

Europe & United States secondary aluminium



European DIN226 & US Midwest A380.1
methodology and price
specifications - July 2021

Mission statement

Fastmarkets is a leading commodity price reporting agency (PRA) covering the metals, mining, minerals and forest products industries. Our products include Fastmarkets MB, Fastmarkets AMM, Fastmarkets IM, Fastmarkets RISI, Fastmarkets FOEX and Random Lengths. For more than 100 years we have been providing commodities price reporting services for use by market participants in their day-to-day commercial activities. These services include assessments and indices of commodity prices as well as news, research and commentary on the underlying markets.

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 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 since 1913.

Fastmarkets reporters are required to abide by a code of conduct and clear pricing procedures during their market reporting and pricing activities.

We are the world's largest dedicated metals price reporting team. We have offices in London, New York, Shanghai, Hong Kong, Sao Paulo, Melbourne, Singapore, Mumbai, Dnepr, Istanbul and five other US locations.

The aim of this document is to provide a clear overview of Fastmarkets' secondary aluminium methodologies and price specifications for DIN226 in Europe and A380.1 in the US Midwest. For other aluminium premiums and prices please refer to other methodologies published on Fastmarkets' website.

If you have any questions, please contact the Fastmarkets editorial director Alex Harrison at aharrison@fastmarkets.com.

