

18 JANUARY 2021

THAILAND / PETROCHEM &amp; CHEMICALS

PTT GLOBAL CHEMICAL

PTTGC TB

BUY

UNCHANGED

TARGET PRICE	THB86.00
CLOSE	THB62.50
UP/DOWNSIDE	+37.6%
PRIOR TP	THB69.00
CHANGE IN TP	+24.6%
TP vs CONSENSUS	+35.6%

## ใกล้พลิกฟื้น

### การฟื้นตัวจากธุรกิจโรงกลั่นเป็นกุญแจสำคัญ

เราหันมามองแนวโน้มการเติบโตของกำไรสุทธิของ PTTGC ในปี 2021-22 เป็นบวกมากยิ่งขึ้น และคาดการณ์ถึงการพลิกฟื้นจากที่เคยคาดว่าจะขาดทุน 2.9 พัน ลบ. ในปี 2020 เป็นกำไรสุทธิ 19.6 พัน ลบ. ในปี 2021 จาก 1) กำไรที่ต่อเนื่องจากธุรกิจโอเลฟินตามความต้องการบรรจุภัณฑ์พลาสติกที่คาดว่าจะเพิ่มขึ้น y-y ในสภาวะอุปสงค์อุปทานที่คาดว่าจะค่อนข้างสมดุลในปี 2021; 2) กำไรธุรกิจโรงกลั่นที่ดีขึ้นอย่างเห็นได้ชัดจากค่าการกลั่นที่คาดว่าจะสูงขึ้น; และ 3) การเพิ่มของกำลังการผลิตจากโครงการใหม่ ๆ ของ PTTGC กล่าวคือ The Naphtha Cracker Olefins Reconfiguration Project (ORP) ซึ่งมีกำหนดเริ่มดำเนินงานเชิงพาณิชย์ในเดือน ก.พ. 21 และโรงงานผลิต Propylene Oxide (PO) และ Polyol (ผลิตภัณฑ์ปอลายเมอร์) ซึ่งมีกำหนดเริ่มดำเนินงานเชิงพาณิชย์ใน 3Q20

### กำลังการผลิตจะเพิ่ม 10% ในปี 2021

ในขณะที่กำลังการผลิตรวมที่ 1.06mtpa (0.75mtpa ORP และ 0.31mtpa PO/polyol) จะเพิ่มกำลังการผลิตทั้งหมดของ PTTGC อีก 10% y-y เป็น 11.27mtpa เราเห็นว่าในทางกลยุทธ์ PTTGC จะได้ประโยชน์จากโครงการทั้งสองในเวลาที่เหมาะสมเนื่องจาก 1) Ethylene และ Propylene ที่ผลิตได้จาก Naphtha ที่ผลิตได้ภายในบริษัท ควรช่วยให้บริษัท ได้ Olefins Product Margins ที่คาดว่าจะอยู่ในระดับสูงในปี 2021; 2) ORP ควรเพิ่มความยืดหยุ่นของวัตถุดิบตั้งต้นในพอร์ตของ PTTGC ซึ่งคาดว่าจะมี Naphtha คิดเป็น 24% ของวัตถุดิบตั้งต้นทั้งหมดในปี 2021 (เพิ่มจาก 12-16% ในปี 2019-20); และ 3) โรงงาน PO/polyol ใหม่จะทำให้บริษัท สามารถจับกระแสอัตราค่าไถ่ขึ้นต้นขาขึ้นของ Propylene และสารอนุพันธ์อื่น ๆ จากความต้องการที่ไต่ในระดับสูงในประเทศจีน เราคาดว่า PTTGC อาจได้กำไรสุทธิเพิ่ม 3-4 พัน ลบ. ต่อปีจากโครงการทั้งสองดังกล่าว

### ผู้ได้ประโยชน์หลักของแนวโน้มอุตสาหกรรมยานยนต์และเครื่องใช้ซ้ำขึ้น

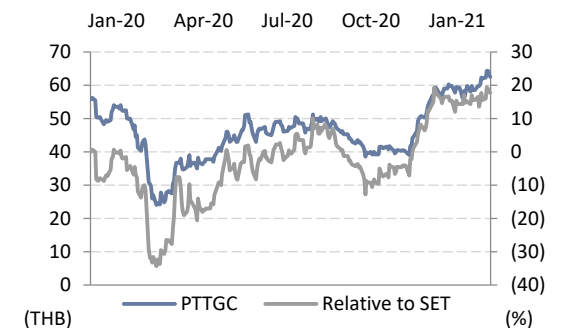
จากความต้องการสินค้าคงทนที่กำลังเพิ่มขึ้นในประเทศจีน ประกอบด้วยรถยนต์และเครื่องใช้ภายในบ้าน เราเชื่อว่า PTTGC จะได้ประโยชน์จากอัตราค่าไถ่ขึ้นของ Benzene Phenol (ผลิตภัณฑ์ปอลายเมอร์) ในปัจจุบัน ซึ่งใช้ผลิต Acetone Bisphenol A และ Polycarbonate (ผลิตภัณฑ์ปอลายเมอร์) เพื่อผลิตชิ้นส่วนยานยนต์และอุปกรณ์ทางการแพทย์

### คงคำแนะนำซื้อหลังปรับราคาเป้าหมายเป็น 86 บาท

เราคงคำแนะนำซื้อหลังปรับราคาเป้าหมายของเราจาก 69 บาท (2021E EV/EBITDA ที่ 9.5x) เป็น 86 บาท (2021E EV/EBITDA ที่ 11.1x) เพื่อสะท้อน 2020-22E EPS ที่สูงขึ้น 5.5-23.3% เนื่องจากเราเชื่อว่าอัตราค่าไถ่ของผลิตภัณฑ์ Olefins และ Refinery จะฟื้นตัวในปี 2021

