

Methodology and price specifications – April 2023



Mission statement

Fastmarkets Metals and Mining is the leading global provider of pricing intelligence for the non-ferrous metal, steel, steelmaking raw materials, industrial minerals, ferrous and non-ferrous scrap markets, producing price assessments with Fastmarkets MB and Fastmarkets AMM since 1913 and 1882 respectively. Fastmarkets Forest Products meanwhile is the leading global provider of pricing intelligence for the global forest products industry, incorporating Fastmarkets RISI, Fastmarkets FOEX and Random Lengths.

Our mission is to meet the market's data requirements honestly and independently, acting with integrity and care to ensure that the trust and confidence placed in the reliability of our pricing methodologies is maintained. We do not have a vested interest in the markets on which we report.

Introduction

Fastmarkets' reporters are required to abide by a <u>code</u> <u>of conduct</u> and clear pricing procedures during their market reporting and pricing activities. Fastmarkets is completely independent and has no vested commercial interest in any of the markets it prices.

We are the world's largest dedicated price reporting teams for both metals and forest products. We have offices in London, New York, Boston, San Francisco, Eugene, Charlottesville, Atlanta, Pittsburgh, Beijing, Shanghai, Hong Kong, Singapore, Melbourne, Sao Paolo, Mumbai, Brussels, Helsinki, Dnipro and Istanbul. The aim of this document is to provide a clear overview of Fastmarkets' methodology and specifications for the prices it assesses. If you have any questions, please contact Fastmarkets Editorial Director Perrine Faye at perrine.faye@fastmarkets.com for metals, or Fastmarkets Forest Products' Senior VP of Indices, Matt Graves, at mgraves@fastmarkets.com for forest products.



Methodology and price specifications

Methodology rationale

Fastmarkets AMM's rationale to adopt and develop the price discovery process and methodology to produce Midwest Ferrous Scrap Indices to provide fair, consistent and transparent representations of the US Midwest Scrap markets for the trading periods covered.

The structure of the Midwest scrap market means that the large majority of the business is conducted in the first 10 days of the month. The trading period, or time window, during which data is collected from the 1st working day up to the 10th of the month. Fastmarkets AMM publishes the scrap indexes on the 10th of each month, unless that falls on a weekend or public holiday, in which case the Index is published on the following working day.

The Fastmarkets AMM US Midwest Scrap Indexes include material that will be delivered within 30 days to the mill. Spot business concluded after the 10th of the month will not be included. Any material that is delivered as part of a long-term contract is excluded from the calculation process.

Specifications and reference units

Fastmarkets AMM publishes three US Midwest Ferrous Scrap indices

- No1 heavy melting scrap
- No1 busheling
- Shredded

For each index, Fastmarkets AMM has defined clear specifications that detail the material's characteristics or quality, location, delivery and payment terms and the minimum volume accepted. These specifications have been determined in consultation with market participants and following industry convention. Currency and volume units are in line with recognized US Midwest scrap market trading conventions.

What happens if the material is downgraded on delivery?

The transaction is done on the expected delivery specifications, including grade and payment terms, and the price settled on this basis. If it turns out to be

different, then that is an issue between the two parties who entered the contract, and the index is not revised retroactively.

Payment terms

The basis of the payment terms is based on typical commercial practice in the US Midwest scrap market. Transactions that are conducted on different payment or credit terms will be adjusted back to the base specifications, taking into account discounts and standard commercial terms

Index calculation

The index methodology is a tonnage-weighted calculation of transactional data which are reported to Fastmarkets AMM by market participants conducting trades on a delivered Midwest mill basis.

Each index consists of two sub-indices, one for the sell side and one for the buy side of the market, based on information received from sellers and buyers of scrap. The two sub-indices are each based on a tonnage-weighted average of normalized trade information received by Fastmarkets AMM reporters.

The two sub-indices are then combined with equal weighting to ensure that the market is fairly represented across all participants.

