

EMEA petrochemical outlook H1 2019

Petrochemicals special report

January 2019

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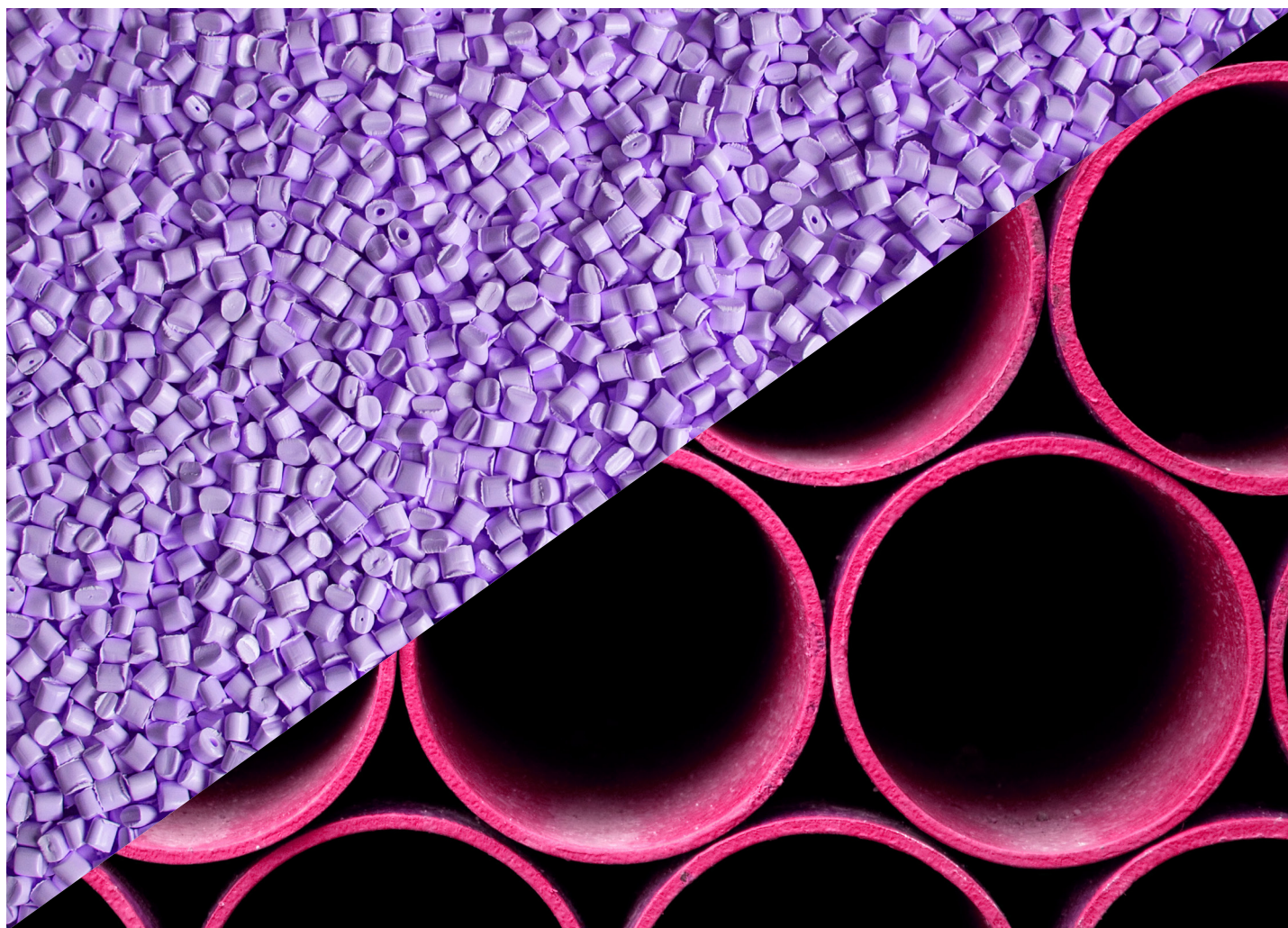
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FOREWORD

The European petrochemicals industry is heading into 2019 on increasingly global terms, braced for ever changing trade flows amid continued geopolitical uncertainty. Growing international supply competition and extensive cracker maintenance in local markets together set the stage for a volatile year ahead.

Rising imports of US ethylene derivatives into Europe look poised to undermine domestic demand for key petrochemical building block ethylene and are likely to weigh on margins. A heavy turnaround schedule planned for spring and autumn might partially offset the demand loss, but with US ethylene undercutting all other regions a choice may be forced between price and market share for some European producers.

Reduced cracker output is expected have most impact on ethylene co-products – some think the propylene and butadiene spot markets could start trading at a consistent premium to industry-settled contract prices – although it remains to be seen if downstream outages and imports will mitigate lower available supply.

The spring turnarounds may also temporarily rebalance European benzene in an overall supply climate dominated by global length as robust paraxylene margins continue to overshadow benzene weakness. Producers are running paraxylene units at high rates to capitalize on advantageous spreads, resulting in an excess of co-product benzene.

Europe's paraxylene position has nevertheless tipped from a net exporter to net short following the startup of a revamped purified terephthalic acid plant in 2018, symptomatic of the wider xylenes market where demand and supply centers are shifting across the world.

Global trade restrictions and their consequences will meanwhile continue to be felt in European markets. In styrene, the trade flow rerouting that followed the introduction of Chinese antidumping duties in 2018 has established Europe as a new import and export hub and led to an increasingly intertwined relationship with China.

Regulatory overhaul in global marine fuels – in the shape of the International Maritime Organization's tighter sulfur emissions limits for 2020 – will also affect the petrochemicals industry, ranging from an almost certain hike in freight rates, to potential changes in refinery output, to an intensified bid by the methanol market to grab a slice of the lucrative shipping pie.

— [Anna Crowley](#), [Bao Ying Ng](#), [Maria Tsay](#)

OLEFINS & POLYMERS

Polyethylene to have greater sway in European ethylene market

- **PE imports to pressure ethylene**
- **Cracker turnarounds may provide marginal support**
- **Crude, naphtha to impact contracts**

Polyethylene will play a greater role in charting the course of the ethylene market in the next six months. And, if the market emulates the trend seen throughout the second half of last year, scheduled cracker turnarounds may not provide much support for ethylene, as long-term bearishness in PE may outweigh their impact.

And as two-thirds of European ethylene capacity is liquids-based, support to prices, particularly during contract negotiations, may come from crude oil depending on what direction that takes given its remarkable volatility in the last quarter of 2018.

PE imports to pressure C2

The European market is set to see intensifying volumes of imports in 2019 as producers in the US raise exports from their newly started-up plants.

Imports across the Atlantic were already on the rise throughout the second half of last year.

"Ethylene [prices in 2019 will] depend a lot on polymer markets," one of the largest traders of olefins in Europe said in December.

Consumers of ethylene are expected to bring downstream PE developments into their monthly ethylene contract price negotiations, arguing that competition from overseas could make it impossible to simply pass down changes in feedstock pricing.

Traditionally, ethylene contract negotiations in Europe have been based on spot ethylene, upstream naphtha and crude price movements with aspects like cracker margins and PE margins playing lesser roles.

According to S&P Global Platts estimates, the US will add a total of 6.8 million mt/year of new shale-based PE capacity by the close of 2019, when compared with 2016.

Capacity coming up in the US this year include Formosa's 625,000 mt/year low density PE plant and a 525,000 mt/year high density PE plant in Point Comfort, LyondellBasell's 500,000 mt/year HDPE plant in La Porte, Sasol's 450,000 mt/year LDPE plant at Lake Charles and Exxon Mobil's 650,000 mt/year linear low density PE plant in Beaumont.

Outside the US, a major project to watch out for is Sibur's Zapsib petrochemical project located in Russia's Tyumen region. The project will have a total capacity of 1.5 million mt/year of various PE grades.

A good volume of this production is designed for export and Europe is being counted as a prime destination for both US- and Russian-origin product.

Europe is a net importer of PE and its import requirement in 2019 is estimated at less than 2 million mt/year, but PE demand is expected to grow by 9% this year, according to Platts Analytics. Though this growth is modest compared with demand growth in Asia — at close to 60% — it is expected to support imports.

Expectations that imports of PE from the US will rise in H1 have been supported by recently published statistics. According to latest data from Eurostat, EU imports of all PE grades from the US rose by 33% year on year in the period January-October to 231,862 mt. While at the start of the year imports from the US averaged 7,500 mt/month, October exports totaled 46,628 mt.

EU imports of LLDPE from the US surged to 30,869 mt in October from just 3,088 mt in October 2017, while HDPE imports tripled on year to 12,589 mt and LDPE imports also doubled but from a much lower base to 3,170 mt.

A tariff tussle between the US and China, designed to impose duties as high as 25% on US-origin PE imports into China, has been widely expected to boost US supplies to Europe as producers look for alternative trade routes. It remains to be seen whether the recent truce between US and China and agreement for further negotiations would alter this.