Specifications

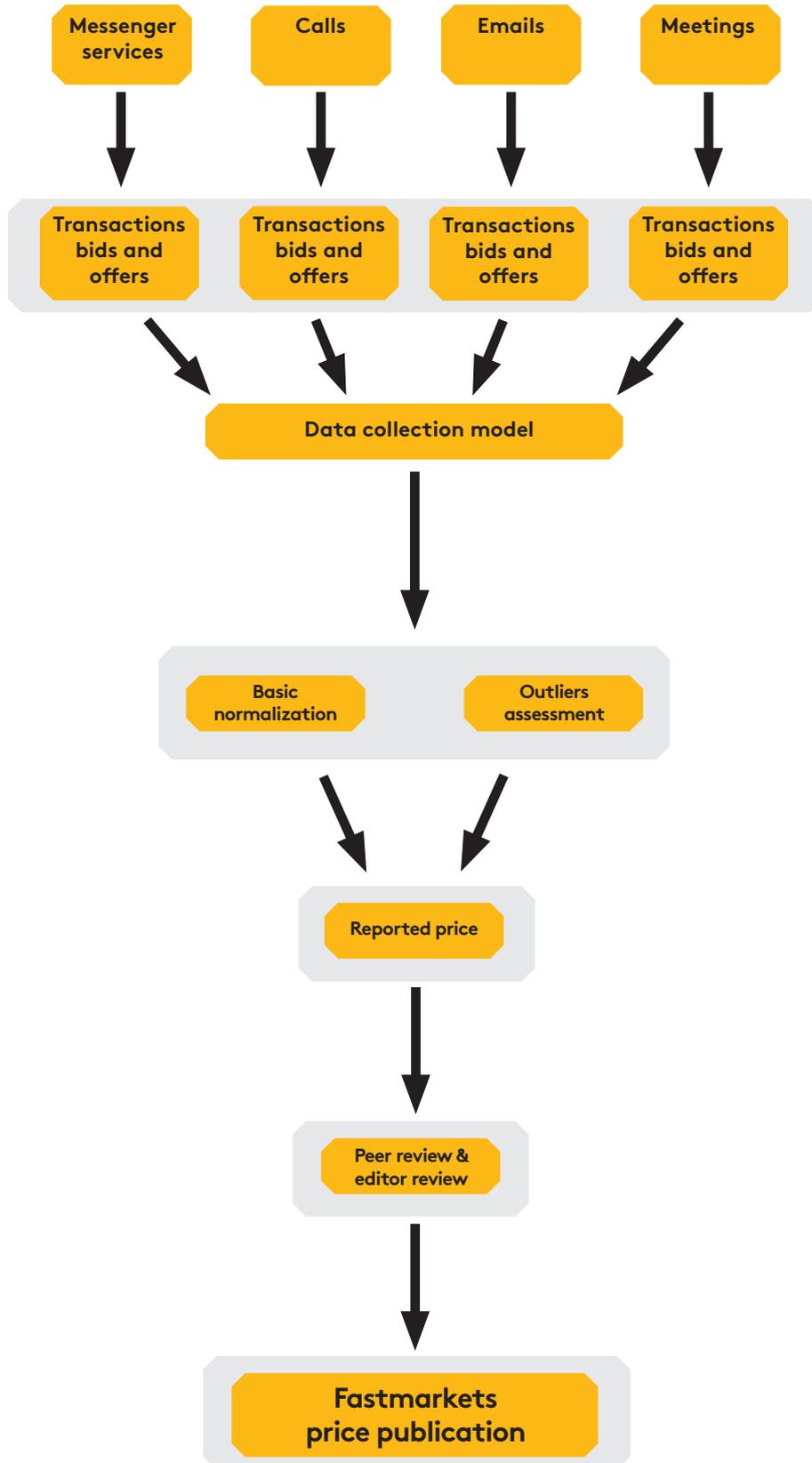
EUROPE

MB-AL-0005	Aluminium pressure diecasting ingot DIN226/A380, delivered Europe, €/tonne
Quality:	Ingot. Cu 2-4%, Mg 0.15-0.55%, Si 8-11%, Fe 0.6-1.1%, Mn 0.55% max, Ni 0.55% max, Zn 1.2% max, Cr 0.15% max, others each 0.05% max/total 0.25% max
Quantity:	Min 25 tonnes
Location:	Delivered consumer works in Europe, most consumers in Northern Europe, in particular Germany
Timing:	Within 2 months
Unit:	EUR/tonne
Payment terms:	30 days, other payment terms normalized
Publication:	Weekly. Friday 3-4pm London time
Notes:	Assessed by Fastmarkets' London office.

UNITED STATES

MB-AL-0040	Aluminum alloy A380.1, delivered Midwest, US cents/lb
Quality:	Copper 3.00-4.00%, iron 1.00%, magnesium 0.10%, manganese 0.50%, nickel 0.50%, silicon 7.50-9.50%, tin 0.35%, zinc 2.90%, aluminium remainder. Form: Ingot
Quantity:	Truckload/20 tons
Location:	Delivered Midwest
Unit:	US cents per pound
Payment terms:	Net 30 days post delivery
Publication:	Weekly, Thursday, 4-5pm Eastern time
Notes:	Assessed by Fastmarkets' New York office.

Price discovery process



Price discovery and methodology

Methodology rationale

Fastmarkets' base metal pricing team aims to produce independent, transparent, fair and representative price assessments.

Fastmarkets has adopted and developed a clear and rigorous price discovery process and methodology, as described in the present guide, to produce assessments that are a consistent and representative indicator of the value of the market to which they relate for the trading period they measure.

In the case of secondary aluminium, aluminium pressure diecasting ingot DIN226/A380, delivered Europe, and Aluminum alloy A380.1, delivered Midwest assessments are the industry's benchmarks and thus subject to even stricter and meticulous price discovery process and methodology.

Fastmarkets supports the process of price discovery through its established and independent position in the metals market. Fastmarkets also employs price reporters that are trained to abide by its methodology and code of conduct, and are dedicated to specific markets and regions. In the case of the secondary aluminium prices, assessments are done by a dedicated secondary aluminium price reporter and when not available, by a back-up reporter within the aluminium team. There are also two back-up reporters from other base metals who are trained to be able to price these secondary aluminium prices.

Before being able to properly assess the market, we must ensure that we understand exactly what information we are trying to collect. The granularity of a price is essential to defining the market and we must therefore be sure that we are clear on our price specifications and the market trends before gathering any pricing data.

Because the aluminium market is constantly developing, Fastmarkets reviews its methodology and specifications, and engages in discussions with market participants both annually, on a formal basis, and on an ongoing basis throughout the year.

Price specifications and reference units

Fastmarkets has defined clear specifications for its secondary aluminium price assessments, as outlined below, to match the industry standard.

These specifications have been determined in consultation with market participants and are regularly reviewed. All the reference units, such as currencies and volumes used in the assessments, are in line with recognised aluminium market conventions and trading practices. The specifications also have a published minimum volume size accepted.

Fastmarkets aims to collect full details of each transaction, bid and offers, including brand, commercial terms, location and any other details relevant to value and pricing. The price reporter ensures that the information they collect matches – or can be normalized to – the price specifications.