## KEY STOCK DATA

YE Dec (THB m)	2019	2020E	2021E	2022E
Revenue	412,810	311,241	362,146	374,541
Net profit	11,682	(2,890)	19,529	25,874
EPS (THB)	2.59	(0.64)	4.33	5.74
vs Consensus (%)	-	nm	61.3	64.0
EBITDA	25,972	23,519	40,656	48,732
Core net profit	9,919	5,672	19,529	25,874
Core EPS (THB)	2.20	1.26	4.33	5.74
Chg. In EPS est. (%)	-	23.3	5.5	7.2
EPS growth (%)	(75.6)	(42.8)	244.3	32.5
Core P/E (x)	28.4	49.7	14.4	10.9
Dividend yield (%)	12.4	6.8	5.9	11.3
EV/EBITDA (x)	14.2	15.2	8.5	6.9
Price/book (x)	1.0	1.1	1.1	1.1
Net debt/Equity (%)	27.4	26.6	21.3	18.6
ROE (%)	3.4	2.1	7.4	9.8



Share price performance	1 Month	3 Month	12 Month
Absolute (%)	5.0	49.7	12.1
Relative to country (%)	2.1	22.5	16.7
Mkt cap (USD m)	9,333		
3m avg. daily turnover (USD m)	49.1		
Free float (%)	51		
Major shareholder	PTT Plc. (48%)		
12m high/low (THB)	65.25/21.40		
Issued shares (m)	4,508.85		

Sources: Bloomberg consensus; FSSIA estimates



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บทวิเคราะห์ฉบับนี้แปลมาจากบทวิเคราะห์ของ FSSIA ฉบับวันที่ 18 มกราคม 2021

## Investment thesis

While PTTGC faces an earnings downside from weak polyethylene (PE) product margins, we think its earnings resilience is high due to earnings growth from non-PE products, including PP, AN, PVC, and its refinery, aromatics, and power units. We estimate that non-PE earnings will likely offset weaker PE earnings throughout 2021-22.

The weaker PE product margins are due to the ramp-up in US PE exports and the weaker demand from certain emerging markets. While a rising oil price would negatively impact PTTGC's olefins earnings, we think the impact would be more muted than for its naphtha-based peers, as we estimate that PTTGC's gas feedstock cost advantage accounts for two-thirds of its EBITDA.

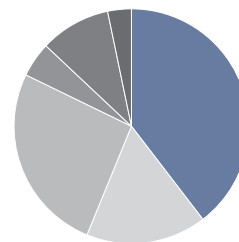
## Company profile

PTTGC was a merger between two previously listed petrochemical companies - PTTCH and PTTAR. PTTGC was listed on 21 October 2011. PTTCH and PTTAR shares were delisted on 11 October 2011 and their shareholders became shareholders of PTTGC based on an agreed swap ratio.

[www.pttgcgroup.com](http://www.pttgcgroup.com)

## Principal activities (revenue, 2019)

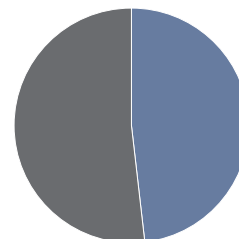
- Refinery and shared facilities - 39.6 %
- Aromatics - 16.6 %
- Olefins and derivatives - 26.0 %
- Green Chemicals - 4.8 %
- Performance materials and chemical - 9.7 %



Source: PTT Global Chemical

## Major shareholders

- PTT Plc. - 48.2 %
- Others - 51.8 %



Source: PTT Global Chemical

## Catalyst

Potential key drivers are a rising HDPE price, a higher market gross refining margin (GRM) and the continued strong margins of AN, PP and PVC.

## Risk to our call

The key downside risks to our EV/EBITDA-based TP are the weaker-than-expected HDPE price and HDPE-naphtha margin.

## Event calendar

Date	Event
Feb 2021	4Q20/2020 results announcement

## Key assumptions

	2020E	2021E	2022E
Olefin utilisation rate (%)	93.0	94.0	95.0
Refinery utilisation rate (%)	85.0	93.0	95.0
Market GRM (USD/bbl)	1.1	6.0	6.8
Dubai crude price (USD/bbl)	40.0	50.0	50.0
Gasoline-Dubai (USD/bbl)	7	12	13
Jet-Dubai (USD/bbl)	1	15	15
Diesel-Dubai (USD/bbl)	5	11	8
HSFO-Dubai (USD/bbl)	(2)	(5)	(7)
PX-naphtha (USD/bbl)	350	382	382

Source: FSSIA estimates

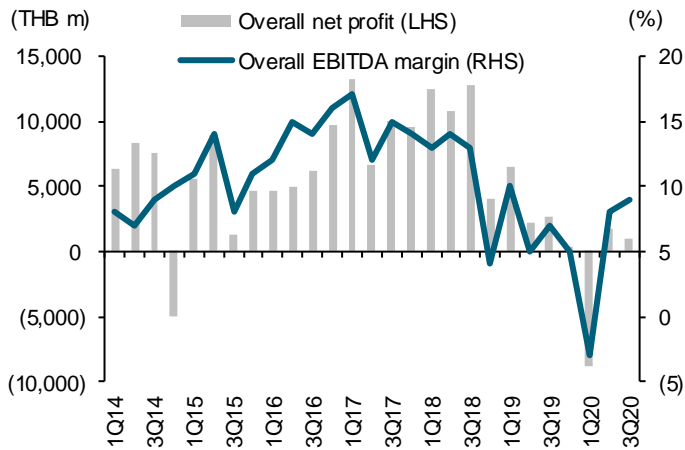
## Earnings sensitivity

- For every 1% increase in average Dubai oil price, we project 2021 earnings to rise by 1.2%, and vice versa.
- For every 1% increase in market GRM, we estimate 2021 earnings will rise by 0.5%, and vice versa.
- For every 1% increase in HDPE price, we estimate 2021 earnings will rise by 1.8%, and vice versa.