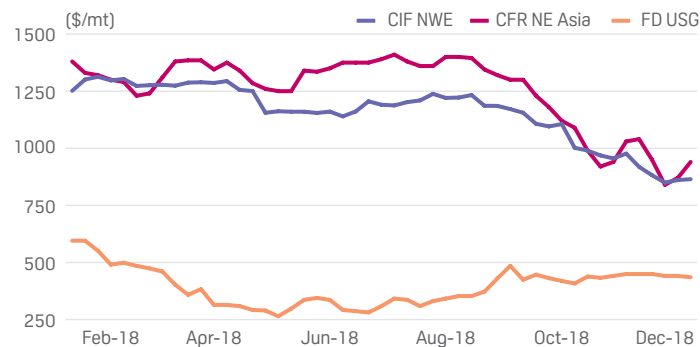
Cracker turnarounds scheduled in H1

A number of cracker turnarounds are scheduled in H1, and this under normal circumstances would have supported all olefins prices. However, so well supplied is the downstream PE market that a similar scenario in H2 2018 failed to lift ethylene prices.

In the period mid-July to mid-December, ethylene in Europe slumped by more than Eur250/mt (\$284/mt). The drop in prices in Europe was more pronounced in the mid-August to mid-December period when the price slumped Eur300. This was the period when major crackers in the Continent shut down for maintenances. During the same period, in Asia, ethylene plummeted about \$570 and the CFR NE Asia assessment was last seen hovering in the \$930-940/mt range. Major crackers in Asia were also undergoing maintenances during this period.

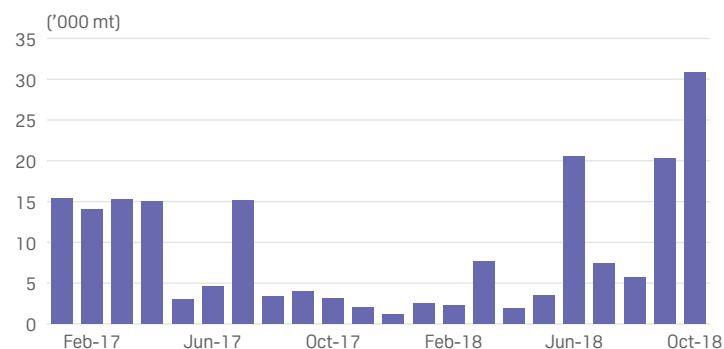
Ethylene prices in Europe tend to take cues from developments globally and plant start-ups in the US are expected to weigh in on prices. In the first half of this year

ETHYLENE PRICES GLOBALLY UNDER PRESSURE



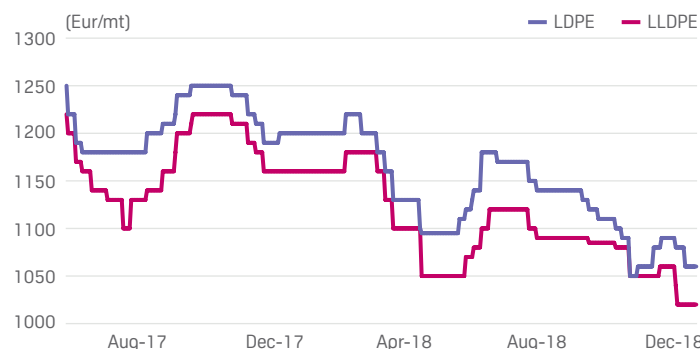
Source: S&P Global Platts

US LLDPE IMPORTS INTO EUROPE REGISTER A STRONG RISE



Source: Eurostat

STRONG SUPPLIES WEIGH IN ON PE PRICES



Source: S&P Global Platts

HEAVY MAINTENANCE WORKS PLANNED IN EUROPE FOR SPRING AND AUTUMN

| Owner | Type | Location | Capacity in '000 mt/yr | | | Offline |
|-------------|------|---------------|------------------------|-----------|-----------|---------|
| | | | Ethylene | Propylene | Butadiene | |
| Shell | FCC | Pernis | 0 | 160 | 0 | Q1 |
| PCK | FCC | Schwedt | 0 | 285 | 0 | Spring |
| Petrohemija | CRK | Pancevo | 200 | 85 | 30 | Spring |
| Dow | CRK | Bohlen | 560 | 310 | 104 | Q2 |
| Versalis | CRK | Priolo | 490 | 250 | 0 | Q2 |
| Shell | CRK | Moerdijk | 910 | 510 | 114 | Q2 |
| BASF | CRK | Antwerp | 1,080 | 650 | 154 | Q2 |
| BP | CRK | Gelsenkirchen | 484 | 310 | 0 | Autumn |
| Dow | CRK | Terneuzen | 1,830 | 805 | 180 | Autumn |
| Repsol | CRK | Tarragona | 700 | 345 | 129 | Q4 |
| BASF | CRK | Ludwigshafen | 620 | 345 | 104 | Q3 |

Source: S&P Global Platts

the US is expected to add 2.7 million mt of new capacity with the start-ups of Lake Charles plant in Louisiana by Lotte and Westlake and of Point Comfort plant in Texas by Formosa.

Support may come from bullish upstream

It is a fact that crude and subsequently naphtha have the strongest impact on ethylene prices in Europe. A recent agreement between the coalition OPEC and non-OPEC producers, or OPEC+, to cut supplies by 1.2 million b/d beginning January is expected to lend support to every petrochemical product and ethylene would be no exception. Naphtha, a direct derivative of crude and the prime feedstock for European ethylene, is already attempting to chart an upward trend since end-November after remaining bearish for months, and if this trend gathers pace in 2019, ethylene may find some support.

— *Shashank Shekhar and Ora Lazic*

European propylene market to see tightness amid heavy turnaround schedule

- Significant losses in production expected
- Players eyeing import opportunities
- Downstream markets concerned over supplies

Planned turnarounds at a number of steam cracker units in Europe are set to tighten propylene supply availability during the first half of 2019. While major works will be carried out throughout the year until December, market players expect especially significant losses in production during the second quarter.

According to S&P Global Platts Analytics data, total propylene production in 2019 will be around 12.13 million mt, down from around 12.28 million mt in 2018, but production between March and June be around 3% lower at 3.99 million mt.

On the back of this, discounts to contract prices for both polymer and chemical grades, seen at the tail-end of 2018, are likely to disappear.

PROPYLENE PRICES TUMBLE IN Q4, BUT 2019 OUTLOOK BULLISH



In May 2018, spot propylene started trading at a premium to the industry-settled contract price, reaching levels not seen since May 2014 in June with the spot price hovering around Eur1,110-1,120/mt (about \$1,266-\$1,278 at current rates) FD NWE, Platts data showed. However, several production and logistical issues caused by critically low water levels on the River Rhine in Germany had added length to the propylene market starting from October.

Buyers reacted positively to recent trends and they are less pessimistic about 2019. But premiums to the contract price are likely to reappear starting from February, ahead of the start of the turnaround season, sources said.

Mind the supply gap

Market players have adopted different approaches to mitigate the impact, with some trying to secure material on a contract basis, and others leaving some gaps open to buy from the spot market. Another option that many will explore to fill the supply gap is to look for additional imports.

The US, Middle East and Asia are all considered as potential sources of molecules amid expectations of higher production in those regions.

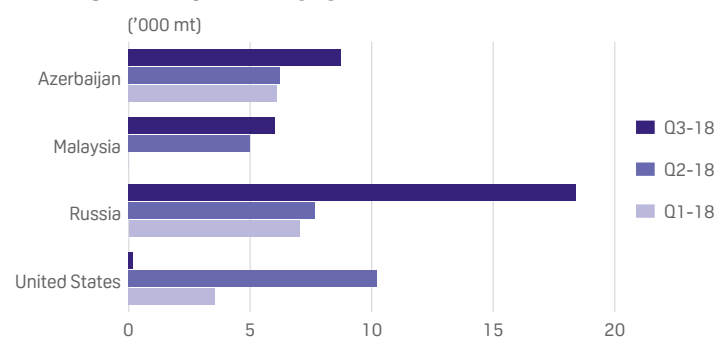
"This year PDH units in the US have had a poor operating record. It is always the case during the start-up year. But they should be running better in 2019," a propylene producer said in December.

Additional volumes could come from the Middle East, following the start-up of the ADNOC's 520,000 mt/year PDH plant in Abu Dhabi earlier in 2018 and potentially from Malaysia, where Lotte is expanding capacity by 170,000 mt/year.

Some think there might be no additional structural imports to Europe, however.

The latest Eurostat data showed total imports were around 340,150 mt between January and October 2018, down 10.4% year-on-year. Russia was the main supplier, with a total of 33,120 mt, down 63% on the year. Imports from

MAIN PROPYLENE IMPORTS FROM RUSSIA, BUT MORE FROM US, MALAYSIA EXPECTED IN 2019



the US were around 20,650 mt, while from Malaysia were 14,070 mt, the data showed.

Consumer concerns over supply

Some derivatives units will try to time their works to coincide with the cracker outages, but it is unlikely to balance out the loss of propylene production, with some expecting polypropylene units to run at lower rates this year.