Data collection

Collection window

During the price discovery process, the price reporter aims to discover at what representative level market participants have concluded business, made offers or received bids over a defined time period, or window.

The window was determined after considering the number of data points that Fastmarkets can reasonably expect to collect on a consistent basis over the selected period to support the price assessment process, ensuring that the assessments produced is a reliable indicator for the physical market they relate to.

Only data points communicated to Fastmarkets within the data collection window will be included in the price discovery process. The published prices are reflective of the levels seen during this stated collection period.

Europe DIN226 Price:

The price assessment is published every Friday 3-4pm London time and the deadline for data submission is 3pm London time. Data received after this time will not be included in the price assessment.

For the weekly European DIN226 price, the data collection runs from the time of publication of the last price assessment to 3pm on the day of the next price assessment.

US Midwest A380.1 Price:

The price assessment is published every Thursday at 4-5pm Eastern time. The deadline for data submission is 4pm. Data received after this time will not be included in the price assessment.

For the weekly US Midwest A380.1 price, the data collection runs from the time of publication of the last price assessment to 4pm on the day of the next price assessment.

Data threshold

In order to provide a representative price for the market, the price reporter aims to collect as many representative data points as possible within the defined window.

As commodity markets differ in liquidity level at different periods, Fastmarkets typically does not set a minimum number of price points to be gathered on which to base the assessment.

A pricing session typically includes concluded transactions, bids and offers, contributors' market estimates or deals heard. Several separate sources from a cross-section of the market (producers, consumers, traders) will typically contribute to a price assessment and Fastmarkets ensures that there is no key submitter dependency.

This means one contributor cannot account for a significant proportion of the data, defined as 50% or more of the data points collected during a pricing session. Should 50% or more of the data on which to base the assessment be provided by a single source, the price reporter will continue to collect data points from market participants until the minimum threshold is reached. There have been no instances in which Fastmarkets has not been able to reach the minimum data threshold.

Data contribution

Any market participant actively involved in the physical aluminium spot market may become a data contributor following a review by Fastmarkets of its activities. The aim is to ensure that submitters have sufficient visibility and understanding of the market to be able to provide reliable price data.

Fastmarkets aims to engage a broad and balanced range of physical market participants in the provision of data, including producers, consumers and traders who are selling or buying secondary aluminium.

We expect that data submitters taking part in the pricing process are authorised to report market data on behalf of their organisations.

Fastmarkets' Data Submitter Policy provides guidelines to ensure the high level of data quality and integrity that we expect from contributing organisations providing pricing data. The Policy can be found on Fastmarkets' website or is available upon request.

Fastmarkets encourages contributors to submit all their pricing data, especially all their concluded transactions, and not be selective. Only transactions that have been concluded at arm's length and data that match the price specifications – or can be calculated back to meet the specifications – will be included in the assessment.

Price reporters generally speak to, and collect data from, front office staff directly involved in the commercial buying and selling of secondary aluminium. But they also welcome organisations to submit pricing data from authorised back office functions.

The price reporter collects data primarily by telephone, but also by email, digital messenger services or face-to-face.

The key to good price discovery is to speak whenever possible to sources on both sides of a transaction in order to cross-check the pricing information received. All data supplied to Fastmarkets is kept strictly confidential and stored in our secure online pricing database system MInD (Metals Information Database).

Fastmarkets may sign Data Submitter Agreements (DSAs) with any data provider, if requested to do so, in order to maximise the number of data points collected for inclusion in the assessment process. Any data received subject to DSAs will be used in the pricing assessment but not be published.

For new data submitters, Fastmarkets follows the procedure for adding new sources into Fastmarkets' price database system (MInD).

Data analysis

Assessment using specifications and expert judgment

Once data collection is complete, Fastmarkets reviews the data points applying its methodology and its

expert judgment to set the price range to reflect the representative spread of prices at which business has been transacted, offered or bid, or indicated in the absence of business.

Before making an assessment, the following factors must be considered:

- Is the information received credible? If questionable: have we seen signed contracts (preferable), or has it been confirmed on both sides of the deal?
- If credible: were all the prices in a similar range?
- Were all the deals reported of a similar size?
- Do the reported deals all have the same terms and specifications?
- Where was the location of the deal? How far did the metal have to be transported for the transaction? Are there any sub-regional differences that could affect the price?
- Did all the sources indicate the market was headed in the same direction? If not, why not?
- It is not unusual for different sources to report slightly different numbers but it is important, as far as possible, to understand why they are different.
- In the absence of trade, what are the prevailing bids/offers in the market? Did the source provide firm bids/offers or indicative numbers?
- What are the positions of the contributors?
- Are we confident about the freight or free-on-charge costs?
- Has an adequate sample been obtained which correctly represents the market?

