, increasing by Baht 3,058 million or 0.8% from Q2/2012. Sales volume in this quarter also increased by 1,712 million liters

or 10.8% from 15,879 million liters or equivalent to 1,097,530 barrels per day in Q2/2012 to 17,591 million liters or equivalent to 1,202,711 million barrels per day in this quarter mainly due to the increase in sales volume of crude oil from the out – out activity.

EBITDA in Q3/2012 was Baht 2,195 million loss. However, EBIT, which recognized effect on foreign exchange, was Baht 513 million, decreasing by Baht 277 million from Q3/2011 mainly due to the decrease in crude sales volume to BCP from fire incidence.

First nine months of 2012 compared with First nine months of 2011

Sales revenue of international trading business was Baht 1,205,315 million in 9M/2012, increasing by Baht 114,457 million or 10.5% from 9M/2011, resulting from the rise in sales volume. Sales volume rose by 4,416 million liters or 9.7% from 45,409 million liters or equivalent to 1,045,547 barrels per day in 9M/2011 to 49,825 million liters or equivalent to 1,147,763 million barrels per day in 9M/2012 mainly due to the increase in sales volume of refined products and import crude oil to refineries. Moreover, the selling price slightly rises in relation to the increase in the global oil market price.

EBITDA in 9M/2012 was Baht 2,255 million loss while EBIT, which recognized effect on foreign exchange, was Baht 2,732 million, decreasing by Baht 1,341 million from Q3/2011 mainly due to the drop of condensate margins in relation to price structure.

- **Petrochemical Business Group**

Third quarter of 2012 compared with Third quarter of 2011

Sales revenue of petrochemical subsidiaries in Q3/2012 was Baht 22,884 million, increasing from Q3/2011 by Baht 5,151 million or 29.0%, mainly due to the rise in average sales volume of PTTPM (a subsidiary of PTT in polymer marketing business) by 32.8%, while average selling price was flat.

EBITDA and EBIT in Q3/2012 were Baht 970 million and Baht 718 million, respectively. EBITDA decreased by Baht 222 million or 18.6%, while EBIT dropped by Baht 155 million or 17.8%, compared with Q3/2011.

Third quarter of 2012 compared with Second quarter of 2012

Sales revenue of petrochemical subsidiaries in Q3/2012 was Baht 22,884 million, increasing from Q2/2012 by Baht 3,215 million or 16.4%, mainly due to the rise in average sales volume of PTTPM by 26.6%. However, the average selling price dropped by 5.6% compared with Q2/2012.

EBITDA and EBIT in Q3/2012 were Baht 970 million and Baht 718 million, respectively. EBITDA increased by Baht 169 million or 21.1%, while EBIT increased by Baht 165 million or 29.8%, compared with Q2/2012.

First nine months of 2012 compared with First nine months of 2011

Sales revenue of petrochemical subsidiaries in 9M/2012 was Baht 61,740 million, increasing from 9M/2011 by Baht 5,104 million or 9.0%, mainly due to the rise in average sales volume of PTTPM by 10.5%. However, the average selling price decreased by 1.3% compared with 9M/2011.

EBITDA and EBIT in 9M/2012 were Baht 2,311 million and Baht 1,556 million, respectively. EBITDA decreased by Baht 852 million or 26.9%, while EBIT dropped by Baht 900 million or 36.6%, compared with 9M/2011.

- **Coal Business**

Third quarter of 2012 compared with Third quarter of 2011

In Q3/2012, sales revenue of coal business was Baht 8,451 million, increasing from Q3/2011 by Baht 1,351 million or 19.0% due to the rise in sales volume by 32.0% from 2.5 million tons in Q3/2011 to 3.3 million tons in Q3/2012 which was caused by the higher sales and production volume of Sebuk mine. However, the average selling price decreased by 11.3% from US\$ 94.4 per ton in Q3/2011 to US\$ 83.7 per ton in Q3/2012.