Platts Analytics expects that the demand for polypropylene will edge up by around 1% to 10.83 mt in 2019. Against the background of reduced production, this should also mean more imports into Europe.

One of the key issues for polypropylene producers in 2018 was affordability given the high costs of propylene. As prices of feedstock propylene have increased significantly and polypropylene prices have remained relatively stable, PP producers have seen their margins squeezed.

The homo injection polypropylene and polymer grade propylene spot price spread fell to a four-year low at Eur116/mt in June, before rising to levels of Eur310-330/mt in December amid greater supply availability in feedstock propylene.

In other derivatives, there are no major turnarounds planned on European oxo-alcohols plants in 2019.

“Since we are entering this year with high prices of oxo, and there is a huge maintenance schedule on propylene, there is no background for a decrease in price,” one oxo source said.

Spot prices of 2-ethyl hexanol and n-butanol reached multi-year highs in 2018 because of several production issues and planned maintenance.

Meanwhile in downstream acrylonitrile, only a few producers are going to carry out maintenance work this year.

Whether the acrylonitrile market will be able to cope with tightness in feedstock propylene depends on the acrylic fiber sector, where demand has been sluggish in the second

half of 2018. Despite this, with no additional capacity in Europe, the market expects strength on the back of healthy demand, particularly from acrylamide and ABS.

— [Lara Berton](#)

Increased butadiene volatility in 2019 to test downstream SBR

- **Price volatility expected amid heavy cracker turnaround season**
- **Butadiene to remain vulnerable to Asia demand fluctuation**
- **SBR producers look outside Europe to maintain sales volumes**

Butadiene derivatives are expected to find themselves trapped between uncertain downstream demand and volatility in feedstock butadiene's availability and pricing in 2019, with margins remaining a central concern.

Many butadiene market participants expect 2019 to be a volatile year as a heavy cracker turnaround schedule in Europe is expected to disrupt butadiene production while as a net exporter the region will remain exposed to the vagaries of export markets. Meanwhile, downstream turnarounds are also set to change supply and demand dynamics.

Market eyes price swings ahead of maintenance

Butadiene market sources expect price volatility to return in 2019 with plant interruptions across the chain from feedstock to derivatives.

European butadiene spot prices moved between Eur770/mt and Eur1,400/mt (about \$885 to \$1,595/mt) FD NWE in 2018, according to S&P Global Platts data — in fact, a relatively narrow range in comparison with the peaks and troughs reached in 2017, when the spot price soared to a year-high of Eur2,350/mt and registered a low of Eur650/mt.

Speaking in late 2018, one European producer said that buyers may look to lower their spot exposure in 2019 and take higher contract volumes to try to mitigate any availability issues resulting from the cracker turnarounds.

Several major butadiene buyers, such as Butachimie and Michelin, are also expected to carry out their own turnarounds over the summer months and this is expected to help offset the impact of maintenance upstream.

Beyond the domestic market, developments in other regions will continue to drive European butadiene. NWE prices were supported for much of 2018 by strong sales in Asia and the Americas but in the fourth quarter suffered from declining demand and pricing in Asia and a lack of demand for butadiene imports from the US. Trade data through to October 2018 shows a sharp fall in European

POLYPROPYLENE-PROPYLENE PRICE SPREAD VOLATILE IN 2018



butadiene exports from mid-year onward, with total exports falling by more than 25% on the year to 89,108 mt for July–October 2018 from 125,515 mt for the same period of 2017, according to European statistics agency Eurostat.

SBR sees weak demand, uncertain export appetite

Downstream, European producers of styrene-butadiene-rubber will be faced with difficult decisions in 2019 on whether to reduce production levels or offer substantial discounts on export volumes, eroding any potential margin gains from recent decreases in monomer feedstock costs.

SBR players expect the first quarter of 2019 to be defined by sluggish market conditions generated by a slow economy and limited exports. Most uncertainty is linked to geopolitical developments, more locally colored by the Brexit situation and what this will mean for the UK and EU tire industry.

According to market sources, domestic SBR sales may increasingly be insufficient to support European SBR production. Alongside the limited GDP growth expected in Europe, there is a general feeling of cautiousness among consumers with new car purchases on hold until the economic outlook is clearer, sources said.

European SBR producers may therefore look to international markets to retain sales volumes. While some

material will continue to move to the Americas, regaining a competitive edge in Asia is likely to be central to export plans in 2019. The Asia arbitrage is currently closed, however, with the average December ESBR 1502 price hovering around \$1,370/mt FOB NWE against around \$1,350/mt CFR NE Asia.

Europe exported 33,636 mt of SBR to China, the largest export market in Asia for European material, in January–October 2018, stable on the year, with previously expected growth reduced by the arbitrage closing in Q3. SBR producers remained hopeful at the year-end that sales would recover when restocking begins in January despite challenging market and economic conditions, while other market participants were expecting a slow start to the year.

— [Luke Milner and Ora Lazic](#)

Supply tightness, competitive imports to challenge European PVC in 2019

- **Low stocks, production issues support spot prices**
- **Growing US imports compete for Europe market share**
- **Geopolitical issues, Turkish crisis weigh on export flows**

The European polyvinyl chloride market faces diminished inventories and continued supply tightness heading into 2019. The disrupted production that has marked recent months is expected to extend into the first quarter of this year, while upstream cracker maintenance may see feedstock restrictions in the second quarter.

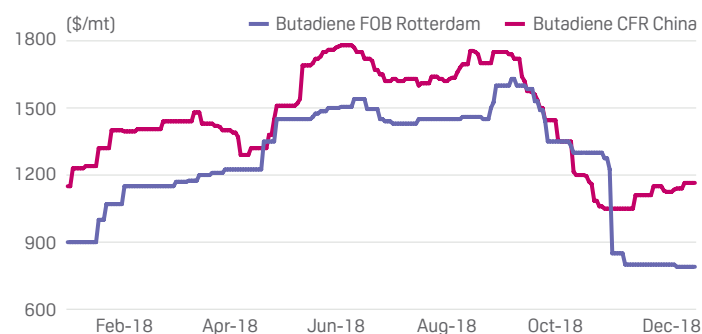
Market participants will also be closely watching changing trade flows, with geopolitical uncertainties presenting demand risk in some PVC export markets, while imports from the US and Mexico may present new opportunities to buyers and challenges to sellers in the year ahead.

Supply crunch, feedstock risk

Market sources expect PVC spot prices in Northwest Europe to remain supported in the first half of 2019 by continued supply tightness and steady demand. The industry ended 2018 with low stocks of PVC and upstream vinyl chloride monomer following a string of production issues primarily caused by severely low water levels on the River Rhine. The interruption of barge activities continued to affect PVC production at year-end, sources said.

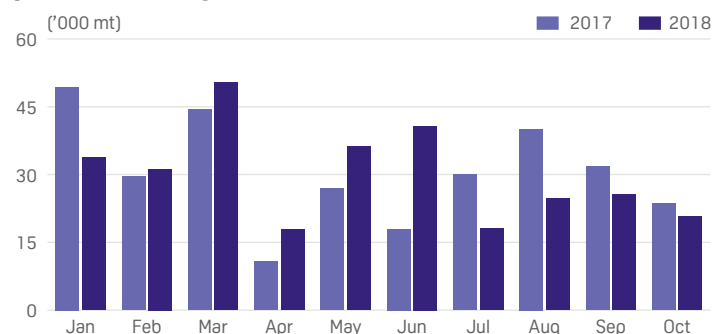
Reduced availability of feedstock ethylene during spring cracker maintenance is also seen as a potential threat to PVC production. However, sources have said that European supply may be partially compensated for by US ethylene imports. Most PVC producers are believed to have agreements in place for uninterrupted supply of ethylene

CHINA LOSSES SPARK EUROPEAN BUTADIENE EXPORT PRICE COLLAPSE IN Q4-18



Source: S&P Global Platts

EUROPEAN BUTADIENE EXPORT MARKET DEMAND DROPS ON-YEAR IN H2-18

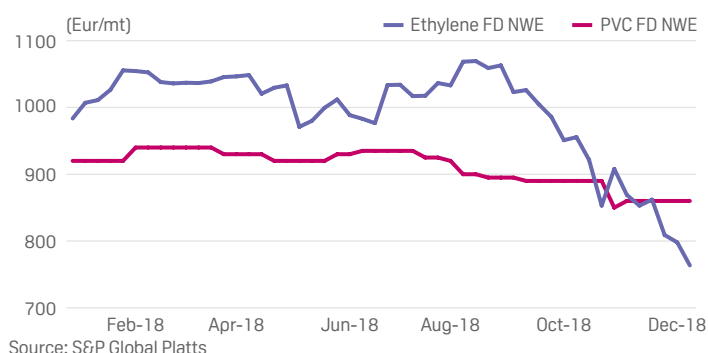


Source: Eurostat

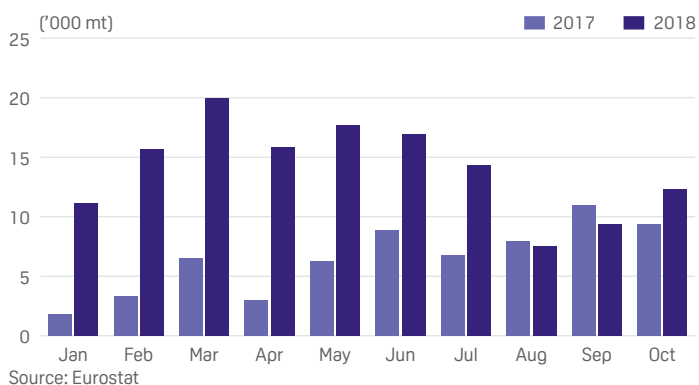
while some are fed from crackers that completed their turnarounds in 2018.

