Indonesia reaps the benefits from a volatile stainless market

Nickel price volatility has been 'pretty intense' over the last couple of months and that will not change in the foreseeable future, according to market analyst Jim Lennon. He expects the LME cash price to be around US\$ 16 000 per tonne next year, up significantly from the US\$ 13 800 price forecast for 2018.

> Output for the world stainless steel sector increased more than 6.5% last year but that growth rate shows 'signs of peaking', Lennon told the Bureau of International Recycling's convention in London. The Macquarie Group analyst said growth was predicted to be around 3.5% this year and 2.5% in 2019. The encouraging news was that nickel use in batteries, mainly in electric vehicle applications, was growing at 30-40% per annum – but 'from a low base'. Regarding global stainless steel production, Lennon projected that the use of nickel scrap will increase from 904 000 tonnes in 2017 to 945 000 tonnes this year and perhaps 983 000 tonnes in 2019.

THE RISE OF INDONESIA

'Overall, global industrial production of stainless steel is now slowing. There is huge growth in China and Indonesia but prices in these countries are being forced lower by overproduction,' Lennon told delegates, with Chinese mills facing the onslaught of low-cost Indonesian stainless steel. 'And now Taiwan is feeling the heat,' he added, explaining that 48% of Indonesia's material had been diverted from China to Taiwan this summer. Indonesia has emerged as a powerful player in the nickel and stainless steel markets. It has been 'a very large contributor' to stainless steel production growth over the last 12 months, thanks mostly to the China-based Tsingshan company. Tsingshan added upwards of two million tonnes of annual stainless melt capacity in Indonesia last year and will add another one million tonnes during the second half of 2018. Historically, more than 80% of its exports had been shipped to China but Taiwan was now becoming the leading importer. Indonesia is believed to account for a quarter of global nickel supply in 2018.

STILL IN DEFICIT

New figures released by the International Nickel Study Group indicate that world usage of the metal will reach 2.422 million tonnes next year, exceeding global production of 2.389 million tonnes.

Lennon said recent price correction for nickel 'reflects trade war uncertainties between the US and China', adding it was difficult to follow stock changes because half of the inventory was stored in cheaper non-LME warehouses, particularly in Europe, and that sector was growing.

WATCH OUT?

Lennon said the current 'protectionist phase' sparked by trade barriers put in place by US president Trump made it difficult for analysts to accurately forecast future developments. The international trade was leading to inaction, Lennon added, and recyclers and traders were adopting a wait-andsee attitude: 'Which means they are mostly waiting to see how bad it will turn out.' Meanwhile, European prices were under pressure from Asian exports diverted from the US to Europe ahead of the EU's own 'safeguarding tariffs' kicking in. On the bright side, US stainless mills were able to maintain a high scrap melt ratio, said Omar Al Sharif of UAEbased Sharif Metals International. US stainless mills appeared confident of sourcing material as required 'at continued historically high discounts applied to nickel values', he added.



Non-ferrous market may recover if 'blunt' tariff axe is put away

Aluminium prices are predicted to be between US\$ 1 910 and US\$ 2 380 per tonne next year while copper will be around US\$ 5 600-7 200 per tonne - but only if the global trade war sees some kind of truce, Edward Meier told the non-ferrous division gathering of the Bureau of International Recycling (BIR).

'Many metals are not perceived as tight as earlier in the year,' the Commodity Research Group analyst told delegates in London, noting that interest rates in key recycling markets, notably the US, were being raised 'aggressively'.

SHUFFLE IN EXPORTS

Meier said China's trade was now at 18% of GDP, down from 35% back in 2006. Chinese exports to the US will exceed US\$ 500 billion this year, while it imports materials and products from the US worth around US\$ 130 billion. China imported 2.17 million tonnes of aluminium scrap in 2017. During the months April, May and June this year, figures show a decline of 40% over the same period last year (averaging 115 000 tonnes per month). Mexico, on the other hand, saw record imports of aluminium from the US, said Alejandro Jaramillo of Glorem SC. 'US exports to Mexico are running about 20% higher than last year,' he reported. Demand for Mexican copper and brass scrap is also 'robust' now that Chinese buyers are eager to find a tariff-free replacement market.

'A BLUNT INSTRUMENT'

'Politics are getting increasingly polarised,' Meier said, hinting at the tense relationship between the US and China since president Trump issued a 10% import tariff on non-ferrous metals. 'Based on the persisting toxic climate, the trade war isn't going away. Although it's clear to see that tariffs are a very blunt instrument.' As Meier put it, China 'has bullets to hit back with': it can raise export taxes, slow down customs clearances, conduct more inspections, reduce foreign investments, or even cut back on its purchase of US debt. 'Tariffs will undoubtedly create more problems than they will solve,' Meier declared.

CLOSE TO THE FIRE?