Source: FSSIA estimates

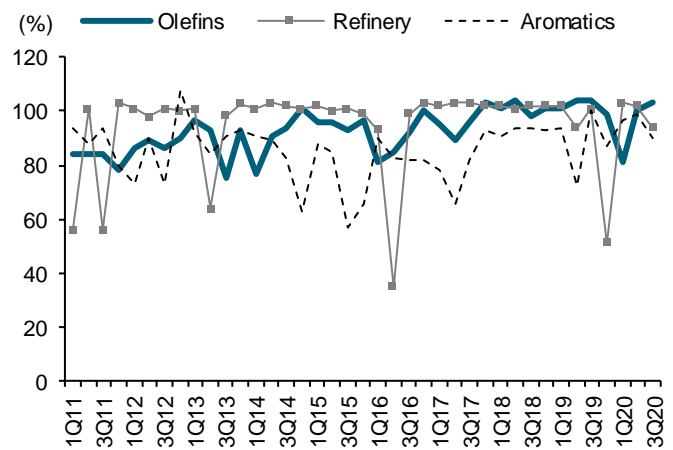


Exhibit 1: Overall quarterly net profit and EBITDA margin



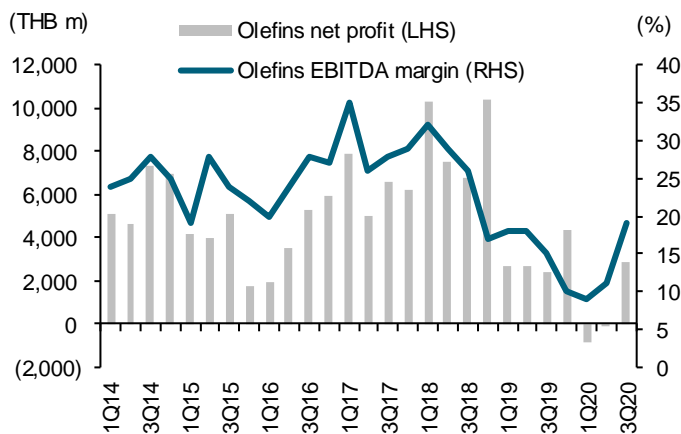
Source: PTTGC

Exhibit 2: Quarterly utilisation rates of key business units



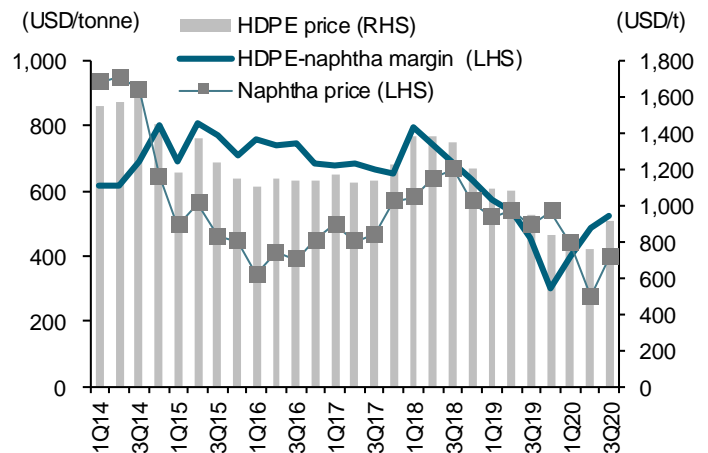
Source: PTTGC

Exhibit 3: PTTGC's quarterly olefins net profit and EBITDA margin



Source: PTTGC

Exhibit 4: Quarterly HDPE price and HDPE-naphtha margin vs naphtha price



Source: PTTGC

Exhibit 5: Key changes in assumptions

(THB m)	Current			Previous			Change (%)		
	2020E	2021E	2022E	2020E	2021E	2022E	2020E	2021E	2022E
Revenue	311,241	362,146	374,541	309,756	360,740	372,127	0.5	0.4	0.6
Gross profit	14,505	31,652	38,420	13,193	30,410	36,287	9.9	4.1	5.9
Operating profit	1,022	15,912	21,741	(142)	14,810	19,849	nm	7.4	9.5
Core net profit	5,672	19,529	25,874	4,602	18,515	24,134	23.3	5.5	7.2
Core EPS (THB/shr)	1.3	4.3	5.7	1.0	4.1	5.4	23.3	5.5	7.2
<b>Key assumptions</b>									
Olefin utilisation rate (%)	93.0	94.0	95.0	93.0	94.0	95.0	-	-	-
Refinery utilisation rate (%)	85.0	93.0	95.0	85.0	93.0	95.0	-	-	-
HDPE-naphtha (USD/t)	500	600	700	470	570	650	6.4	5.3	7.7
HDPE price (USD/t)	900	1,100	1,200	870	1,070	1,150	3.4	2.8	4.3
LDPE-naphtha (USD/t)	600	700	800	570	670	750	5.3	4.5	6.7
LDPE price (USD/t)	1,000	1,200	1,300	970	1,170	1,250	3.1	2.6	4.0
LLDPE-naphtha (USD/t)	550	650	750	520	620	700	5.8	4.8	7.1
LLDPE price (USD/t)	950	1,150	1,250	920	1,120	1,200	3.3	2.7	4.2
MEG-naphtha (USD/t)	400	350	400	400	350	400	-	-	-
MEG price (USD/t)	800	850	900	800	850	900	-	-	-
Market GRM (USD/bbl)	1.1	6.0	6.8	1.1	6.0	6.8	-	-	-
Dubai crude oil price (USD/bbl)	40.0	50.0	50.0	40	50	50	-	-	-
Gasoline-Dubai (USD/bbl)	7	12	13	7	12	13	-	-	-
Jet-Dubai (USD/bbl)	1	15	15	1	15	15	-	-	-
Diesel-Dubai (USD/bbl)	5	11	8	5	11	8	-	-	-
HSFO-Dubai (USD/bbl)	(2)	(5)	(7)	(2)	(5)	(7)	-	-	-
PX-naphtha (USD/bbl)	350	382	382	350	382	382	-	-	-