PVC spot prices were assessed below ethylene for most of 2018, S&P Global Platts data shows, but the discount flipped to a premium in November. Supply length saw ethylene spot prices fall below Eur800/mt (about \$910/mt) FD NWE in December, plunging from Q3 levels above Eur1,000/mt, while short PVC stocks kept PVC spot in a narrow Eur850-900/mt FD NWE range over the same period. PVC stood at a Eur96.50/mt premium to ethylene mid-December, compared to a Eur63.50/mt discount at the start of the year.

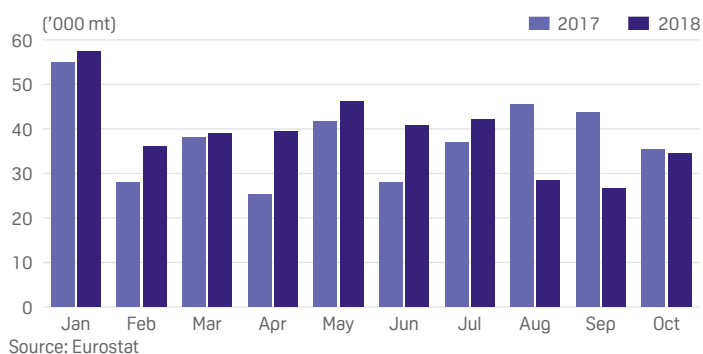
NWE PVC SPOT HOLDS GROUND IN AUTUMN 2018, DECOUPLING FROM FALLING FEEDSTOCK



US PVC IMPORTS INTO EUROPE DOUBLE IN 2018



TURKISH CURRENCY CRISIS WEIGHS ON PVC IMPORTS FROM EUROPE IN Q3-18



Trade flow changes, new competition

With Europe looking to restock, PVC buyers will be monitoring import opportunities in the months ahead. PVC flows from the US to the EU more than doubled in 2018, according to statistics agency Eurostat, while material from Mexico, Europe's largest importer, has been continuously heard offered at competitive prices, mainly into Southern Europe.

US imports soared to 140,950 mt in the first 10 months of the year, from 64,784 mt in the same period of 2017, Eurostat data showed, with Mexican volumes at 209,736 mt for January to October 2018, up 4% on the year. Traders expect the growing import trend from the US to extend into 2019 while one producer also flagged significant growth from Russia and the Ukraine.

Geopolitical uncertainties meanwhile will continue to affect PVC trade in 2019, dominated by economic turmoil in Turkey together with Brexit, US-China trade tensions and budget difficulties in Italy — a premium domestic market.

Sales to Turkey, by far the biggest export market for European PVC, have become more difficult since the currency crisis intensified over the summer.

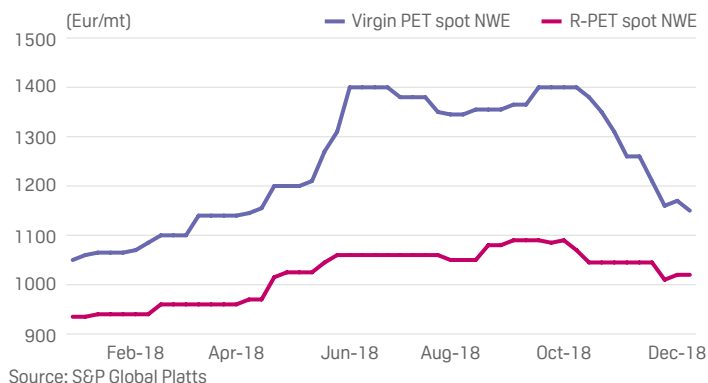
Year-to-date flows from Europe were 390,122 mt for January to October 2018, up around 3% on-year, according to Eurostat data, but began to fall sharply in the third quarter, from 42,220 mt in July to a multi-month low of 26,692 mt in September. Market sources expect a continued downtrend as European PVC competes with offers from other regions for fewer buyers in a weakened Turkish market. Competitive offers are expected from the US, Korea and Mexico alongside more traditional sellers in the Middle East and Egypt.

"2019 is expected to be very tough. Demand will be steady, low. And it will be mostly a 'wait and see' market with low inventory," a Turkish trader said. And one European producer said: "The impact will be felt by everyone from the geopolitical situation. PVC will be like everyone else."

— [Ora Lazic](#)

PET, recycled PET pricing relationship to decouple further in 2019

The PET market is expected to see a divergence in market trends between virgin and recycled grade materials this year. Virgin PET may see higher costs as tightness in the paraxylene market will certainly be felt in the polyethylene terephthalate market, which will face ever increased competition for PTA due to the strong polyester fiber market.

R-PET PRICES SHOW GROWING DISCONNECT TO VIRGIN PET

Meanwhile, policy changes and consumer demand have led so far to an imbalance in recycled PET demand and recycling capacity across the UK and continental Europe. Consumers have demanded more recycled content in their packaging and companies have made promises of higher minimum recycled content in their packaging. Bottled drinks makers, for example, have led the way with some promising 30% to 50% minimum recycled content by 2025. Governments have announced plans to levy taxes on packaging that does not contain minimum quantities of recycled content.

This has led to increased demand for recycled PET and many converters are seeking to speed up the process of switching their packaging from other, less easy to recycle plastics to PET. However, many recyclers have said that a key challenge is raising collection rates and building more recycling infrastructure.

Additionally, supply has been an issue, with one UK consumer saying they “wanted to buy some flakes, but could not get any offers.” Another added that when they are offered material, the price was only valid for a matter of hours.

Quality is also a concern, with food grade clear flakes commanding a significant premium over lower quality recycled PET.

Market sources said that through 2019, the recycled market will show an ever increasing disconnect to the virgin market, and begin to follow more its own market fundamentals.

Buyers are worried about how high prices could peak in 2019, and some, who have storage capacity and deep pockets, have spoken about strategies to buy significant months’ worth of supply in bulk when prices allow for good margins.

Others without suitable storage have spoken about the feasibility of renting long term tank storage, and even building their own storage facilities.

— [Benjamin Brooks](#)

Turkish polymers to stay jittery amid cheap imports, economic gloom

- **Bearish economic forecast to weigh in on demand**
- **Cheap product influx to cap polyethylene prices**
- **Uncertainty remains regarding PS imports from Iran**

As the Turkish polymer markets move into 2019, the economic uncertainty and currency volatility seen throughout last year continue to dominate the market, and the continuous influx of cheap material from other regions, primarily the US, will likely remain a defining factor in the coming months.

Traders’ views on the development of polymer markets are all tied to the fortunes of the Turkish economy, and many are pessimistic looking forward.

The OECD said in November in its forecast that it did not expect growth recovery in Turkey until 2020. “The country’s economy is projected to contract in 2019 as a sharp fall in domestic demand from the second half of 2018 will be offset only partially by an increase in exports.”

“We are at the beginning of an economic crisis,” one Turkish market observer said, pointing to the country’s fluctuating exchange rate as a sign of instability.

The previous, almost continuous, downtrend in the value of the Turkish lira against the US dollar, which accelerated rapidly during August 2018, was, in the closing months of 2018, replaced with exchange rate volatility.

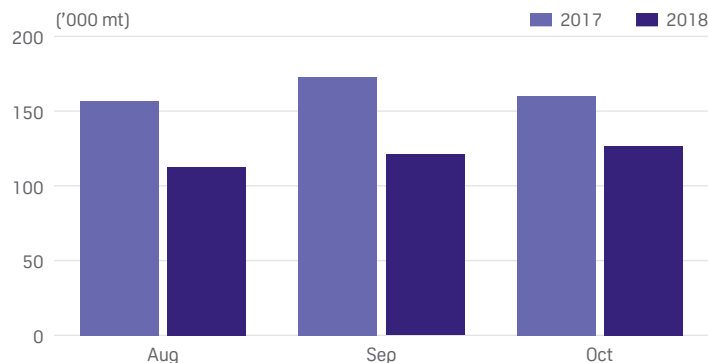
The Turkish lira fell from 3.766 to the US dollar on January 2 to lira 6.747 to the dollar on August 30, before recovering a little and spending much of the fourth quarter oscillating between lira 5 to lira 6 to the US dollar.