Meanwhile, Indian exporters have been 'hit hard' by the devaluation of the rupee, Dhawal Shah of Metco Marketing told BIR. He was glad the 'frenzy' of material diverted from China to India was largely over and said the Indian metals market had turned out to be 'resilient'. Shah added that metal demand was 'stable', growing around 10% every year thanks to the top-performing automotive sector.

Currently, the worldwide recycling industry is 'extremely unpredictable', concluded Michael Lion of Chinabased Everwell Resources. This was largely because 'there is too much scrap in the wrong places'. Lion's answer on how to deal with troublemakers is simple: 'Let's hold their feet to the fire'.

TALKS OF FULL-ON BAN

BIR's non-ferrous division president David Chiao believed it was 'very likely' that China would close its doors to non-ferrous scrap imports by the end of 2020. He warned delegates that the global metals sector had to brace itself for 'a perfect storm'. This also applied to China's domestic recycling market, Chiao said, as unemployment will go up, import volumes will be reduced and scrap prices will rise 'sharply'. Closures of smaller recycling enterprises down the line are inevitable, he added.



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AUTHOR Kirstin Linnenkoper

CONFERENCE REPORT

Billions of green bonds may benefit plastics recycling sector

'The production of plastics is growing so much that we could be producing 1 100 million tonnes by 2050,' was the view of plastics recycling expert Surendra Borad Patawari at the Bureau of International Recycling (BIR) conference in London. 'It seems we simply cannot live without plastics,' he said.

Today, almost 300 million tonnes of plastic is manufactured globally every year and only an estimated 20% is recycled through proper channels. But there is 'an enormous amount of funds' available for investment in plastics recycling, Patawari told delegates.

SURGE IN 'GREEN BONDS'

'Five trillion dollars will be divested from oil and coal-based industries this year,' the ceo of Gemini Corporation pointed out. Green products and services, on the other hand, are on the rise. 'US\$ 250 billion (EUR 220 billion) will be invested in 'green' bonds being issued this year. That's around 40% higher than in 2017,' the entrepreneur noted.

CONSTANT DEVELOPMENT

Patawari cited a recent article published by McKinsey & Company stating that the volume of plastics recycling is likely to increase from 55 million tonnes per annum to 230 million tonnes in the next 12 years. This momentum is backed by the 'constant development' of innovative recycling systems, he said. As an example, it costs less than US\$ 100 000 (EUR 88 000) to establish a sorting line with a capacity of 1 200 tonnes per month.

PARTING WORDS

Borad Patawari shared with delegates that the London gathering was to be the last time he would serve as chairman of BIR's plastics division. During his 12 years as chairman, he said, he had seen commitment and 'bold steps' from recycling entrepreneurs across the world. As to the future, Patawari hoped that administrative burdens over exports would be reduced 'as much as possible' to ensure a free flow of goods. 'First it was China that placed restrictions on imports of plastic scrap. That was followed by Malaysia, Thailand, Vietnam and Taiwan. Now, India is being added to the list, primarily because import licences have not yet been extended

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and they expire in November.' The outgoing chairman remained optimistic that the licences would be renewed in November. Traditionally, India purchases roughly 200 000 tonnes of plastic scrap – mostly LDPE. Luckily, he said, imports of PET flakes are 'not hampered' as they do not require licences.

MALAYSIA STRIKES BACK

Reuters data suggests that annual imports of plastic scrap into Malaysia reached almost 500 000 tonnes in 2017 – up from 288 000 tonnes the previous year. It was recently reported that some material sent 'for recycling' had actually ended up in Malaysian landfills. Until August this year, the UK exported over 88 000 tonnes of plastic scrap to Malaysia, representing more than a quarter of the UK's total plastic scrap exports. Malaysia also received an estimated 150 000 tonnes of material from the US during the first six months of the year. Researchers and journalists collaborating for Greenpeace's 'Unearthed' project reported they found multiple sites where UK household plastics bundled for recycling were being stored outdoors in tropical conditions, thus rendering them largely unrecyclable. Malaysia's environment minister Yeo Bee Yin has pledged to tackle the matter swiftly and announced on 16 October that the government had frozen the issuing of new licences to establish plastic waste recycling factories in Malaysia. He has also banned the import of such materials 'to ensure existing illegal factories do not continue their operations'.

Another big leap for e-scrap – will recyclers catch up?

E-scrap in India is expected to grow at an annual rate of 10% from 2017 to 2020, according to Surendra Borad Patawari of Gemini Corp in Belgium. But will recyclers be able to process this largely untapped pool of materials in a market still thwarted by dumping, scavenging and high compliance costs?