Source: FSSIA estimates

## Financial Statements

PTT Global Chemical

Profit and Loss (THB m) Year Ending Dec	2018	2019	2020E	2021E	2022E
Revenue	518,655	412,810	311,241	362,146	374,541
Cost of goods sold	(446,971)	(370,369)	(274,239)	(305,751)	(309,130)
<b>Gross profit</b>	<b>71,684</b>	<b>42,441</b>	<b>37,002</b>	<b>56,395</b>	<b>65,411</b>
Other operating income	-	-	-	-	-
Operating costs	(14,854)	(16,469)	(13,483)	(15,740)	(16,679)
<b>Operating EBITDA</b>	<b>56,829</b>	<b>25,972</b>	<b>23,519</b>	<b>40,656</b>	<b>48,732</b>
Depreciation	(19,055)	(20,250)	(22,497)	(24,744)	(26,991)
Goodwill amortisation	0	0	0	0	0
<b>Operating EBIT</b>	<b>37,775</b>	<b>5,722</b>	<b>1,022</b>	<b>15,912</b>	<b>21,741</b>
Net financing costs	(2,003)	(363)	(1,324)	(1,303)	(1,289)
Associates	6,895	4,559	3,210	4,583	5,213
Recurring non operating income	8,012	5,877	6,213	7,798	8,852
Non recurring items	(527)	1,763	(8,562)	0	0
<b>Profit before tax</b>	<b>43,257</b>	<b>12,999</b>	<b>(2,651)</b>	<b>22,406</b>	<b>29,304</b>
Tax	(2,986)	(649)	132	(2,507)	(3,059)
<b>Profit after tax</b>	<b>40,271</b>	<b>12,349</b>	<b>(2,519)</b>	<b>19,900</b>	<b>26,245</b>
Minority interests	(201)	(667)	(371)	(371)	(371)
Preferred dividends	0	0	0	0	0
Other items	-	-	-	-	-
<b>Reported net profit</b>	<b>40,069</b>	<b>11,682</b>	<b>(2,890)</b>	<b>19,529</b>	<b>25,874</b>
<b>Non recurring items &amp; goodwill (net)</b>	<b>527</b>	<b>(1,763)</b>	<b>8,562</b>	<b>0</b>	<b>0</b>
<b>Recurring net profit</b>	<b>40,596</b>	<b>9,919</b>	<b>5,672</b>	<b>19,529</b>	<b>25,874</b>
<b>Per share (THB)</b>					
Recurring EPS *	9.01	2.20	1.26	4.33	5.74
Reported EPS	8.89	2.59	(0.64)	4.33	5.74
DPS	6.43	7.77	4.24	3.69	7.08
Diluted shares (used to calculate per share data)	4,508	4,508	4,508	4,508	4,508
<b>Growth</b>					
Revenue (%)	17.9	(20.4)	(24.6)	16.4	3.4
Operating EBITDA (%)	(9.7)	(54.3)	(9.4)	72.9	19.9
Operating EBIT (%)	(13.1)	(84.9)	(82.1)	1,457.3	36.6
Recurring EPS (%)	(2.9)	(75.6)	(42.8)	244.3	32.5
Reported EPS (%)	2.0	(70.8)	nm	nm	32.5
<b>Operating performance</b>					
Gross margin inc depreciation (%)	10.1	5.4	4.7	8.7	10.3
Gross margin of key business (%)	10.1	5.4	4.7	8.7	10.3
Operating EBITDA margin (%)	11.0	6.3	7.6	11.2	13.0
Operating EBIT margin (%)	7.3	1.4	0.3	4.4	5.8
Net margin (%)	7.8	2.4	1.8	5.4	6.9
Effective tax rate (%)	6.9	5.0	5.0	11.2	10.4
Dividend payout on recurring profit (%)	71.4	353.0	337.3	85.2	123.3
Interest cover (X)	22.9	31.9	5.5	18.2	23.7
Inventory days	31.5	37.3	39.8	30.5	33.0
Debtor days	31.8	35.3	36.1	29.8	31.6
Creditor days	38.8	44.6	46.8	39.0	42.2
Operating ROIC (%)	13.5	2.1	0.3	(0.6)	(0.8)
ROIC (%)	11.7	2.8	1.7	(0.6)	(0.8)
ROE (%)	14.2	3.4	2.1	7.4	9.8
ROA (%)	9.4	2.4	1.6	4.1	5.1

\* Pre-exceptional, pre-goodwill and fully diluted

Revenue By Division (THB m)	2018	2019	2020E	2021E	2022E
Refinery and shared facilities	227,034	163,414	118,604	150,562	161,570
Aromatics	92,601	68,525	59,125	79,125	79,125
Olefins and derivatives	135,126	107,407	90,258	81,475	82,861
Green Chemicals	15,233	19,852	13,652	18,652	19,652