EBITDA in this quarter rose by Baht 282 million or 13.8% from Baht 2,040 million in Q3/2011 to Baht 2,322 million in Q3/2012. EBIT in Q3/2012 was Baht 986 million which decreased from Q3/2011 by Baht 677 million or 40.7% due to the rise in depreciation and amortization by Baht 999 million.

Third quarter of 2012 compared with Second quarter of 2012

In Q3/2012, sales revenue of coal business was Baht 8,451 million, increasing from Q2/2012 by Baht 1,030 million or 13.9% due to the rise in sales volume by 22.2% from 2.7 million tons in Q2/2012 to 3.3 million tons in Q3/2012 mainly due to the increase in production volume of Sebuk mine together with the increase in production from new pit in Jembayan mine, while the average selling price decreased by 11.4% from US\$ 94.5 per ton in Q2/2012 to US\$ 83.7 per ton in Q3/2012.

EBITDA in this quarter dropped from Baht 2,588 million in Q2/2012 by Baht 266 million or 10.3% to Baht 2,322 million in Q3/2012. EBIT in Q3/2012 was Baht 986 million which decreased from Q2/2012 by Baht 549 million or 35.8% in relation to the dropped in EBITDA as aforementioned together with an increase in depreciation and amortization following higher production volume.

First nine months of 2012 compared with First nine months of 2011

In 9M/2012, sales revenue of coal business was Baht 21,700 million, increasing from 9M/2011 by Baht 507 million or 2.4% due to the rise in sales volume by 5.3% from 7.6 million tons in 9M/2011 to 8.0 million tons in 9M/2012 due to the higher production volume of Sebuk mine by 94.1% from 1.0 million tons in 9M/2011 to 1.9 million tons in 9M/2012. However, the average selling price decreased by 2.3% from US\$ 92.3 per ton in 9M/2011 to US\$ 90.2 per ton in 9M/2012 in relation to decrease in selling market prices due to world economic slowdown.

EBITDA in this period rose by Baht 33 million or 0.5% from Baht 6,076 million in 9M/2011 to Baht 6,109 million in 9M/2012. EBIT in 9M/2012 was Baht 2,995 million which decreased from 9M/2011 by Baht 1,728 million or 36.6% due to an increase in depreciation and amortization by Baht 1,761 million.

1.3 Share of Net Income from Investment in Associates and Net Income

Third quarter of 2012 compared with Third quarter of 2011

Net income of PTT and its subsidiaries in Q3/2012 was Baht 36,054 million, increasing from Q3/2011 by Baht 14,583 million or 67.9% due to the better performance of each business group of PTT, subsidiaries and jointly controlled entities as mentioned, and the following reasons:

: In Q3/2012, the share of net income from investments in associates increased by Baht 8,748 million or 195.8% from Baht 4,469 million in Q3/2011 to Baht 13,217 million in Q3/2012, mainly due to

- The performance of refining business associates increased as PTT Group refineries' GRM (including stock gain/loss and hedging gain/loss, excluding PTTGC's refining unit) increased from US\$ 3.17 per barrel in Q3/2011 to US\$ 9.37 per barrel in Q3/2012 as at the end of Q2/2012 there were a drop in crude oil price from concerns on the U.S. public debt and the Euro debt crisis leading to stock loss and the recognition of loss from NRV.

- The performance of petrochemical associates increased mainly due to the higher sales volume and spread margin, especially Ethylene, because of planned and unplanned shut down and the reduction in Naphtha Cracker production in Asia resulting in lower productions in North East Asia. While, the spread margin of Benzene increased since many Olefins plants especially in Asia, U.S. and Europe continued its production cut due to low Olefins demand together with planned maintenance plants shutdown, resulted in less Benzene by-products in the market.

: In Q3/2012, PTT and its subsidiaries had the gain on foreign exchange of Baht 3,408 million whereas there was the loss on foreign exchange of Baht 5,362 million in Q3/2011.