> Mumbai ranks first in the top five of India's big cities that generate over 60% of the country's annual e-scrap waste flow. Other major contributors are Delhi, Bengaluru, Chennai and Kolkata. Televisions and computer monitors make up roughly 70% of all e-scrap in India. The Associated Chambers of Commerce of India believes that the demand of domestic electronic products will reach US\$ 400 billion in the next two years.

BIG BUSINESS IN INDIA

This year alone, the country is thought to generate 3 million tonnes of e-scrap, Patawari noted at the London assembly. He stressed that India's economy is 'one of the strongest' at the moment, growing 8.2% in the first quarter of this year.

E-SCRAP VOLUME RISING STEADILY

The international e-scrap market is anticipated to expand 5.6% by volume during the 2016-2026 period, new data by Transparancy Market Research reveals. For example, the used printed circuit boards niche will exceed 3 million tonnes by 2026, up 7.3% from roughly 1.50 million tonnes processed in 2016.



The International Monetary Fund has even projected that India will become the world's fastest growing economy with a 7.3% increase in gross domestic product in the new financial year. Patawari observed that this could mean 'big business' for India's slowly maturing electronics recycling market.

TO COMPLY OR NOT...

Recyclers of cooling & freezing equipment as well as cathode ray tubes could potentially cut costs by at least 20% if they do not meet all quality and service requirements, reported Federico Magalini, managing director of Sofies UK. This includes opting out of doing audits, not reporting results to authorities and not conducting waste characterisation.

Proper processing of a cathode ray tube screen are put at EUR 282, per tonne; EUR 226 for small household appliances; and EUR 201 for cooling & freezing units. 'Ultimately, the effect of avoided compliance costs is much larger than margins,' the Magalini urged.

SCAVENGING LOSSES

Citing an in-depth market study by the European Electronics Recycling Association (EERA), he added that the 13 EERA affiliated e-scrap recyclers earned EUR 170 million less than they should have in 2016 because of an 'alarming' materials scavenging problem.

Especially the cooling & freezing sector is hit hard by scavenging, with product scavenging averaging 48% in 2016. In 22% of cases, the compressors (worth EUR 14 million) were scavenged. Roughly EUR 28 million worth of circuit boards were scavenged in Europe that year.

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CONFERENCE REPORT

US ferrous scrap exports to Turkey grow amid market tensions



The volume of US material among all Turkish ferrous scrap imports was 20.3% in August, up from the average of 17.6% seen in the first half of the year. 'Movements show that US scrap market prices remain largely dependent on Turkey,' says Fastmarkets metals analyst Lee Allen.

America's high-consumption scrap markets still rely on exports (almost 18%) and US President Trump's widely discussed Section 232 tariff measures have done little to change that, Allen told delegates at the London gathering of the Bureau of International Recycling (BIR). Despite political and economic pressure with the lira losing nearly 40% of its value in 2018, Turkey's reliance on US scrap imports has gradually increased over the last couple of months.

critical factor in today's ferrous scrap market,' Lee said. The UK, however, had reacted 'most violently' to the Turkish downturn, with scrap exporters trying to diversify their customer base. On the whole, Lee expects tighter collection rates and the EU's safeguarding tariff to raise scrap prices at the start of 2019. 'US export prices, although up,

VIOLENT REACTIONS

dence between the US and Turkey is a

'Indeed, the strong mutual depen-

appear to be levelling and should provide some comfort in the short term', remarked George Adams of SA Recycling. He believes domestic demand and decreased supplies could push up domestic scrap prices this



month. 'Demand remains strong as the mill capacity utilisation rate hovers in the 80% range and many electric arc furnace mills are running closer to 90%,' Adams stated.

CHINA USES 41% MORE SCRAP

Meanwhile, Turkey's overseas steel scrap purchases surged by more than 15% to 10.771 million tonnes in the first six months of this year, reported Rolf Willeke, statistics advisor of BIR's ferrous division. This performance reinforced its position as the world's leading importer of steel. The EU-28 remains the biggest steel scrap exporter, Willeke added, and outbound shipments in the first half of 2018 rose by 7% to 10.714 million tonnes. There was also a surge of 41% in steel scrap used for crude steel production in China during the first half of 2018 (*not a surge of 105% as was previously reported). The total stood at 87.7 million tonnes produced, compared to 62.2 million tonnes during the same period last year. 🛽 🛽



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Will Bulgaria's textiles levy jeopardise European recycling?

The Bulgarian Government has drafted legislation for a levy on all used clothing put on the market in Bulgaria. The levy is being proposed under the auspices of an extended producer responsibility (EPR) scheme for clothing.

> The Bulgarian Association of Recyclers Textiles and Second Hand Clothing (ARTSHC) has two concerns: whether the levy will be placed on new clothing as well and whether the funds raised will help finance the collection of used clothing and textiles in the country.

A LEVY OR A TAX?