Once the above factors have been considered, Fastmarkets will produce a price assessment and set the price following the guidelines below.

Fastmarkets does not treat all collected information equally, but has a justification and rationale for how each piece of information obtained has been used. Greater weighting is given to actual concluded transaction data, but other data is also used: bids and offers are second behind transactions in order of importance, followed by deals indirectly reported to Fastmarkets (referred to as deals heard) and lastly by data sources' own estimates of the market when they have no business to report.

Other considerations might also intervene in the price assessment such as, the trustworthiness of a data source based on past data submissions, or their willingness to provide data on a consistent basis.

When no actual transactions can be collected,

extra caution is applied during the price assessment process. Price reporters are encouraged to keep the price unchanged until actual transactions back up a change. However, should all bids, offers and estimates fall outside the existing price range, price reporters can move the price to reflect the levels where business would take place if transactions were to actually take place.

As a general rule, larger deals carry more weight, but Fastmarkets tries to ascertain what sort of discount a large lot size carries or what sort of price a smaller deal would carry.

Fastmarkets will compare the information received from a single source with the information provided by the same source in the previous pricing cycle. This way, if a source consistently gives low or high numbers, Fastmarkets can still use the data without it unduly influencing its assessment.

Data normalization

Occasionally, Fastmarkets receives price data for material with different specifications – for instance, different material quality, delivery terms or delivery location, different cargo size or payment terms. In such cases, when appropriate, Fastmarkets normalizes data to its typical specifications.

Full details of data inputs prior and post normalization are stored in Fastmarkets' electronic database MInD and may be accessed at any time for internal review and auditing purposes.

An example is a price that is either net-back or net-forward due to payment terms different from Fastmarkets' specifications. Payment terms are based on typical commercial practice in the aluminium spot market. Transactions that are conducted on different payment or credit terms can be normalized, taking into account discounts, interest rates and standard commercial terms. Fastmarkets will use its editorial judgment to determine whether payment terms reported for specific deals match typical commercial terms and adjust the normalization accordingly.

Fastmarkets' price specifications also define the minimum lot size accepted. When volume information is available, this is also taken into consideration in the assessment process. For instance, typically a deal with a bigger volume will carry more weight in the price reporter judgment than a smaller volume transaction.

Criteria for discarding pricing data

Fastmarkets will use its expert judgment to exclude

outlying or unrepresentative numbers, and discount or discard prices that it believes may otherwise be questionable and unreliable.

Outliers will be investigated, and suspected attempts to unfairly influence the price assessments may result in the data provider being warned or excluded.

When a transaction appears questionable or well outside the range reported by other market participants, Fastmarkets may seek confirmation of the claimed deal by requesting to see contracts or other signed paperwork before inclusion of the data in the price assessments. If this is refused, Fastmarkets will seek to corroborate the information it receives by matching trades. So if a seller tells us he has sold a certain amount at a certain level, we then try to speak to the buyer involved in the transaction to confirm the transaction.

If this is not possible, the data supplied may be excluded from the assessment process.

Fastmarkets reserves the right to exclude data that is not fairly presented or is believed may be an effort to distort the price assessments.

Data publication

Peer review process

All Fastmarkets' price assessments are set by a first reporter who covers that specific market, peer reviewed by a second reporter, and always signed-off and approved by a senior reporter or editor prior to publication.

This peer review process, which takes place in MInD is fully auditable and is in place to make sure that pricing procedures and methodologies are correctly and consistently applied and to ensure integrity and quality of the published prices.

Price reporters are formally trained in the price discovery process and must abide by a written [Code of Conduct](#) and pricing procedures.

Publication

At the end of the peer review process, Fastmarkets publishes its price assessments via MInD and onto its website and price book.

All secondary aluminium alloy price assessments are

reported as a price range.

To enhance market transparency and to provide evidence of data inputs that support the price discovery process, Fastmarkets may publish trade logs for its secondary aluminium alloy price assessments, while maintaining full counterparty confidentiality, pricing data and volume received from data contributors.