: In Q3/2012, PTT and its subsidiaries' finance costs increased by Baht 436 million or 9.5% from Baht 4,570 million in Q3/2011 to Baht 5,006 million in Q3/2012 in relation to higher outstanding debts.

: The corporate income taxes in Q3/2012 was Baht 8,935 million, decreasing by Baht 1,443 million or 13.9%.

Third quarter of 2012 compared with Second quarter of 2012

Net income of PTT and its subsidiaries in Q3/2012 was Baht 36,054 million, increasing from Q2/2012 by Baht 27,541 million or 323.5% due to the performance of each business group of PTT, subsidiaries and jointly controlled entities as mentioned, and the following reasons:

: In Q2/2012 PTTI recognized the impairment loss of its investment in EMG amounting to Baht 3,972 million. Moreover, there was an impairment loss on Montara assets of PTTEP amounting to Baht 3,455 million.

: In Q3/2012, the share of net income from investments in associates increased by Baht 17,571 million or 403.6% from Baht 4,354 million loss in Q2/2012 to Baht 13,217 million in Q3/2012, mainly due to:

- The performance of refining business associates increased as PTT Group refineries' GRM (including stock gain/loss and hedging gain/loss, excluding PTTGC's refining unit) increased from minus US\$ 4.15 per barrel in Q2/2012 to US\$ 9.37 per barrel in Q3/2012 as the oil market recovered at the end of Q2/2012 due to easing concerns on the EU debt crisis and the tighten supply in several regions as well as increasing demand from holiday and winter season, together with the QE3 policy announced by FED.

- The performance of petrochemical associates increased from the higher utilization rate and increasing sales volume, partly from more feedstock supply from GSP to Olefins plants, while spread margin

of Olefins and Aromatics squeezed, especially MEG, due to the drop in demands from polyester producers resulting in an unstable economy. Whereas, the spread margin of paraxylene decreased because of the lower demand growth of intermediate products (PTA) and downstream products (PET/Polyester) of paraxylene in Europe, the U.S. and Asia. In addition, the low or negative margins of intermediate and downstream producers caused Chinese producers reduced their utilization. While, the spread margin of Benzene increased since many Olefins plants especially in Asia, U.S. and Europe continued its production cut due to low Olefins demand together with planned maintenance plants shutdown.

: In Q3/2012, PTT and its subsidiaries had the gain on foreign exchange of Baht 3,408 million while there was the loss on foreign exchange of Baht 2,302 million in Q2/2012.

: In Q3/2012, PTT and its subsidiaries' finance costs increased by Baht 212 million or 4.4% from Baht 4,794 million in Q2/2012 to Baht 5,006 million in Q3/2012.

: The corporate income taxes in Q3/2012 was Baht 8,935 million, decreasing by Baht 6,760 million or 43.1% from Q2/2012 mainly due to PTTEP's corporate income taxes from lower deferred income tax liabilities caused by Baht appreciation against the USD.

First nine months of 2012 compared with First nine months of 2011

Net income of PTT and its subsidiaries in 9M/2012 was Baht 81,954 million, decreasing from 9M/2011 by Baht 6,716 million or 7.6% resulting from loss on impairment of investments and assets in 9M/2012 and the drop in share of net income from investments in associates, even PTTEP's performance increased mainly from higher selling price in relation to the global oil market price.

: In 9M/2012, PTTI recognized an impairment loss of its investment in EMG amounting to Baht 3,972 million. Moreover, PTTEP recognized an impairment loss on Montara assets amounting to Baht 3,455 million.