Sources: PTT Global Chemical; FSSIA estimates

## Financial Statements

PTT Global Chemical

Cash Flow (THB m) Year Ending Dec	2018	2019	2020E	2021E	2022E
Recurring net profit	40,596	9,919	5,672	19,529	25,874
Depreciation	19,055	20,250	22,497	24,744	26,991
Associates & minorities	(6,895)	(6,000)	(3,210)	(4,583)	(5,213)
Other non-cash items	3,323	(1,931)	(1,931)	(1,931)	(1,931)
Change in working capital	3,355	7,728	7,146	(3,025)	(456)
<b>Cash flow from operations</b>	<b>59,435</b>	<b>29,966</b>	<b>30,174</b>	<b>34,733</b>	<b>45,265</b>
Capex - maintenance	-	-	-	-	-
Capex - new investment	(48,000)	(40,000)	(40,000)	(40,000)	(40,000)
Net acquisitions & disposals	(1,000)	(1,000)	(1,000)	(1,000)	(1,000)
Other investments (net)	16,158	(780)	(780)	(780)	(780)
<b>Cash flow from investing</b>	<b>(32,842)</b>	<b>(41,780)</b>	<b>(41,780)</b>	<b>(41,780)</b>	<b>(41,780)</b>
Dividends paid	(28,985)	(35,011)	(19,131)	(16,645)	(31,914)
Equity finance	0	0	0	0	0
Debt finance	(8,490)	(8,488)	(5,494)	(5,493)	(5,492)
Other financing cash flows	9,395	27,313	39,964	37,039	37,039
<b>Cash flow from Financing</b>	<b>(28,080)</b>	<b>(16,187)</b>	<b>15,338</b>	<b>14,901</b>	<b>(367)</b>
Non-recurring cash flows	-	-	-	-	-
Other adjustments	0	0	0	0	0
<b>Net other adjustments</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>
<b>Movement in cash</b>	<b>(1,487)</b>	<b>(28,001)</b>	<b>3,732</b>	<b>7,854</b>	<b>3,118</b>
Free cash flow to firm (FCFF)	30,186.72	(8,695.04)	(8,712.43)	(4,172.26)	6,345.60
Free cash flow to equity (FCFE)	27,498.02	7,010.26	22,863.54	24,498.99	35,031.32
<b>Per share (THB)</b>					
FCFF per share	6.69	(1.93)	(1.93)	(0.93)	1.41
FCFE per share	6.10	1.55	5.07	5.43	7.77
Recurring cash flow per share	12.44	4.93	5.11	8.38	10.14
<b>Balance Sheet (THB m) Year Ending Dec</b>					
Tangible fixed asset (gross)	340,497	380,497	420,497	460,497	500,497
Less: Accumulated depreciation	(134,496)	(154,746)	(177,243)	(201,987)	(228,977)
<b>Tangible fixed assets (Net)</b>	<b>206,001</b>	<b>225,751</b>	<b>243,254</b>	<b>258,511</b>	<b>271,520</b>
<b>Intangible fixed assets (Net)</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>
Long-term financial assets	-	-	-	-	-
Invest. In associates & subsidiaries	37,790	44,790	49,001	54,583	60,796
Cash & equivalents	53,563	25,562	29,295	37,149	40,267
A/C receivable	45,616	34,157	27,374	31,851	32,941
Inventories	39,366	36,252	23,623	27,487	28,427
Other current assets	5,767	8,525	8,523	8,523	8,523
<b>Current assets</b>	<b>144,311</b>	<b>104,496</b>	<b>88,814</b>	<b>105,009</b>	<b>110,158</b>
Other assets	81,153	77,476	77,476	77,476	77,476
<b>Total assets</b>	<b>469,255</b>	<b>452,514</b>	<b>458,547</b>	<b>495,580</b>	<b>519,950</b>
Common equity	296,046	285,830	263,809	266,693	260,653
Minorities etc.	7,436	7,765	4,049	4,419	4,790
<b>Total Shareholders' equity</b>	<b>303,482</b>	<b>293,595</b>	<b>267,858</b>	<b>271,112</b>	<b>265,443</b>
Long term debt	83,648	96,918	91,424	85,931	80,439
Other long-term liabilities	8,267	8,968	56,098	90,426	124,753
<b>Long-term liabilities</b>	<b>91,915</b>	<b>105,886</b>	<b>147,522</b>	<b>176,356</b>	<b>205,192</b>
A/C payable	50,384	40,102	30,235	35,180	36,384
Short term debt	10,390	9,068	9,068	9,068	9,068
Other current liabilities	13,084	3,864	3,864	3,864	3,864
<b>Current liabilities</b>	<b>73,858</b>	<b>53,033</b>	<b>43,166</b>	<b>48,111</b>	<b>49,316</b>
<b>Total liabilities and shareholders' equity</b>	<b>469,255</b>	<b>452,514</b>	<b>458,547</b>	<b>495,580</b>	<b>519,950</b>
Net working capital	27,280	34,969	25,421	28,817	29,643
Invested capital	352,224	382,987	395,153	419,387	439,436
* Includes convertibles and preferred stock which is being treated as debt					
<b>Per share (THB)</b>					
Book value per share	65.67	63.41	58.52	59.16	57.82
Tangible book value per share	65.67	63.41	58.52	59.16	57.82
<b>Financial strength</b>					
Net debt/Equity (%)	13.3	27.4	26.6	21.3	18.6
Net debt/total assets (%)	8.6	17.8	15.5	11.7	9.5
Current ratio (x)	2.0	2.0	2.1	2.2	2.2
CF interest cover (x)	38.7	130.5	48.5	50.5	59.2
<b>Valuation</b>					
<b>Recurring P/E (x) *</b>	<b>6.9</b>	<b>28.4</b>	<b>49.7</b>	<b>14.4</b>	<b>10.9</b>
<b>Recurring P/E @ target price (x) *</b>	<b>9.5</b>	<b>39.1</b>	<b>68.3</b>	<b>19.9</b>	<b>15.0</b>
Reported P/E (x)	7.0	24.1	(97.5)	14.4	10.9
Dividend yield (%)	10.3	12.4	6.8	5.9	11.3
Price/book (x)	1.0	1.0	1.1	1.1	1.1
Price/tangible book (x)	1.0	1.0	1.1	1.1	1.1
EV/EBITDA (x) **	5.8	14.2	15.2	8.5	6.9
EV/EBITDA @ target price (x) **	7.7	18.3	19.7	11.1	9.1
EV/invested capital (x)	0.9	1.0	0.9	0.8	0.8
* Pre-exceptional & pre-goodwill are fully diluted ** EBITDA includes associate income and recurring non operating income					