All the input data that vary by more than 10% from the average of the two sub-indexes are excluded and the index is recalculated.

The publish index figure is the straight average of the two sub-indices.

Why is the index calculation divided into buyers and sellers?

The Fastmarkets AMM methodology is designed specifically to balance out any bias in the market to create the most representative and objective price. The index is split into the two groups of buyers and sellers to balance a number of factors, including tonnage bias, where more transactions are reported by one side or the other. In this case, if more tonnage is reported on one side, it will contribute to the accuracy of the sub-index, but it does not over influence the final index calculation. By splitting the calculation into two, influence from potential selective reporting of data is also reduced.

Data quality and verification

Where transaction data submitted appears out of



line or anomalous, participants may be asked to provide evidence of the transaction in the form of a signed contract. Participants will have the right to decline to provide this evidence and Fastmarkets AMM will have the right to exclude prices that cannot be substantiated.

The number of trades available for use in the indexes does vary depending on the market conditions prevailing. The index calculation methodology does not set any minimum number, or threshold, of transactions to be gathered on which to base the index.

Data is submitted prevalently by phone and e-mail survey. All data received is kept confidential.

Data collection criteria

Fastmarkets AMM aims to collect as much data from the greatest number of counterparties as possible each month in its attempt to represent the majority of the market.

The more data collected, the larger the proportion of the market that is represented and the more statistically significant the final figure will be. Fastmarkets AMM is constantly looking to expand its contact list in order to provide the market with a reliable and representative index price.

All market participants who are conducting business on a delivered Midwest mill basis are permitted to contribute.

Both buyers and sellers are equally represented in the final Index price in order to avoid bias. However, different numbers of inputs may be entered from each side of the market into each of the two sub-indexes.

In the unlikely situation that a single market participant provide more than 50% of the transaction data, Fastmarkets AMM will collect from other market participants and include in the calculation of the index other data including bids, offers, and sources' own estimate or indication of value. A minimum tonnage of 500 gross tons is applied to non-transaction data.

What data does Fastmarkets AMM request from market participants?

Fastmarkets AMM requires that its market contacts report data in good faith and report information with full transparency.

To create the most representative indices, Fastmarkets AMM requests the following aspects of the transaction for inclusion in the calculation:

- Transaction price or average transaction price
- Material type (based on ISRI specifications)
- Origin
- Tonnage
- Delivery point
- Delivery period
- Payment terms
- Any other relevant data to pricing (e.g. distressed sale.)

Procedure to ensure consistency in the index calculation process

The US Midwest scrap indices are calculated by a first reporter, peer-reviewed by a second reporter, and always signed-off prior to publication by a senior member of the editorial team. The peer review process is in place to make sure that the pricing procedure and the methodology are correctly and consistently applied.

Index publication

The Index is published on the 10th of each month at 4pm from our New York office. All data must be received by 12 pm New York time. Any data received after 12pm on the day of publication will not be included in the Index calculation.

In the event of the 10th of the month falling on a public holiday or weekend, the Index will be published on the following working day.

Data can be supplied in a number of ways to maximize convenience. This can include by phone or email to the normal Fastmarkets AMM contact or to pricing@ fastmarkets.com.

Fastmarkets AMM's scrap prices portfolio – indices and assessments

Fastmarkets AMM publishes a comprehensive list of scrap market prices including indices and assessments. The assessments are designed to provide a clear and fair representation of the spot price in the various regional markets. The Fastmarkets AMM Midwest Scrap Indices aims to reflect scrap prices for the entire Midwest region. The index prices differ from the assessment figures due to a difference in the methodologies. However, we expect both price series to correlate strongly due to the overlapping nature of many of the data points.

Fastmarkets AMM

US Midwest Ferrous Scrap Indices

Calculation of monthly average prices

Fastmarkets produces independent, fair and representative price assessments and indices for ferrous, non-ferrous and scrap metal prices on a daily, bi-weekly, weekly, bi-monthly or monthly basis. Fastmarkets calculates and publishes monthly averages based on these independent, proprietary assessments and indices by using simple averages.