As a major import market, exchange rates play a crucial role in Turkey’s polymers markets and the rise in the value of the dollar against the lira hit market sentiment. It has dampened domestic demand, as many purchase their raw materials in US dollars and sell their finished products within Turkey in Turkish lira and saw a steep deterioration in margins with the currency’s depreciation.

Construction sector polymers

The economic slowdown has also led to a halt in a number of construction projects, and the demand for polymers widely used in the construction sector, such as PVC, expandable polystyrene and polypropylene, has dropped.

Over August–October of 2018 alone, imports of PP into the Turkish market declined by over 26%, according to data from the Turkish statistics agency Turkstat. This decrease reflects the drop in demand witnessed by sellers in 2018.

POLYPROPYLENE IMPORTS INTO TURKEY DECLINE YEAR-ON-YEAR

At the same time imports of PVC almost halved compared to the last year, falling to 126,564 mt.

Although many market sources see no reason to expect an uptick in underlying demand for these polymers throughout the whole of 2019, some are confident that the first quarter could provide a silver lining to the market's outlook.

With municipal elections expected in Turkey in March, some in the market expect a proliferation of government-backed construction projects ahead of the elections, which would help stimulate demand for both PP and PVC pipes from the construction sector.

However, this may be a double-edged sword, as some in the market fear a drop off in construction projects following the March elections – dividing the outlook for the first two quarters of 2019.

Polyethylene wave from across Atlantic

Intensive polyethylene imports from all over the globe, but in particular from the US, superimposed onto the country's weak economic forecasts are painting a bearish picture for this year.

As in neighboring European and African markets, Turkey witnessed an influx of competitive US offers in the closing months of 2018, particularly for LLDPE and HDPE. This low-price material exacerbated the existing weakness in the market, after months of economic uncertainty and subdued demand, and led to LLDPE CFR Turkey spot prices deteriorating to their lowest levels since 2009.

LLDPE spot prices fell to \$920/mt CFR Turkey on December 19, 26% down from early March, when the prices reached their highest level of the year at \$1,240/mt.

The continuing presence of competitively priced US material in the Turkish PE markets is expected to remain a defining feature of the market in 2019, particularly as

ongoing economic uncertainty makes the outlook for demand uncertain.

Talking about PE prices in Turkey, one market participant said, "It will continue [to go down] for two to three years. PE is a loser because there is a glut of material."

Polystyrene demand struggles

As in other polymers markets, the Turkish polystyrene market saw demand struggling in 2018, weighing in on spot prices. Competition from imported Iranian PS also placed pressure on prices in 2018. However, since the introduction of renewed US sanctions on Iran and amid an anti-dumping investigation Turkish market participants have become increasingly cautious over the use of Iranian material.

Turkey has introduced antidumping duties of over 11% on Iranian polystyrene following an investigation launched in the second quarter of 2018.

One Turkish market participant said in December that preliminary results of the investigation showed Iran was selling polystyrene "cheaper than the world market."

So far the measure has had little impact on the market, but in the long-term it could lead to a higher trading activity, as both imports from other origins and domestic product may now be seen as more competitive.

On the flip side, if less Iranian material ends up flowing into Turkey, Iranian suppliers are likely to seek alternative outlets elsewhere, for example in Asia.

Looking ahead, the development of import relationships and domestic demand will continue to shape the Turkish market in the coming months but will themselves be shaped by wider political and economic developments outside the control of market participants.

— [Luke Milner and Maria Tsay](#)

TURKISH LIRA VOLATILITY UNDERMINES PURCHASING POWER

Aromatics, Methanol and MTBE

European benzene heaves full tanks into 2019

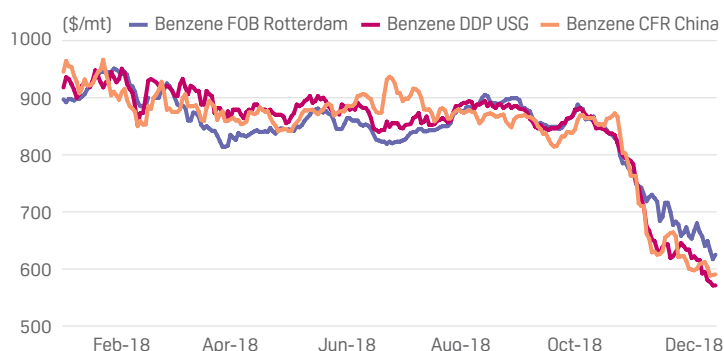
- No relief from oversupply fundamentals expected in Q1
- Slow recovery expected from 2018 downturn
- Price swings may send India, Middle East exports to China

The European benzene market faces ongoing length moving into 2019. Global supplies have been high through the end of 2018 and conditions resulting in peak production seem unlikely to change at the start of the year.

The low crude price environment is expected to keep naphtha attractive for cracking in the first quarter, while healthy paraxylene margins will continue to promote benzene by-production from toluene disproportionation.

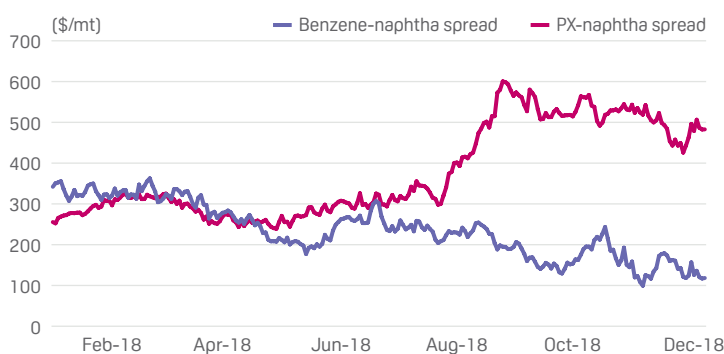
Tanks full to the brim saw European benzene prices hit three-year lows in 2018, with CIF ARA spot averaging below \$600/mt in December having started the year above \$900/mt, according to S&P Global Platts data. Market players expect higher prices during the first half of 2019, but these

GLOBAL SUPPLY PRESSURE TANKS Q3 GLOBAL BENZENE PRICES



Source: S&P Global Platts

PX BOOM SINKS BENZENE STRENGTH THROUGH MSTDP



Source: S&P Global Platts

are unlikely to arrive until the second quarter when cracker turnarounds look set to rebalance benzene fundamentals, with maintenance outstripping planned outages downstream to consume stockpiles.

Producers under pressure ahead of Q2 turnarounds

Low crude prices and cold weather could spell increased naphtha cracking in both the US and Europe over the winter months, according to market sources.

This could point to greater aromatics production — a potential boon for tighter toluene and mixed xylene markets, but adding to existing oversupply pressures in the benzene market where a benzene-to-naphtha spread below \$200/mt is often taken as a measure of long supply. The European spread hit an all-time low of \$99.25/mt in November, Platts data showed, and averaged less than \$190/mt for the second half of 2018.

Continued strength in the paraxylene-to-toluene spread may also deepen the supply glut, supporting high run rates of mobil selective toluene disproportionation (MSTDP) units for paraxylene production with surplus benzene emerging as a byproduct.

“Part of the relief for the oversupply will have to be these units slowing down, but I don’t see much sign of that in the first half of 2019,” a trader said. The paraxylene-toluene spread is typically profitable at \$150/mt or higher and surging paraxylene prices have seen the European margin trend at well over \$300/mt for much of the past six months. Though MSTDP operations in Europe are limited, high run rates globally have weighed on the European market.

Looking to Q2, producers were eyeing ways of offsetting a tighter feedstock environment ahead of the cracker turnaround season beginning in April. “Right now the benzene price is so weak we are considering selling pygas to gasoline blenders and buying benzene in,” a producer said. A second producer agreed that selling pygas instead of further refinement to benzene was an attractive proposition for 2019. While on paper the idea is appealing and could see a quick turnaround in benzene inventory sizes come April, it is untested and consumer reaction to receiving material from a different producer than that named in their contract could create difficulties, sources said.

On the demand side, downstream styrene is expected to pick up in 2019, recovering from considerable disruption to production facilities through planned and unplanned maintenance in 2018 that contributed to the build-up of benzene supplies. Some downtime from styrene producers is expected given cracker outages but this is limited and already factored into market plans, according to traders. The benefit of the disruptive environment in 2018 is that problems are unlikely to be repeated from serviced plants, helping stabilize benzene demand in 2019, sources said.

Swing markets eye Far East export opportunities

Sellers in India and the Middle East may begin to target higher pricing in Far East Asia in 2019, according to traders, after a push into Europe in 2018 added further import cargoes to an already fat market. Imports from India totaled 304,577 mt in the first three quarters of 2018, according to Eurostat data, compared to 181,819 mt for the whole of 2017.

Recent pricing would justify a change in trade flows, one trader said in December. "It's almost high enough for an arbitrage from Europe, which has happened only three or four times in the last five years," he said.

On paper, the arbitrage window from Europe to Asia was open briefly in November, with three days showing positive numbers with freight rates taken into account. The December average for the on-paper arbitrage was a negative \$37/mt potential gross profit, according to Platts data as of December 13.