: In 9M/2012, the share of net income from investments in associates dropped by Baht 6,975 million or 26.7% from Baht 26,127 million in 9M/2011 to Baht 19,152 million in 9M/2012, mainly due to:

- The performance of refining business associates decreased as PTT Group refineries' GRM (including stock gain/loss and hedging gain/loss, excluding PTTGC's refining unit) decreased from US\$ 6.84 per barrel in 9M/2011 to US\$ 4.54 per barrel in 9M/2012, leading to lower stock gain compared with the same period of the previous year, due to the global economic slowdown and the prolong Eurozone debt crisis, even the oil market recovered at the end of Q2/2012 after QE3 policy of the U.S. and the supply concern on crude oil producers in the Middle East. (At the end of 9M/2011 oil price increased by US\$5 per barrel comparing with the end of 2011, while 9M/2011 oil price increased by US\$17 per barrel comparing with the end of 2010)

- The performance of petrochemical associates decreased from the lower spread margin of all products, especially LPDE, following weaker economic growth in Europe which is its major market. Moreover, Paraxylene's spread lowered as in 9M/2011 there was the Paraxylene supply shortage following the shutdowns of Paraxylene plants and the gradual increase in demand of new PTA plants in China, while in 9M/2012, the spread margin of Paraxylene declined mainly due to many PTA plants reduced their utilization rate after prolonging losses from operation

: In 9M/2012, PTT and its subsidiaries had the gain on foreign exchange of Baht 4,038 million, increasing by Baht 5,589 million or 360.1%, while there was the loss on foreign exchange of Baht 1,552 million in 9M/2011.

: In 9M/2012, PTT and its subsidiaries' finance costs increased by Baht 825 million or 6.1% from Baht 13,443 million in 9M/2011 to Baht 14,268 million in 9M/2012. This was due to the increase in PTTEP's debt from the bond issuance and loan amounting to US\$500 million and CAD475 million, respectively.

: The corporate income taxes in 9M/2012 was Baht 34,061 million, dropping by Baht 1,534 million or 4.3% from 9M/2011 due to the recent cabinet resolution of the Thai government on October 11, 2011 to reduce corporate income tax rate from 30% to 23% in 2012.

Details of net income from investments in associates are as follows:

Unit: million Baht	Q3/2011	Q2/2012	Q3/2012	% Inc.(Dec.)		9M/2011	9M/2012	% Inc. (Dec.)
				YoY	QoQ			
Refining associates	1,455	(5,406)	6,824	n.m.	n.m.	12,393	6,542	(47.2%)
Petrochemical associates	3,423	666	6,068	77.3%	n.m.	13,701	11,729	(14.4%)
Oil associates	101	155	132	30.7%	(14.8%)	382	437	14.4%
Gas associates	(537)	119	161	n.m.	35.3%	(354)	332	n.m.
Other associates	<u>27</u>	<u>112</u>	<u>32</u>	<u>18.5%</u>	<u>(71.4%)</u>	<u>5</u>	<u>112</u>	<u>n.m.</u>
Total	<u>4,469</u>	<u>(4,354)</u>	<u>13,217</u>	<u>195.8%</u>	<u>(403.6%)</u>	<u>26,127</u>	<u>19,152</u>	<u>(26.7%)</u>

2. The analysis of PTT and its subsidiaries' consolidated financial position as of September 30, 2012, compared with December 31, 2011.

Financial position of PTT and its subsidiaries as of September 30, 2012, compared with December 31, 2011, are as follows:

Unit: million Baht

	Consolidated financial statements			
	Sep 30, 2012	Dec 31, 2011	Inc./ (Dec.)	%
Assets				
Current assets	473,193	381,124	92,069	24.2
Available-for-sale investments, investments in associates and other long-term investments	241,592	241,284	308	0.1
Property, plant and equipment, net	625,961	601,337	24,624	4.1
Non-current assets	262,454	178,101	84,353	47.4
Total assets	1,603,200	1,401,846	201,354	14.4
Liabilities				
Current liabilities	403,759	280,543	123,216	43.9
Long-term loans (including current portion)	408,579	392,303	16,276	4.1
Non-current liabilities	103,470	85,287	18,183	21.3
Total liabilities	915,808	758,133	157,675	20.8
Equity				
Total equity attributable to equity holders of the company	592,613	555,763	36,850	6.6
Non-controlling interests	94,779	87,950	6,829	7.8
Total equity	687,392	643,713	43,679	6.8
Total liabilities and equity	1,603,200	1,401,846	201,354	14.4