Sources: PTT Global Chemical; FSSIA estimates

## Corporate Governance report of Thai listed companies 2019

EXCELLENT LEVEL										
AAV	ADVANC	AIRA	AKP	AKR	AMA	AMATA	AMATAV	ANAN	AOT	AP
ARROW	BAFS	BANPU	BAY	BCP	BCPG	BOL	BRR	BTS	BTW	BWG
CFRESH	CHEWA	CHO	CK	CKP	CM	CNT	COL	COMAN	CPALL	CPF
CPI	CPN	CSS	DELTA	DEMCO	DRT	DTAC	DTC	EA	EASTW	ECF
EGCO	GBX	GC	GCAP	GEL	GGC	GGC	GOLD	GPSC	GRAMMY	GUNKUL
HANA	HARN	HMPRO	ICC	ICHI	III	ILINK	INTUCH	IRPC	IVL	JKN
JSP	K	KBANK	KCE	KKP	KSL	KTB	KTC	KTIS	LH	LHFG
LIT	LPN	MAKRO	MALEE	MBK	MBKET	MC	MCOT	MFEC	MINT	MONO*
MTC	NCH	NCL	NKI	NSI	NVD	NYT	OISHI	OTO	PAP	PCSGH
PDJ	PG	PHOL	PJW	PLANB	PLANET	PORT	PPS	PR9	PREB	PRG
PRM	PSH	PSL	PTG	PTT	PTTEP	PTTGC	PYLON	Q-CON	QH	QTC
RATCH	ROBINS**	RS	S	S & J	SABINA	SAMART	SAMTEL	SAT	SC	SCB
SCC	SCCC	SCN	SDC	SEAFCO	SEAOL	SE-ED	SELIC	SENA	SIS	SITHAI
SNC	SORKON	SPALI	SPI	SPRC	SSSC	STA	STEC	SVI	SYNTEC	TASCO
TCAP	THAI	THANA	THANI	THCOM	THIP	THREL	TIP	TISCO	TK	TKT
TMB	TMILL	TNDT	TOA	TOP	TRC	TRU	TRUE	TSC	TSR	TSTH
TTA	TTCL	TTW	TU	TVD	TVO	U	UAC	UV	VGI	VIH
WACOAL	WAVE	WHA	WHAUP	WICE	WINNER					
VERY GOOD LEVEL										
2S	ABM	ADB	AF	AGE	AH	AHC	AIT	ALLA	ALT	AMANAH
AMARIN	APCO	APCS	AQUA	ARIP	ASAP	ASIA	ASIAN	ASIMAR	ASK	ASN
ASP	ATP30	AUCT	AYUD	B	BA	BBL	BDMS	BEC	BEM	BFIT
BGC	BGRIM	BIZ	BJC	BJCHI	BLA	BPP	BROOK	CBG	CEN	CENTEL
CGH	CHG	CHOTI	CHOW	CI	CIMBT	CNS	COLOR	COM7	COTTO	CRD
CSC	CSP	DCC	DCON	DDD	DOD	EASON	ECL	EE	EPG	ERW
ESTAR	ETE	FLOYD	FN	FNS	FORTH	FPI	FPT	FSMART	FSS	FVC
GENCO	GJS	GL	GLOBAL	GLOW**	GULF	HPT	HTC	HYDRO	ICN	IFS
INET	INSURE	IRC	IRCP	IT	ITD***	ITEL	J	JAS*	JCK	JCKH
JMART	JMT	JWD	KBS	KCAR	KGI	KIAT	KOOL	KWC	KWM	L&E
LALIN	LANNA	LDC	LHK	LOXLEY	LRH	LST	M	MACO	MAJOR	MBAX
MEGA	METCO	MFC	MK	MODERN	MOONG	MPG	MSC	MTI	NEP	NETBAY
NEX	NINE	NOBLE	NOK	NTV	NWR	OCC	OGC	ORI	OSP	PATO
PB	PDG	PDI	PL	PLAT	PM	PPP	PRECHA	PRIN	PRINC	PSTC
PT	QLT	RCL	RICHY	RML	RWI	S11	SAAM	SALEE	SAMCO	SANKO
SAPPE	SAWAD	SCG	SCI	SCP	SE	SFP	SIAM	SINGER	SIRI	SKE
SKR	SKY	SMIT	SMK	SMPG	SMT	SNP	SONIC	SPA	SPC	SPCG
SPVI	SR	SRICHA	SSC	SSF	SST	STANLY	STPI	SUC	SUN	SUSCO
SUTHA	SWC	SYMC	SYNEX	T	TACC	TAE	TAKUNI	TBSP	TCC	TCMC
TEAM	TEAMG	TFG	TFMAMA	THG	THRE	TIPCO	TITLE	TIW	TKN	TKS
TM	TMC	TMD	TMI	TMT	TNITY	TNL	TNP	TNR	TOG	TPA
TPAC	TPBI	TPCORP	TPOLY	TRITN	TRT	TSE	TSTE	TVI	TVT	TWP
TWPC	UBIS	UEC	UMI	UOBKH	UP	UPF	UPOIC	UT	UWC	VNT
WIUK	XO	YUASA	ZEN	ZMICO						
GOOD LEVEL										
A	ABICO	ACAP***	AEC	AEONTS	AJ	ALUCON	AMC	APURE	AS	ASEFA
AU	B52	BCH	BEAUTY	BGT	BH	BIG	BLAND	BM	BR	BROCK
BSBM	BSM	BTNC	CCET	CCP	CGD	CHARAN	CHAYO	CITY	CMAN	CMC
CMO	CMR	CPL	CPT	CSR	CTW	CWT	D	DIMET	EKH	EMC
EPCO	ESSO	FE	FTE	GIFT	GLAND	GLOCON	GPI	GREEN	GTB	GYT
HTECH	HUMAN	IHL	INGRS	INOX	JTS	JUBILE	KASET	KCM	KKC	KWG
KYE	LEE	LPH	MATCH	MATI	M-CHAI	MCS	MDX	META	MGT	MJD
MM	MVP	NC	NDR	NER	NNCL	NPK	NUSA	OCEAN	PAF	PF
PICO	PIMO	PK	PLE	PMTA	POST	PPM	PROUD	PTL	RCI	RJH
ROJNA	RPC	RPH	SF	SGF	SGP	SKN	SLP	SMART	SOLAR	SPG
SQ	SSP	STI	SUPER	SVOA	TCCC	THE	THMUI	TIC	TIGER	TNH
TOPP	TPCH	TPIPP	TPLAS	TQM	TTI	TYCN	UTP	VCOM	VIBHA	VPO
WIN	WORK	WP	WPH	ZIGA						
Score Range		Number of Logo					Description			
90-100							Excellent			
80-89							Very Good			
70-79							Good			
60-69							Satisfactory			
50-59							Pass			
Less than 50		No logo given					-			