However, there are significant hurdles to overcome to send European molecules to the Far East. Export licensing is required to sell benzene into China, with the trader saying he currently did not know anyone in possession of a license. The European market has typically looked to the US for export opportunities but high supply in the US makes it unlikely that this route will open for European exporters in 2019. Exports to the US stood at 82,025 mt for the first nine months of 2018, according to Eurostat data, down from 91,858 mt for the same period the previous year.

— [Simon Price](#)

European styrene market looks balanced to tight

- **Downstream derivative demand in Europe to strengthen**
- **Asian demand for European material to rise on downstream needs**
- **European supply to tighten in Q2 on turnarounds**

The European styrene market is expected to be balanced in the first quarter, despite a styrene plant turnaround in the US which will reduce production from a key supplying region into Europe, due to robust existing supplies. In the second quarter however, the European styrene balance will tighten on the back of styrene plant turnarounds and increased demand from Asia.

In 2019, another key factor in the market will be Chinese anti-dumping duties. 2018 marked the year that anti-dumping duties were imposed on volumes going to China from the US, Taiwan and South Korea. The higher cost of imports from the US in China due to the duties led to a surge in Asian prices. This led to a two-tier pricing structure emerging, where the reduced demand of US styrene from key market China led to an excess of volumes

GLOBAL STYRENE TWO-TIER PRICE STRUCTURE EMERGES FOLLOWING ANTIDUMPING DUTIES IN H2-18



within the region. As a result, US styrene prices fell to be the lowest globally.

China then turned to purchasing styrene from Europe — European styrene exports to China surged in September from August to 41,627 mt, Eurostat data showed. This led to Chinese prices climbing to be the highest globally, followed by European prices, according to Platts data. In the same month in 2017, China imported just 17 mt of styrene from Europe. At the same time, lower-priced US volumes flowed to Europe. This two-tier structure is expected to remain going into 2019, with prices gaining towards the end of the first half of the year as European production decreases, and Asian demand increases.

With the EU now a larger trading hub for styrene, the relationship between the EU and China has grown increasingly intertwined. Towards the end of 2018, weak demand and increasing Asian inventory levels caused the demand for European material to wane, resulting in a steep drop in prices by 36% over mid-August to mid-December to a two-year low at \$915/mt FOB ARA. However, European market sources expect Asian demand to increase in H1 2019 as downstream end user consumption rises, which is expected to lead to a knock on effect in demand for European origin styrene.

Feedstocks to play key role

Apart from demand and supply fundamentals, feedstocks are also expected to play a significant role in the styrene market. Benzene and ethylene prices have fallen significantly, particularly towards the end of 2018. This was weighed down by the fall in the upstream energy complex, Platts data showed.

Market participants have dubbed 2019 the year of cracker turnarounds, as major producers have announced planned outages in the first half of the year. Ethylene will face lowered production rates, which in turn may increase costs for styrene producers to secure ethylene volumes, according to sources. Consequently, imports and pre-building of ethylene inventories may occur in order to account for the production shortfall.

Downstream, styrene derivatives are expected to be another key determinant of the increase in styrene demand in H1 2019. European expandable polystyrene demand is expected to rise about 2-2.5% as the construction sector picks up in 2019, according to market sources. “EPS will grow tracking GDP,” a producer said. According to OECD estimates the Eurozone economy is expected to grow above 2% over 2018-19.

Acrylonitrile butadiene styrene, another downstream derivative of styrene, saw a weaker market in Europe amid lower feedstock costs and weak demand in the fourth quarter of 2018. While demand for material had increased, customers were buying in line with their needs only. However, this trend is expected to improve going into 2019, as end-user consumption increases – for example, the German automotive industry, which is a large consumer of ABS, is expected to grow in the first half, industry sources said.

— [Olu Shaw](#)

Rebalancing in European xylenes market as global supply, demand centers shift

- **PX trade flows to change as Europe demand rises, China imports less**
- **MX, OX to remain tightly supplied on strong PX demand**
- **Questions remain over delays to new Asian paraxylene capacity**

The first half of 2019 will see significant rebalancing in the European xylenes market amid increased demand from Indorama's Artlant purified terephthalic acid plant in Portugal, new capacity slated to open in China and expectations of short supply of mixed xylene and orthoxylene.

European PX import sources to include more origins

Indorama's Artlant purified terephthalic acid plant in Sines, Portugal has a paraxylene consumption capacity that is larger than the current excess supply in Europe, a producer said. With strong continued demand, and

high prices for PTA and downstream polyester fiber going into 2019, Artlant is expected to turn to PX imports in the first half of the year to run as close to full capacity as possible.

In Q3 and Q4 2018, Indorama imported significant volumes of paraxylene from the Middle East and the United States because it could not find the volumes in Europe, either at all, or at attractive enough prices. This trend looks set to continue into 2019, with the Middle East an attractive PX source due to lower prices. The US is also attractive for lower freight rates and shorter journey times.

Europe could export less to Asia as new capacity starts up

In Asia, Chinese import demand may well reduce, as large capacity plants are slated to open by the end of H1 2019. However, opinions differ in the market as to whether these plants will open on time.

Some don't believe these large capacity plants will start up as planned, citing the complexities in running crude to chemicals plants at this scale.

Others are more positive, saying: “2019 will be really exciting in Asia, with the Yisheng plant starting up there. The dynamics will change each time a new unit comes online,” a European producer said. “I don't think China will become an exporter, but they won't need to import,” the producer added.

If the plants do not come on in time, “China will be short,” a European trader said.

This scenario would be beneficial for Northwest European producers because they will still need to rely on Asian demand, said a trader, adding that, other than the Indorama plant, “Europe does not have so much consumption.”

However, should the Chinese plants start up on schedule, domestic Asian PX production would displace the need for imports from Europe and other parts of Asia.

Some of the Asian-origin material may head to India, while some of the European material may be soaked up by Indorama's plant.

Product from Northern Europe is not so easy to transport to the South, a Northern Europe-based producer said. “It is like two different regions. The South needs to attract product,” but freight is expensive and logistics difficult, the source added.

This means it could be “cheaper for Southern Europe to procure volumes from the Middle East than Northern Europe,” the source said.

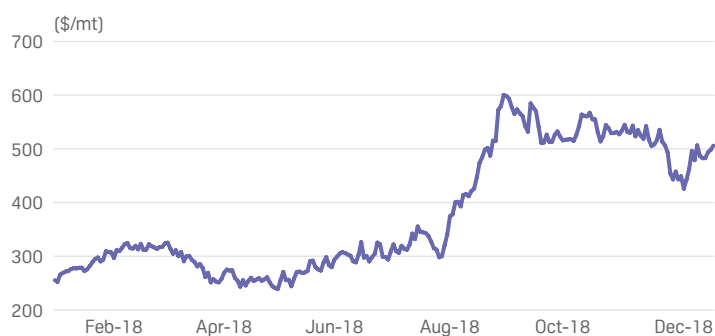
However, this will put Southern Europe, and the Indorama plant particularly, in direct competition with Asia and India for Middle Eastern supply.

ARTLANT PLANT START UP DEEPENS PX SHORT IN SOUTHERN EUROPE

| PX capacity | 2019 |
|----------------------------|------------------|
| Italy | 300,000 |
| Portugal | 140,000 |
| Spain | 100,000 |
| Total capacity | 540,000 |
| PTA capacity | 2019 |
| Italy | 109,865 |
| Portugal | 700,000 |
| Spain | 354,930 |
| Total capacity | 1,164,795 |
| Calculated total PX demand | 780,412 |
| Artlant PX demand | 469,000 |

Source: S&P Global Platts Analytics

EUROPEAN PARAXYLENE SPREAD OVER NAPHTHA EXPECTED TO REMAIN ATTRACTIVE IN H1-19



Source: S&P Global Platts

Mixed xylenes to see continued demand

The paraxylene market through Q3 and Q4 2018 has driven the mixed xylene and orthoxylene markets in Europe.

As European producers seek to maximize paraxylene production at a time of multi-year high margins, the supply of mixed xylene has been the limiting factor. Due to logistical issues on the Rhine and high import costs, there simply has not been enough mixed xylene to maximize PX production fully.

In H1 2019, many in the market see no reason why record high production margins will not continue. As a result, PX producers will continue to try to reach maximum production capacity. "MX will remain tight as long as PX runs so hard," a European producer said.

Producers integrated from feedstock naphtha through to paraxylene will fare better in 2019 and traders said there was no reason why margins of "up to \$600/mt" cannot continue.

Orthoxylene too is expected to remain "finely balanced" this year. As producers maximize PX production from MX, they are content with producing the minimum contracted OX capacities.

However, many think that if there are any hiccups in OX production in H1 2019, supply in the OX market could quickly become tight, and prices may well spike.

— [Benjamin Brooks](#)

New supply, changing trade flows to shape global methanol markets

- Additional supplies expected from Iran, Americas
- Methanol surplus tipped for China
- Global prices to remain volatile

The global methanol market begins 2019 amid general bearishness on the back of high inventory levels in Europe and Asia and in anticipation of more material hitting

international markets as new capacities in Iran come online and the recently started ones in the Americas ramp up production. Net demand growth in Asia does not seem to be sufficient to absorb all the new production, despite two new methanol-to-olefins units in China starting up and biodiesel production increasing in Malaysia and Indonesia.