If the latter is not the case, then it is argued this is simply a tax on used clothing in Bulgaria. Such a measure would directly contravene EU free trade regulations, which prevent individual member states from taking action to disrupt or distort the trade of products. The association is also concerned that if such a law is introduced and the Government is not required to reverse the move, then other Eastern European countries might consider introducing similar levies. 'If this were to happen, this could significantly disrupt the used clothing markets,' ARTSHC says.

PREVENTING BURNING OF TEXTILES

Ministry officials have stated that the intention of the changes is to implement 2018 revisions to the EU Waste Framework Directive. They say the EPR fees are justified in order to prevent the burning of waste textiles within Bulgaria as well as reducing imports of second hand clothing.

UNINTENDED CONSEQUENCES

Even so, ARTSHC is sceptical such a levy would lead to the intended outcome and fears 'unintended consequences' for recyclers. In the worstcase scenario, it could result in the closure of Bulgarian sorting companies with this additional direct cost on their businesses. 'This will also jeopardise other textiles industries across Europe that export second hand clothing to Bulgaria,' the association argues. Nor would collection systems and collectors across the EU achieve the value of the textiles they collect. 'These adverse effects will undermine the general credibility of EPR, and in particular the use of EPR for the Circular Economy,' according to ARTSHC. 👩



WILL THE RETAIL INNOVATORS PLEASE STAND UP?

How can the UK's fashion industry – that is worth £28 billion (US\$ 36 billion) a year to the UK economy – effectively reduce its environmental footprint? That's what Labour MP Mary Creagh has asked the nation's 10 leading retailers.

'The way we design, produce and discard our clothes has a huge impact on our planet. We want to hear what they are doing to make their industry more sustainable,' states Craegh, who is Chair of the Environmental Audit Committee.

Consumption of new clothing is higher in the UK than any other European country – 26.7kg per capita, she urges. This compares to a consumption rate of 16.7kg (Germany), 16kg (Denmark), 14.5kg (Italy), 14kg (Netherlands) and 12.6kg (Sweden). Meanwhile, clothing production has almost doubled in the last 15 years.

Creagh has pinpointed six major themes for the retailers to address. These include whether they use recycled materials; how long clothes are kept and how they encourage recycling; whether they incinerate unsold or returned stock; as well as what steps they are taking to reduce the risk of microplastics contaminating the ocean.

CONFERENCE REPORT

Hazardous or not? Rubber recyclers fight media claims

The American market for rubber infill has fallen nearly 30% in recent years because of negative media reports about potential safety concerns, it is claimed. But, according to Robin Wiener, president of the Institute of Scrap Recycling Industries, 'no safety risks existed' and that had been proven by more than 100 independent

Despite this research and passionate and continuous efforts from the sector to promote rubber infill, the use of recycled rubber has slumped severely across the United States following media concern. The benefits of recycled rubber were well-known, Wiener told the London convention of the Bureau of International Recycling (BIR). And yet, decision makers were 'letting emotions take over' and not looking at scientific facts.

studies.

MORE STUDIES TO FOLLOW

Wiener pointed out that a multi-agency study in the US into potential risks was due to be made public next month. She emphasised the importance of presenting the conclusions in 'plain language' to help convince the public of the true properties of recycled rubber.



On a positive note, Wiener said the US Congress was currently discussing an infrastructure reform. She had therefore joined forces with other recycling stakeholders to 'push for incentives' for rubber asphalt.

FEWER OUTLETS AVAILABLE

Fazilet Cinaralp, secretary-general of the European Tyre & Rubber Manufacturers' Association reported that around 75% of Europe's end-oflife tyres – equivalent to more than 1.4 million tonnes per year - served the vast granulation market. Citing last available data (2016), she pointed out that 48% (2 million tonnes) of discarded tyres in the EU serve material recovery. Another 28% (1.1 million tonnes) serve energy recovery, with 10% being reused or exported, and around 7% and 6% being retreaded or landfilled. In the US, the lion's share (41%) of used tyres served energy recovery in 2017. Approximately 24% benefitted the granulation market, while 8% were

used in civil engineering projects, and 15% of tyres got landfilled.

CHANGES IN END-OF-USE

Sadly, end-use applications 'remained a challenge', Cinaralp stated. She told the assembly that 'many outlets for rubber infill have closed' and a growing number of municipalities were declining to use the material. Even successful markets like sports and playground surfaces saw a decrease in recycled rubber use from 48% and 20% in 2010 to 37% and 17% last year. The same trend is being observed for rubberised asphalt; this market used almost 7% of recycled rubber in 2010, which dipped to just 2% in 2017. Cinaralp added that the European Chemicals Agency was investigating the possible health and environmental impacts of substances contained in the granules and mulches derived from end-of-life tyres. This research is expected to be published in 2019 and could lead to restrictions on more substances in waste tyres.