## Disclaimer:

The disclosure of the survey results of the Thai Institute of Directors Association ("IOD") regarding corporate governance is made pursuant to the policy of the Office of the Securities and Exchange Commission. The survey of the IOD is based on the information of a company listed on the Stock Exchange of Thailand and the Market for Alternative Investment disclosed to the public and able to be accessed by a general public investor. The result, therefore, is from the perspective of a third party. It is not an evaluation of operation and is not based on inside information.

The survey result is as of the date appearing in the Corporate Governance Report of Thai Listed Companies. As a result, the survey results may be changed after that date. FSS International Investment Advisory Company Limited does not confirm nor certify the accuracy of such survey results.

\* CGR scoring should be considered with news regarding wrong doing of the company or director or executive of the company such unfair practice on securities trading, fraud, and corruption SEC imposed a civil sanction against insider trading of director and executive; \*\* delisted

Source: Thai Institute of Directors Association (IOD); FSSIA's compilation

## Anti-corruption Progress Indicator

CERTIFIED										
ADVANC	AIE	AKP	AMANAH	AP	APCS	AQUA	ARROW	ASK	ASP	AYUD
BAFS	BANPU	BAY	BBL	BCH	BCP	BCPG	BGRIM	BJCHI	BKI	BLA
BROOK	BRR	BSBM	BTS	BWG	CEN	CENTEL	CFRESH	CGH	CHEWA	CIG
CIMBT	CM	COM7	CPALL	CPF	CPI	CPN	CSC	DCC	DEMCO	DIMET
DRT	DTAC	DTC	EASTW	ECL	EGCO	FE	FNS	FSS	GBX	GC
GCAP	GEL	GFPT	GGC	GJS	GOLD	GPSC	GSTEEL	GUNKUL	HANA	HARN
HMPRO	HTC	ICC	IFS	INET	INSURE	INTUCH	IRPC	IVL	K	KASET
KBANK	KBS	KCAR	KCE	KGI	KKP	KSL	KTB	KTC	KWC	L&E
LANNA	LHK	LPN	LRH	M	MAKRO	MALEE	MBAX	MBK	MBKET	MC
MCOT	MFC	MINT	MONO	MOONG	MSC	MTI	NBC	NINE	NKI	NMG
NNCL	NSI	OCC	OCEAN	OGC	PAP	PATO	PB	PCSGH	PDG	PDI
PDJ	PE	PG	PHOL	PL	PLANB	PLANET	PLAT	PM	PPP	PPS
PREB	PRG	PRINC	PSH	PSTC	PT	PTG	PTT	PTTEP	PTTGC	PYLON
Q-CON	QH	QLT	QTC	RATCH	RML	S & J	SABINA	SAT	SC	SCB
SCC	SCCC	SCG	SCN	SE-ED	SELIC	SENA	SGP	SIRI	SIS	SITHAI
SMIT	SMK	SMPC	SNC	SNP	SORKON	SPACK	SPC	SPI	SPRC	SRICHA
SSF	SSI	SSSC	SST	STA	SUSCO	SVI	SYNTEC	TASCO	TCAP	TFG
TFI	TFMAMA	THANI	THCOM	THIP	THRE	THREL	TIP	TIPCO	TISCO	TKT
TMB	TMD	TMILL	TMT	TNITY	TNL	TNP	TNR	TOG	TOP	TPA
TPCORP	TRU	TRUE	TSC	TSTH	TTCL	TU	TVD	TVI	TWPC	U
UBIS	UEC	UKEM	UOBKH	VGI	VIH	VNT	WACOAL	WHA	WICE	WIIK
DECLARED										
2S	ABICO	AF	AI	AIRA	ALT	AMA	AMARIN	AMATA	ANAN	B
BM	BPP	BUI	CHG	CHO	CHOTI	CHOW	CI	CMC	COL	DDD
DELTA	EFORL	EPCO	ESTAR	ETE	FPI	FTE	ICHI	INOX	IRC	ITEL
JAS	JSP	JTS	KWG	LDC	LIT	META	MFEC	MPG	NEP	NOK
NWR	ORI	PRM	PSL	ROJNA	RWI	SAAM	SAPPE	SCI	SEOIL	SHANG
SKR	SPALI	STANLY	SYNEX	TAE	TAKUNI	TMC	TOPP	TPP	TRITN	TVO
UV	UWC	WHAUP	XO	YUASA	ZEN					

Level	
Certified	This level indicates practical participation with thoroughly examination in relation to the recommended procedures from the audit committee or the SEC's certified auditor, being a certified member of Thailand's Private Sector Collective Action Coalition Against Corruption programme (Thai CAC) or already passed examination to ensure independence from external parties.
Declared	This level indicates determination to participate in the Thailand's Private Sector Collective Action Coalition Against Corruption programme (Thai CAC)

### Disclaimer:

The disclosure of the Anti-Corruption Progress Indicators of a listed company on the Stock Exchange of Thailand, which is assessed by Thaipat Institute, is made in order to comply with the policy and sustainable development plan for the listed companies of the Office of the Securities and Exchange Commission. Thaipat Institute made this assessment based on the information received from the listed company, as stipulated in the form for the assessment of Anti-corruption which refers to the Annual Registration Statement (Form 56-1), Annual Report (Form 56-2), or other relevant documents or reports of such listed company. The assessment result is therefore made from the perspective of Thaipat Institute that is a third party. It is not an assessment of operation and is not based on any inside information. Since this assessment is only the assessment result as of the date appearing in the assessment result, it may be changed after that date or when there is any change to the relevant information. Nevertheless, FSS International Investment Advisory Company Limited does not confirm, verify, or certify the accuracy and completeness of the assessment results.