Assets

As of September 30, 2012, PTT and its subsidiaries' total assets were Baht 1,603,200 million, increased by Baht 201,354 million or 14.4% from the year ended of 2011 mainly due to the following reasons:

: Current assets increased by Baht 92,069 million or 24.2% resulting mainly from the increase in trade accounts receivable, inventories, and current investments by Baht 95,322 million, Baht 18,350 million, and Baht 3,211 million, respectively. In addition, there was a restricted deposit at financial institution of Baht 2,128 million reserved for investing in PTTEP's asset, the acquiring of Cove Energy plc. However, cash and cash equivalent decreased by Baht 26,738 million.

: Property, plant and equipment increased by Baht 24,623 million or 4.1% primarily from the increase in net assets for petroleum exploration and production by Baht 19,953 million from PTTEP Australasia, Myanmar Zawtika, and Bongkot projects. Also, the investment on the forth transmission pipeline project and Offshore Compressor of PTT amounting to Baht 6,324 million and Baht 1,709 million, respectively.

: Other non-current assets rose by Baht 84,353 million or 47.4%, mainly due to the increase in net assets for petroleum exploration and production and goodwill by Baht 64,214 million and Baht 17,981 million, respectively resulted from the acquiring of Cove Energy plc. of PTTEP.

Liabilities

As of September 30, 2012, PTT and its subsidiaries' total liabilities were Baht 915,808 million, increased by Baht 157,675 million or 20.8% from the year ended of 2011. This resulted from the increase in current liabilities amounting to Baht 123,216 million or 43.9%, mainly from trade accounts payable by Baht 65,598 million and short-term loans from financial institutions by Baht 68,329 million. However, other accounts payable and income tax payable decreased by Baht 6,542 million and Baht 4,677 million, respectively.

Long-term loans (including the current portion within 1 year) were Baht 408,579 million, increased by Baht 16,276 million or 4.1%, mainly due to the issuance of debentures of PTT amounting to Baht 45,000 million while there was loan repayment amounting to Baht 28,000 million. In addition, PTTEP issued its debentures amounting to US\$ 500 million and entered into additional loan agreements with a financial institution of CAD 475 million or equivalent to Baht 28,416 million. However, there was the redemption of debentures amounting to Baht 24,808 million. The maturities of loans are as follows:

Unit: million Baht

Maturity (since September 30, 2012)	PTT	PTTEP	PTTI	TTM(T)	PTTAC	HMC	EnCo	PTTPL	DCAP	TTM(M)	PTTNGD	Total
Within 1 year (September 30, 2013)	4,528.50	5,015.69	2,732.20	696.74	659.46	556.32	450.00	200.00	123.81	55.56	100.80	15,119.08
Over 1 year - 2 years	40,688.80	11,694.88	2,605.03	696.74	659.45	556.22	450.00	300.00	130.81	55.56	100.80	57,938.29
Over 2 years - 5 years	96,064.16	52,229.35	2,877.45	1,613.44	1,978.36	2,091.15	1,350.00	600.00	392.44	78.71	100.80	159,375.86
Over 5 years	115,903.22	47,413.33	--	5,094.45	2,844.84	1,673.80	1,962.50	--	352.54	158.97	--	175,403.65
Total	257,184.68	116,353.25	8,214.68	8,101.37	6,142.11	4,877.49	4,212.50	1,100.00	999.60	348.80	302.40	407,836.88

Note: Excluding liabilities under finance leases of Baht 742 million

The outstanding loans (including loans, debentures and bonds due within one year and later than one year) as of September 30, 2012 consisted of loans in Baht currency and foreign currencies. Details of which are as follows:

Unit: million Baht

Long-term loans	PTT	PTTEP	PTTI	TTM(T)	PTTAC	HMC	EnCo	PTTPL	DCAP	TTM(M)	PTTNGC	Total
Baht currency	188,155.31	24,206.13	-	-	-	2,529.59	4,212.50	1,100.00	999.60	-	302.40	221,505.53
Foreign currencies	69,029.37	92,147.12	8,214.68	8,101.37	6,142.11	2,347.90	-	-	-	348.80	-	186,331.35
Total	257,184.68	116,353.25	8,214.68	8,101.37	6,142.11	4,877.49	4,212.50	1,100.00	999.60	348.80	302.40	407,836.88
Portion of long-term foreign currency loans to total long-term loans (%)	26.84%	79.20%	100.00%	100.00%	100.00%	48.14%	0.00%	0.00%	0.00%	100.00%	0.00%	45.69%

As of September 30, 2012, the loans amounting to Baht 7,000 million were guaranteed by the Ministry of Finance.

Equity

As of September 30, 2012, total shareholders' equity of PTT and its subsidiaries were Baht 687,392 million, increased from the year ended of 2011 by Baht 43,679 million or 6.8%. This resulted from an increase in retained earnings by Baht 47,692 million, mainly due to the increase in PTT and its subsidiaries' net income for 9M/2012 by Baht 81,954 million. However, there were dividends paid by Baht 34,262 million and non-controlling interests increased by Baht 6,829 million.

Liquidity

For the nine-month period ended September 30, 2012, PTT and its subsidiaries had net decrease in cash and cash equivalents amounting to Baht 26,738 million, while cash and cash equivalents at the beginning of the period carried from 2011 was Baht 116,132 million. As a result, cash and cash equivalents at the end of the period was Baht 89,394 million. Details of cash flow by activities are as follows:

	Amount (Million Baht)
Net cash provided by operating activities	87,704
Net cash used in investing activities	(147,105)
Net cash provided by financing activities	34,975
Effects of exchange rates on cash and cash equivalents	(1,431)
Currency translation differences	(881)
Net increase in cash and cash equivalents during the period	(26,738)
Cash and cash equivalents at the beginning of the period	116,132
Cash and cash equivalents at the end of the period	89,394

Net cash provided by operating activities of Baht 87,704 million was derived from net income attributable to equity holders of the company of Baht 81,954 million adjusted by net cash provided (used in) operating activities. The increase in net profit mainly resulted from depreciation, depletion and amortization expenses totally amounting to Baht 48,497 million, income taxes amounting to Baht 34,061 million, net income of non-controlling interests amounting to Baht 16,155 million, interest expenses amounting to Baht 13,657 million and loss on impairment of assets amounting to Baht 7,528 million. The decrease in net profit resulted mainly from share of net income from investments in associates amounting to Baht 19,152 million and interest income amounting to Baht 2,288 million. In addition, changes in net operating assets which resulted in the decrease in cash flows by Baht 62,961 million and cash paid for income taxes of Baht 35,493 million led to the decrease in cash flows.

Net cash used in investing activities was Baht 147,105 million resulting mainly from;

: Investments in property, plant and equipment amounting to Baht 85,287 million mainly due to the increase in the investments of PTTEP in petroleum exploration and production amounting to Baht 64,383 million which are primarily from the PTTEP Australasia, Myanmar Zawtika, and Arthit projects. In addition, there were investments in various projects of PTT such as the forth transmission pipeline and Offshore Compressor project totally amounting to Baht 15,542 million.

: The increase in current investments amounting to Baht 3,184 million resulting from higher investments of PTT in promissory notes.

: Investments in intangible assets amounting to Baht 2,758 million resulting from the increase in PTTEP's investments.

: Investment in subsidiaries amounting to Baht 72,984 million primarily resulting from the PTTEP's investment of COVE and from the PTTAPM's, a subsidiary of PTTI, investment of the 66.5% additional acquisition shareholding of Red Island Mineral Limited (RIM). The acquisition of RIM resulted to the increase in percentage of shareholding from 33.5% to 100%. Therefore, RIM is a wholly-owned subsidiary of PTTAPM since February 2012. Moreover, PTTML, a subsidiary of PTTI, acquired an additional of SAR shareholdings by 26.52% from 45.27% to 71.79%.