Fastmarkets also publishes pricing rationales after every pricing session to explain price settlement and editorial judgment.. These notes explain, for instance, why price reporters may conclude whether anomalous or suspicious data should be excluded; when reporters determine a price and a price range based on market information.

European DIN226 publication times

The European DIN226 price is published at 3-4pm London local time. They are not published on England and Wales public holidays, in accordance with the London Metal Exchange holiday calendar.

Price assessments that are due to be published on UK public holidays will instead be published on the closest working day that precedes or follows that date.

Please refer to the [pricing holiday schedule](#) for this year's public holidays.

US Midwest A380.1 publication times

The US Midwest A380.1 price is published at 4-5pm Eastern Standard time.

Price assessments that are due to be published on US trading holidays will be rolled over.

Price correction policy

Publication of price errors can occasionally happen for reasons that may include technical, input errors or incorrect application of the methodology.

To minimise the inconvenience to our subscribers, Fastmarkets aims to investigate each error as soon as it becomes aware of it and to publish a correction promptly on its website through a pricing notice with an explanation of the reason for the correction. Fastmarkets will publish a correction of a price only where it has established undeniably that there has been an error. Fastmarkets' price assessments are produced based on the best data available at the time of the assessment. It will not retroactively change a price based on new information or additional submission of data received after a respective pricing session has closed.

Methodology and price specification review process

Fastmarkets' editorial teams carry out a formal review and approval of the methodologies on an annual basis.

To initiate this process, the editorial teams issue an open consultation at least one month before the annual methodology review is due, inviting feedback from users and subscribers over the duration of that consultation period.

If the editorial team identify changes required to existing methodologies, they classify them either as 'material' or 'immaterial':

- Material changes are those that, once implemented, may result in fundamental changes to the published price. These include specification changes or structural changes to indices.
- Immaterial changes are those that will not result in a different price level once they are implemented.

Fastmarkets writes a pricing notice/coverage note setting out its timetable for the consultation and the method for submission.

Timescales on consultations may vary but, in line with international best practice, they will last no less than one month (or around 20 working days). This should give market participants sufficient time to analyse and comment on specific proposed changes and/or on whether Fastmarkets' methodologies continue to reflect the physical markets under assessment.

If a material change to the methodology is required, Fastmarkets includes in its pricing notice:

- The outline of the proposed change;
- The rationale or motivation for proposing such a change; and
- A proposed timetable for the date on which, if the change goes ahead, it would be implemented.

Further consultation and approval process

Following the open consultation, Fastmarkets' editorial teams review the feedback and comments received, including any suggested changes to existing methodologies.

If no change is proposed, they publish a coverage note to conclude the methodology review. This includes the link to the methodology document and the date of the next scheduled review.

If a change is proposed, the editorial teams determine whether it is material and whether sufficient feedback has been received to implement it. If not, the consultation period is extended and a new coverage note is published inviting comments on the new proposal.

At the end of the new consultation period, the editorial teams review any further feedback received and decide on whether a change should be made. The decision is approved by the editorial director or global editors and announced via a pricing notice/coverage note concluding the methodology review and including the link to the new document and the date of the next scheduled review.

A record of the methodology review is sent the Compliance team. Fastmarkets will publish a coverage note announcing the outcome of the review, including the rationale for the decision and whenever possible feedback received unless stated as confidential. Fastmarkets reserves the right to paraphrase and group comments received into a comprehensive rationale explaining the decision.

When Fastmarkets proposes a change to the methodology, it should be understood that no decision has yet been made and that the proposal to make a change should not automatically be understood as confirmation that the change will happen.

The evolution of pricing

Fastmarkets develops and adjusts its pricing mechanisms in response to changing market conditions. The evolution of long-term contracts to index-linked pricing often occurs as industry players seek to link their pricing to market fundamentals and spot market activity. This trend has been seen clearly in the aluminium market. While Fastmarkets does not seek to drive the direction of the markets it covers, it aims to identify opportunities where spot market activity can be captured, and greater transparency provided through new price assessments.

The development of a pricing mechanism is a process, and as liquidity increases, the sophistication of the pricing methodology can be increased.