It is likely that the trade patterns will continue shifting this year, as US sanctions on Iran will push Iranian product to China and India and, especially, if the US and China continue to escalate trade tensions and choose to hike duties on each other's products.

Climate change and the resulting abnormal weather will probably continue throwing a spanner in the works, and persisting logistical issues on the Rhine is only one example of how it could manifest itself.

Sanctions to channel Iranian molecules to China, India

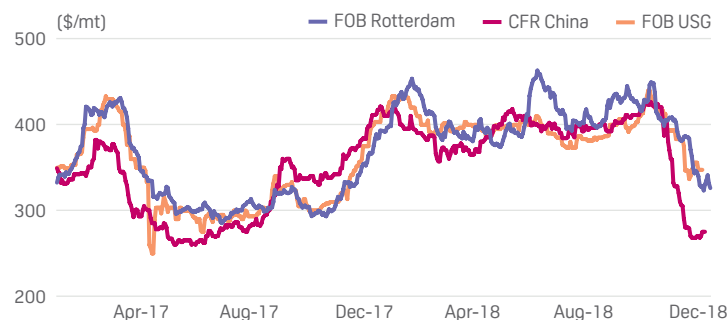
Iran is expected to launch this year two new methanol plants, Bushehr Petrochemical Plant and Kaveh Methanol Complex, which together will add just under 4 million mt/year of new capacity. There could also be more material coming from the Marjan plant which started in September and has the capacity to produce 1.65 million mt/year of methanol. So far operating at 70%, Marjan has been producing around 90,000 mt/month.

Despite the expected increase in production, there is no forecast of major growth in downstream markets within the country, where most downstream demand is generated by the formaldehyde market. Instead, exports are expected to remain the key focus for Iranian producers.

Southeast Asia, South Korea, Taiwan, as well as European countries have strong geopolitical ties with the US and the reimposition of US sanctions on Iran on November 4 makes it more likely that Iran will continue targeting China and India as key outlets.

Iran already accounts for about 30% of total methanol imports into China and it is poised to increase its market share this year.

GLOBAL SPOT METHANOL PRICES DECLINE IN Q4-18 AFTER HITTING MULTI-MONTH HIGH



Source: S&P Global Platts

Asian demand growth unlikely to offset new supplies

China's demand however is unlikely to rise drastically this year, as only two new MTOs, Connell Chemical's 300,000 mt/year plant in Jilin and 600,000 mt/year Nanjing Chengzhi Yongqing Energy Technology's plant, are slated for a start-up in 2019, adding around 2.7 million mt/year of methanol demand if they operate at full capacity.

It was previously estimated that two more MTO plants might come onstream this year, with a total demand of around 2.4 million mt of methanol, however there has been no confirmation whether these projects are still on track.

Separately, Jiutai Energy's 600,000 mt/year olefins plant is also earmarked for launch this year, however its start-up will not change the methanol balance as it is self-sufficient and uses coal as a feedstock.

China has become less dependent on imported methanol after building up domestic production capacity, a trend which is expected to continue into 2019. Hengli Petrochemical is starting up its 20 million mt/year greenfield refinery in Dalian, China, and the plant has the capacity to produce 500,000 mt/year of methanol from January.

China's methanol imports have been shrinking steadily over the past three years, and January–September 2018 imports were down 12.4% year on year to 5.47 million mt, latest China Customs data showed.

Some demand growth is projected in the Southeast Asia where Indonesia has increased its mandates for blending biodiesel to 20% and Malaysia is set to phase in a 10% biodiesel target (B10) replacing the current B7 mandate in February. Cumulatively these two measures should ramp up consumption of methanol by around 300,000 mt/year.

As a result, the net growth in Asian demand will likely be insufficient to absorb additional Iranian production should both methanol and downstream plants run at full rates.

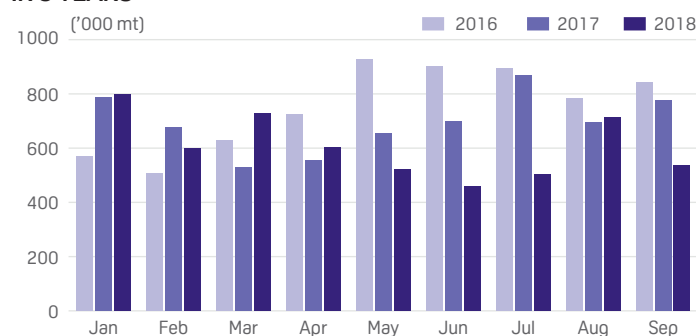
More production in Western hemisphere

Some additional supplies will be coming out of Americas too this year as Natgasoline and Methanex ramp up production at their sites in Texas and Chile. The 1.75 million mt/year Natgasoline plant in Beaumont, Texas, is now producing at full rates after a commercial start-up in June last year.

Methanex restarted its previously idled 800,000 mt/year Chile IV methanol plant in Cabo Negro in October. The plant had been idle since 2007 following difficulties securing natural gas supplies, but the company has now managed to secure supplies from Argentina following a move by the government in which permits were granted for the export of gas.

The fresh supply is expected to support a two-plant operation during the southern hemisphere's summer months, with the Chile I plant due to undergo refurbishment.

YEAR-TO-DATE METHANOL IMPORTS TO CHINA AT THEIR LOWEST IN 3 YEARS



Source: Chinese Customs

Chile I currently has a capacity of 900,000 mt/year, but Methanex plans to spend \$50 million on revamping the plant and adding 800,000 mt to its current capacity.

It was previously expected that Yuhuang Chemical's plant 1.7 million mt plant in St. James and Big Lake Fuels' 1.4 million mt plant in Lake Charles, both in Louisiana, would be completed this year, adding further length. While there is no update on the latter plant, the former said that St. James's plant completion will be pushed back to mid-2020.

Despite the question marks over further drivers for global demand growth, American companies appear to be pushing ahead with their projects and are announcing new ones, probably banking on new applications, such as the use of methanol in industrial boilers.

Nauticol Energy proposed in October to build a 3 million mt/year methanol plant in Grand Prairie, Alberta, Canada capitalizing on the region's abundant natural gas resources and eyeing Asia as the main outlet.

Also in October, Methanex said it was carrying out front-end engineering and design work on its potential Geismar 3 production facility in Geismar, Louisiana, with the final investment decision expected in the middle of 2019. The plant would be adjacent to the existing Geismar 1 and Geismar 2 facilities, which each have capacities of 1 million mt/year. Methanex did not disclose the planned capacity of Geismar 3, but said that the combined site would be capable of producing about 3.8 million mt/year, part of it coming from the currently undertaken debottlenecking at the existing lines.

Trade restrictions, new capacities to crystallize trade flows

As a result of the growing production in the US, more product is expected to flow out of the US, into Japan, South Korea and Europe, as trade tensions between the US and China and concern over a potential hike in duties will deter the flow into China.

Methanol demand in Japan will be stable at about 1.7 million mt/year, but Japanese trade sources see an

additional 40,000-50,000 mt/month of US methanol cargoes heading to Chiba and Hirohata.

South Korean demand, estimated at 1.8 million mt last year, is forecast to increase this year on the back of healthy MTBE production, Korean sources said. Some 40% of South Korea's imported volume comes from the US at the moment. This proportion is expected to increase to 60-70% this year, partly as a consequence of the US-China trade war. South Korea sources said that the country will also buy more methanol from Trinidad & Tobago as well as Venezuela and less from the Middle East.

"Middle East producers charge Korean buyers \$15-20/mt in deviation costs from China to South Korea, when it should be just \$5-10/mt," a South Korean trader said.

EU imports from the US grew from less than 1,000 mt at the beginning of last year to around 35,532 mt in October, according to the Eurostat data, and the trend is likely to continue. Total EU methanol imports over January to October last year have averaged at around 591,000 mt/month, up 8.4% year on year.

Additionally more supply will be coming to Europe from Trinidad & Tobago, which already accounts for just under a quarter of the EU's methanol imports. This year Proman, one of the world's largest methanol producers, expects better methanol production rates at its Trinidad & Tobago site following its investments in securing gas supplies.

Logistics can continue fragmenting Europe

With this year's demand growth in Europe projected in line with GDP and with only one new capacity expansion earmarked for the region — BioMCN's doubling of its capacity in Delfzijl in the Netherlands to 438,000 mt/year — Europe will likely continue tracking global markets.

However within the region itself there is a risk of recurring fragmentation, as logistical issues will continue creating intra-regional imbalances. During the fourth quarter critically low water levels on the River Rhine prevented shipments of full loads on barges, which slowed down the outflow of methanol from storage in Rotterdam, creating shortages inland and overhang in the coastal locations.

With heavy and lower-than-usual precipitation alike detrimental to the shipments along the Rhine, logistical challenges are expected to persist at least until spring, sources said.