Note: Companies participating in Thailand's Private Sector Collective Action Coalition Against Corruption programme (Thai CAC) under Thai Institute of Directors (as of June 24, 2019) are categorised into: 1) companies that have declared their intention to join CAC, and; 2) companies certified by CAC.

Source: The Securities and Exchange Commission, Thailand; \* FSSIA's compilation



## GENERAL DISCLAIMER

### ANALYST(S) CERTIFICATION

#### Suwat Sinsadok FSS International Investment Advisory Securities Co., Ltd

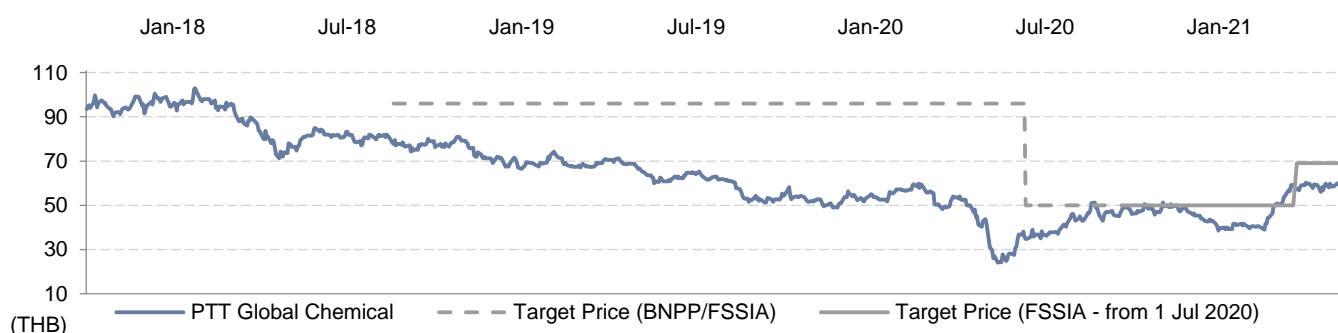
The individual(s) identified above certify(ies) that (i) all views expressed in this report accurately reflect the personal view of the analyst(s) with regard to any and all of the subject securities, companies or issuers mentioned in this report; and (ii) no part of the compensation of the analyst(s) was, is, or will be, directly or indirectly, related to the specific recommendations or views expressed herein.

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#### History of change in investment rating and/or target price

#### PTT Global Chemical (PTTGC TB)



Date	Rating	Target price	Date	Rating	Target price	Date	Rating	Target price
09-Oct-2018	BUY	96.00	08-May-2020	BUY	50.00	-	-	-
09-Apr-2020	BUY	50.00	27-Nov-2020	BUY	69.00			

Suwat Sinsadok started covering this stock from 09-Oct-2018

Price and TP are in local currency

Source: FSSIA estimates

Company	Ticker	Price	Rating	Valuation & Risks
PTT Global Chemical	PTTGC TB	THB 62.50	BUY	The key downside risks to our EV/EBITDA-based TP are the weaker-than-expected HDPE price and HDPE-naphtha margin

Source: FSSIA estimates

#### Additional Disclosures

Target price history, stock price charts, valuation and risk details, and equity rating histories applicable to each company rated in this report is available in our most recently published reports. You can contact the analyst named on the front of this note or your representative at Finansia Syrus Securities Public Company Limited

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All share prices are as at market close on 15-Jan-2021 unless otherwise stated.

## RECOMMENDATION STRUCTURE

### Stock ratings

Stock ratings are based on absolute upside or downside, which we define as  $(\text{target price}^* - \text{current price}) / \text{current price}$ .

**BUY (B).** The upside is 10% or more.

**HOLD (H).** The upside or downside is less than 10%.

**REDUCE (R).** The downside is 10% or more.

Unless otherwise specified, these recommendations are set with a 12-month horizon. Thus, it is possible that future price volatility may cause a temporary mismatch between upside/downside for a stock based on market price and the formal recommendation.

\* In most cases, the target price will equal the analyst's assessment of the current fair value of the stock. However, if the analyst doesn't think the market will reassess the stock over the specified time horizon due to a lack of events or catalysts, then the target price may differ from fair value. In most cases, therefore, our recommendation is an assessment of the mismatch between current market price and our assessment of current fair value.

### Industry Recommendations

**Overweight.** The analyst expects the fundamental conditions of the sector to be positive over the next 12 months.

**Neutral.** The analyst expects the fundamental conditions of the sector to be maintained over the next 12 months.

**Underweight.** The analyst expects the fundamental conditions of the sector to be negative over the next 12 months.

### Country (Strategy) Recommendations

**Overweight (O).** Over the next 12 months, the analyst expects the market to score positively on two or more of the criteria used to determine market recommendations: index returns relative to the regional benchmark, index sharpe ratio relative to the regional benchmark and index returns relative to the market cost of equity.

**Neutral (N).** Over the next 12 months, the analyst expects the market to score positively on one of the criteria used to determine market recommendations: index returns relative to the regional benchmark, index sharpe ratio relative to the regional benchmark and index returns relative to the market cost of equity.

**Underweight (U).** Over the next 12 months, the analyst does not expect the market to score positively on any of the criteria used to determine market recommendations: index returns relative to the regional benchmark, index sharpe ratio relative to the regional benchmark and index returns relative to the market cost of equity.