Queries and complaints

Fastmarkets encourages engagement from the market on its pricing principles and methodology. The company promotes understanding of its pricing procedures and is committed to responding to requests for further information and clarification on a timely basis.

There are multiple channels for interaction with the pricing team including email, telephone and instant messenger services.

If a subscriber has an issue with the published prices, then they may contact the pricing team. In the event that the response is not satisfactory the issue may be escalated to the internal compliance department. For more details refer to Fastmarkets' [Complaint Handling Policy](#) available on Fastmarkets' website.

Fastmarkets takes all queries and complaints seriously and will seek to provide an explanation of the prices wherever possible. It is important to note, however, that input data remain confidential and cannot be provided to third parties.

Calculation of average prices

The Europe DIN226 price monthly averages are calculated by dividing the sum of the price quotations by the number of quotations published during the calendar month.

Become a contributor to the price discovery process

Fastmarkets continually seeks to increase the number of market sources willing to take part in the price discovery process. The main condition Fastmarkets requires from contributors is for them to be active participants in the spot market.

Fastmarkets' Data Submitter Policy provides guidelines defining the high level of data quality and integrity that Fastmarkets expects. Market participants that wish to provide pricing data and be part of the price discovery process should first read the [Data Submitter Policy](#) available on the website.

All data sources are subject to review before data

submitted is fully taken into account in the pricing process. The aim is to make sure that submitters are trustworthy and have sufficient visibility and understanding of the market to be able to provide viable price data.

To become a contributor, or if you have questions or comments about the methodology and price specifications, please contact the Fastmarkets aluminium team.

Contacts

Juliet Walsh

Global Base Metals Editor
+44 207 556 6017

juliet.walsh@fastmarkets.com

Alex Harrison

Global Editorial Director

aharrison@fastmarkets.com

Risk & Compliance Team

T: +44 20 7827 5264 or

T: +44 20 7779 8519

riskandcompliance@fastmarkets.com

Europe**Alice Mason**

Senior Price Reporter – Aluminium and Alumina

T: +44 207 779 8670

alice.mason@fastmarkets.com

Justin Yang

Senior Price Reporter - Aluminium

T: +44 20 7827 6403

justin.yang@fastmarkets.com

United States**Michael Roh**

Price Reporter - Aluminium

T: +1 347 639 2666

michael.roh@fastmarkets.com

DISCLAIMER - IMPORTANT PLEASE READ CAREFULLY

This Disclaimer is in addition to our Terms and Conditions as available on our website and shall not supersede or otherwise affect these Terms and Conditions. Prices and other information contained in this publication have been obtained by us from various sources believed to be reliable. This information has not been independently verified by us. Those prices and price indices that are evaluated or calculated by us represent an approximate evaluation of current levels based upon dealings (if any) that may have been disclosed prior to publication to us. Such prices are collated through regular contact with producers, traders, dealers, brokers and purchasers although not all market segments may be contacted prior to the evaluation, calculation, or publication of any specific price or index. Actual transaction prices will reflect quantities, grades and qualities, credit terms, and many other parameters. The prices are in no sense comparable to the quoted prices of commodities in which a formal futures market exists.

Evaluations or calculations of prices and price indices by us are based upon certain market assumptions and evaluation methodologies, and may not conform to prices or information available from third parties. There may be errors or defects in such assumptions or methodologies that cause resultant evaluations to be inappropriate for use.

Your use or reliance on any prices or other information published by us is at your sole risk. Neither we nor any of our providers of information make any representations or warranties, express or implied as to the accuracy, completeness or reliability of any advice, opinion, statement or other information forming any part of the published information or its fitness or suitability for a particular purpose or use. Neither we, nor any of our officers, employees or representatives shall be liable to any person for any losses or damages incurred, suffered or arising as a result of use or reliance on the prices or other information contained in this publication, howsoever arising, including but not limited to any direct, indirect, consequential, punitive, incidental, special or similar damage, losses or expenses.

We are not an investment adviser, a financial advisor or a securities broker. The information published has been prepared solely for informational and educational purposes and is not intended for trading purposes or to address your particular requirements. The information provided is not an offer to buy or sell or a solicitation of an offer to buy or sell any security, commodity, financial product, instrument or other investment or to participate in any particular trading strategy. Such information is intended to be available for your general information and is not intended to be relied upon by users in making (or refraining from making) any specific investment or other decisions.

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.