"Inventory levels in Rotterdam are increasing, forcing market players to get rid of volumes, which combined with the usual end of the year destocking, will add further pressure on prices," one source said in December.

Furthermore availability of truck shipments is also coming into question, with many anticipating an increase in inland freight costs on the back of driver shortage in Germany.

Price volatility

While global fundamentals seem to paint a generally bearish picture, they are not necessarily going to manifest themselves in lower prices as capacity expansions do not automatically lead to higher production. What remains a constant from the past few years is that global markets will likely remain volatile.

During the second half of 2018, the European methanol spot price dipped from around Eur380-390/mt FOB Rotterdam in June, before declining to low-Eur280s/mt at the start of December, Platts data showed. Meanwhile, the European contract price had been on a continuous rise for the past year, settling at Eur428/mt for Q4, the highest level since 2014, but settling at a first decrease in over a year for the first quarter of 2019. The Q1 contract price has been agreed at Eur350/mt, down Eur78/mt.

"Oil price volatility put a dampener on expectations moving into Q1. Probably we will see a softening of prices," one market participant said in early December, before Equinor's 900,000 mt/year methanol unit in Tjeldbergodden, Norway, shut down after a fire. It remains unclear how long the plant would be out of operation, but according to Equinor's statement on December 20, the company was not going to be able to meet its planned deliveries.

In Asia, spot CFR was also on a rising trend through most of the second half of last year before a sharp slide throughout the tail end, with prices dropping from \$420s/mt at the end of October to around \$270/mt in December.

In the US, the volatility in the spot market was stark in Q4 too, with front-month values reaching both the highest level in more than four years and the lowest level of the year within a six-week span. A run-up in prices culminated on October 16, when front-month pricing reached 132 cents/gal (\$439.56/mt) FOB USG, on an unconfirmed production outage in Trinidad & Tobago, unconfirmed production cutbacks in New Zealand and a delayed cargo destined for Europe.

Less than two months later, front-month prices had dropped to the lowest level of the year, falling to 104 cents/gal FOB USG on November 27. Prices had been on a downward slide for nearly six weeks, with the downtick in values attributed to ripples from sustained weakness in global, particularly Asian, spot markets.

— [*Esther Ng, Lara Berton, Ellie Valencia and Maria Tsay*](#)

How will European MTBE find its footing?

- **MTBE factor seen in high 1.10s to below 1.20**
- **Availability improves following Rhine-related tightness**
- **Demand underpinned by India, Latin America buying, WAF blending**

The European MTBE market balance is expected to remain long in 2019, a dynamic similar to previous years, market sources said, pegging the MTBE factor in the high 1.10s to just below 1.20 in the first half of the year. Sources also anticipate prices gaining strength towards summer driving season, as historically. However, some uncertainties exist going into the start of the year due to tightness arising from the severely low Rhine water level issues seen in Q4.

Supply environment healthy

Market sources said they expect the supply environment to remain healthy this coming year, in line with the well-supplied nature of the industry. There are also no plan turnarounds expected.

“There is typically plenty of MTBE available in the European market and, if not, imports are coming from Latin America and the Persian Gulf,” said a blender.

A source also noted that the supply situation may see more competition from Russian MTBE, should domestic demand within Russia be low. Russian petrochemical maker Sibur’s

flagship project ZapSibNeftekhim, which can produce 240,000 mt/year of products including MTBE, butadiene, 1-butene, and pyrolysis gasoline, will potentially start up in early 2019, Platts reported earlier.

This could lead to more MTBE flowing to Europe from the Baltic and Black Sea in Europe according to a trader, who added that this volume is likely to be blended within the Amsterdam-Rotterdam-Antwerp trading hub, with the majority for sale to West Africa and Mexico. Alternatively, due to more availability of MTBE in Russia, there could be more finished product gasoline produced, finding its way into Europe, which would displace domestic MTBE demand, said the trader.

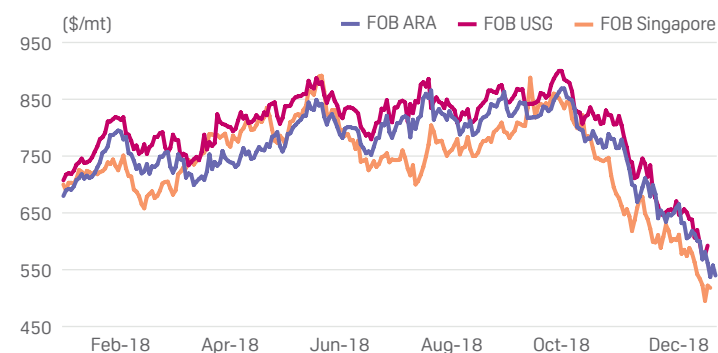
Market sources also noted that the 2018 fourth quarter tightness in MTBE caused by the historically low Rhine water levels was not expected to carry on in 2019 beyond the initial months.

Demand to lean on gasoline blending

The demand picture in MTBE is also expected to be similar to 2018, with gasoline blending as a key driver.

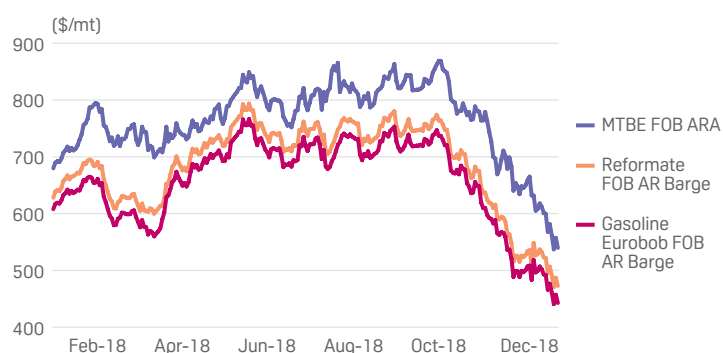
Gasoline demand is expected to be healthy in 2019. The recent diesel scandal has increased the demand for gasoline-based cars, which still comprise around two-thirds of the global fleet. Even current trends of using hybrid cars also support gasoline demand as they use both gasoline and batteries.

GLOBAL PRICES FOR MTBE TREND LOWER TOWARDS WINTER



Source: S&P Global Platts

LOWER REFORMATE PRICING PUTS PRESURE ON MTBE



Source: S&P Global Platts

Looking into the first half, blenders are expected to sell off their winter-specification gasoline stock early on, over January to February to prepare for the traditionally busy summer period, which requires summer-spec gasoline. February to March is the period when refineries and blenders typically starting blending summer grade gasoline, a richer octane sort, with MTBE being a preferred component due to the high octane stock and suitable Reid Vapor Pressure or RVP.

However, not all sources agreed with this view. A trader felt that export demand for MTBE could rise. “EU MTBE may head to the US for blending, before going to Mexico, Venezuela and Chile,” he said. The MTBE FOB ARA price has typically been weaker than FOB USG, according to Platts data. Market sources said however, that while there may be significant price spreads between regions, arbitrage flows are still dependent on freight economics, and also the transportation time between regions, which could create pricing risk.

Another wild card could be West African gasoline demand. The imminent elections in Nigeria could lead to increased demand for finished gasoline — to avoid the political risk of higher prices on the ground. Sources noted that this could lead to planning for adequate stocks. However, “WAF probably bought too much [finished] gasoline so far,” one trader said in early December.

Finished gasoline is typically blended in the ARA region before shipping to West Africa. “Gasoline for Nigeria is blended in Europe, which is of an oxy-specification, which means a high octane booster is needed,” a blender said.

Another demand source for MTBE is the downstream chemicals market, which includes methyl methacrylate monomer, or MMA. A source noted that MTBE usage for MMA production is expected to be limited in the first half, which is unlikely to create additional demand for MTBE.

Outside of Europe, external demand for European MTBE is unlikely to change much despite demand growth in a few regions. Latin America and India are expected to see demand growth, although this is not expected to spill over into Europe. A trader said that demand from Mexico and Chile would be probably covered by MTBE coming from the US Gulf, while India is expected to be covered by Arab Gulf and Singapore.

China’s use of MTBE is expected to rise due to new mandates and gasoline specification changes. A new gasoline specification will be introduced in China in 2019,

with better tariffs on high octane components and a tax on mixed aromatics used for blending, according to sources. An earlier tax regime rolled out in March 2018 meant that any products used for gasoline blending would in theory be subject to a consumption tax. The tax, which was already in place for MTBE, means that it may become more competitive relative to blendstocks such as mixed aromatics, light cycle oil, isomer-grade mixed xylene and solvent-grade mixed xylene.

However, new capacity coming online in Asia in 2019, is expected to soak up the increased requirements. Taiwan’s Formosa Petrochemical Corp. is expected to start its latest 330,000 mt/year methyl tert-butyl ether plant in Mailiao in Yunlin County by the second quarter of 2019, while ZIBO China, a Chinese chemicals producer, will build a 500,000mt/year new MTBE capacity in China in 2019, according to a trader. Furthermore, any opportunity for European volumes will see it face competition from Middle Eastern MTBE production, which enjoys a freight advantage while heading east.

— [*Stergios Zacharakis*](#)

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