Net cash provided by financing activities was Baht 34,975 million, resulting mainly from the issuance of debentures of PTT amounting to Baht 45,000 million, the issuance of debentures and loans (short-term and long-term) of PTTEP amounting to Baht 80,744 million. In addition, PTTT has an additional short-term loan from financial institutions by Baht 22,022 million. However, there were redemption of debentures, long-term loans and bonds of PTT totaling Baht 29,060 million, and the redemption of PTTEP's debentures amounting to Baht 24,429 million. Moreover, there were dividends and interest payments amounting to Baht 42,732 million and Baht 14,429 million, respectively.

Financial ratios and earnings per share of PTT and its subsidiaries are as follows:

Financial ratios and earnings per share	Unit	Q3/2011	Q2/2012	Q3/2012	9M/2011	9M/2012
Gross Profit Margin	%	8.32	8.62	8.49	9.00	8.49
Net Profit Margin	%	3.27	1.24	5.14	4.74	3.91
Interest Coverage Ratio	Time	14.87	5.47	13.38	11.29	9.53
EPS	Baht/share	7.52	2.98	12.62	31.09	28.69

	Unit	Dec 31, 2011	Mar 31, 2012	Jun 30, 2012	Sep 30, 2012
Current Ratio	Time	1.14	1.18	1.36	1.13
Quick Ratio	Time	0.89	0.94	1.02	0.88
Debt to Equity Ratio	Time	1.18	1.23	1.19	1.33

3. Economic and Petroleum/Petrochemical Price Outlook in the fourth quarter of 2012

The world economy in Q4/2012 is expected to expand more than Q3/2012 as governments in developing and emerging economies, especially China, are attempting to stimulate domestic consumption

and investment in order to alleviate the effects from the slowdown in the exports sector through investments in infrastructure and loosen monetary policy. Moreover, the developed economies, especially the U.S., are expected to improve from the effects of increased liquidity in the economy through the use of QE3. Meanwhile, the Euro zone economics remains at risk of continuous recession resulting from austerity measures and delayed in implementing certain policy measures. For instance, the ability of the European Stability Mechanism (ESM) in recapitalizing troubled banks as well as the framework for setting up a Banking Union. Nonetheless, several risk factors need to be monitored including the intensifying of the EU sovereign debt crisis, the debt ceiling and fiscal cliff in the U.S.

Dubai crude oil price in Q4/2012 is forecasted to increase due to ongoing tensions and unrest in Middle East along with a stronger seasonal winter demand as well as an expectation of improved economic from stimulus measures. The prices of petroleum products are expected to increase in line with crude prices except price of gasoline 95 which expected to weaken due to low seasonal demand. In contrast, price of diesel, fuel oil and LPG (CP) are estimated to be higher from an increase in winter demand.

Dubai crude cracking in Singapore is forecasted to drop to around US\$ 8-9 per barrel because an increase in petroleum product prices failed to catch up with crude oil price.

Olefins price in Q4/2012 is on a rising trend in line with higher crude and Naphtha prices couple with year-end festive production season. HDPE and Polypropylene prices are expected at US\$ 1,397 and US\$ 1,471 per ton, respectively. Similarly, Aromatics price tends to be higher along with feedstock with Benzene price expected at US\$ 1,218 per ton and Paraxylene price at US\$ 1,516 per ton.

The Thai economy in Q4/2012 is expected to expand at a higher rate from Q3/2012 as the economic activities especially domestic consumption and spending have returned to their normal conditions comparing to the flooding disaster in Q4/2011. Export sector and private investment are expected to show slower pace and no sign of recovery due to global economic slowdown. Nevertheless, several risk factors need to be monitored such as the global economic uncertainty which could continue to have a greater impact on Thailand's export sector.