The simple monthly averages are calculated by dividing the sum of the price quotations by the number of quotations published during the calendar month. For assessments, Fastmarkets derives both the monthly average high price and the Fastmarkets monthly average low price using this method. For indices, a single monthly average price point is calculated.

For example, there were five weekly price quotations for Chrome Ore South Africa UG2 concentrates index basis 42% cif China, \$ per tonne during the month of June 2018. Prices were published each Friday from June 1, 2018, with the assessments reading \$206 per tonne, \$208 per tonne, \$210 per tonne, \$211 per tonne and \$208 per tonne during the period. The simple monthly average is calculated by taking the sum of the five assessments and dividing that by the number of total assessments over the period - in this case, five. The simple monthly average for June 2018 was \$208.60 per tonne.

Most prices produced from the Americas prior to 2021 were calculated on a rolling-average basis. Rolling monthly averages were calculated by dividing the sum of the daily price quotations - including prices republished on non-assessment days - by the number of quotations published during the calendar month. Please contact pricing@fastmarkets.com, adding the subject heading 'Re: calculation of averages' for more information about Fastmarkets existing or legacy averages.



Specifications

MB-STE-0424 Steel scrap No1 heavy melt, index, delivered Midwest mill, \$/gross ton

Quality: ISRI Grade 200 – No1 heavy melting

steel.

Wrought iron and/or steel scrap 1/4 inch and over in thickness. Individual pieces not over 60 x 24 inches (charging box size) prepared in a manner to insure compact charging ISRI Grade 202 – No1 heavy melting

steel 5 feet x 18 inches. Wrought iron and/or steel scrap 1/4 inch and over in thickness. Individual pieces not over 60 x 18 inches

(charging box size) prepared in a manner to insure compact charging.

Quantity: Min 500 gross tons

Timing:

Location: Delivered Midwest mill - any mill in

Illinois, Indiana, Michigan, Wisconsin,

lowa and NW Ohio Within 30 days

Unit: US dollars per gross ton Payment terms: Net 30 days post delivery

Publication: 10th of each month by 4pm New

York time (or following working day)

Notes: All origins

MB-STE-0422 Steel scrap No1 busheling, index, delivered Midwest mill, \$/gross ton

Quality: ISRI Grade 207 - No1 busheling

Ferrous busheling. Compliant to ISRI Specifications 7 No1 busheling. Clean steel scrap, maximum size 2 feet by 5 feet, including new factory busheling (sheet clippings, stampings, etc.). May not include old auto body and fender stock. Free of metal coated, limed, vitreous enamelled, and electrical sheet containing over 0.5% silicon.

Quantity: 500 gross tons

Location: Delivered US Midwest mill - any

mill in Illinois, Indiana, Michigan, Wisconsin, Iowa and NW Ohio

Timing: Within 30 days

Unit: US dollars per gross ton Payment terms: Net 30 days post delivery

Publication: 10th of each month by 4pm New

York time (or following working day)

Notes: All origins

MB-STE-0423 Steel scrap shredded, index, delivered Midwest mill, \$/gross ton

Quality: ISRI Grade 211 - shredded scrap

Homogeneous iron and steel scrap magnetically separated, originating from automobiles, unprepared No1 and No2 steel, miscellaneous baling and sheet scrap. Average density 70

pounds per cubic foot.

Quantity: Min 500 gross tons

Location: Delivered US Midwest mill - any

mill in Illinois, Indiana, Michigan, Wisconsin, Iowa and NW Ohio

Timing: Within 30 days

Unit: US dollars per gross ton
Payment terms: Net 30 days post delivery

Publication date: 10th of each month by 4pm New

York time (or following working day)

Notes: All origins



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Your investment actions should be solely based upon your own decisions and research and appropriate independent advice should be obtained from a suitably qualified independent adviser before any such decision is made.