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# **GENERAL DISCLOSURE STATEMENT**

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#### 1 INTRODUCTION

This Disclosure is for use by professional clients and eligible counterparties of Mitsui Bussan Commodities Limited ("MBCL"), being those persons who have received a letter confirming their categorisation as such by MBCL.

This Disclosure describes the characteristics of Transactions generally, before focusing on the particular Transactions that we may enter into with you. We then describe the risks that may be associated with all Transactions, followed by the risks specific to Transactions with commodities as the underlying reference asset, having regard to the following (where applicable): the functioning and performance of those Transactions in different market conditions; the effects of leverage; market volatility; disinvestment routes; additional obligations committed to on your behalf; and any margin or other similar obligations.

This Disclosure cannot disclose all the risks and other significant aspects of the products forming the base of Transactions that you may purchase or sell from or through us ("Products"), but it is intended to give you information on and a warning of the risks associated with them so that you are reasonably able to understand the nature and risks of the services and of the specific types of investment being offered, and consequently, to take investment decisions on an informed basis. Please note that Transactions are intended primarily for knowledgeable and sophisticated parties that are willing to accept such risks and able to absorb the losses that may arise. Therefore, it is important that you or the person exercising discretion on your behalf understand these risks before entering into any Transactions, regardless of your level or prior experience in financial transactions or instruments. This might include conducting a thorough and independent evaluation of the terms of the Transaction in light of your particular circumstances and the nature and extent of your exposure to risk. You should also consider whether the Transaction is appropriate for you in light of your experience, objectives, financial and operational resources and other relevant circumstances. Where you are unsure of any of these matters, you should not deal in these or any other Products.

You should also read and have regard for any Product or Transaction specific disclosures that may be included in any Product or Transaction specific documentation provided to you. **Nothing in this** Disclosure amends or supersedes the express terms of any Transaction between you and us or any related governing documentation.

You should not rely on the guidance contained in this Disclosure as investment advice based on your personal circumstances, nor as a recommendation to enter into any of the services or invest in any of the Products. Nor should you construe the content of this Disclosure as providing legal, financial, tax, accounting or other advice; you should consult your own legal advisor, financial advisor, tax advisor or accountant as to legal, financial, tax, accounting and related matters concerning any Transactions, including the impact on your business and the requirements and results of conducting Transactions.

All defined terms used herein shall have the meaning given in the Terms, unless specified otherwise.

In this Disclosure and any supplemental disclosure statement that refers to this Disclosure:

- "we", "our", "ours" and "us" refer to the provider of this Disclosure and each affiliate that may conduct Transactions with you;
- "you", "your" and "yours" refer to each of the persons to which this Disclosure is delivered or addressed in connection with entering into, executing or agreeing upon the terms of Transactions with us, as indicated in any written or electronic transmittal of the same; and
- "Transaction" means a transaction entered into, executed or agreed between us that in any way has as its subject any financial instrument as defined in Section C, Annex I, MiFID II.

## 2 NATURE AND CHARACTERISTICS OF DERIVATIVES

## 2.1 The characteristics of derivatives generally

A derivative is a financial instrument, the value of which is calculated by reference to the value of one or more underlying assets – for instance, a currency, commodity, security, instrument of indebtedness, index, quantitative measure, occurrence or non-occurrence of an event, or other financial/economic/property interests of any kind. Rather than trade or exchange the asset itself, an agreement is entered into to exchange money, assets or some other value at some future date based on the underlying asset. A premium may also be payable to acquire the derivative.

There are many types of derivative, with options, futures and swaps amongst the most common – see section 2.2 – The Characteristics of Commodity Transactions – for further details on each of these instruments.

Derivatives can be used for speculative purposes or as hedges to manage other investment, commercial, treasury or economic risks. In all cases, the suitability of the Transaction for the particular investor should be very carefully considered.

Derivatives may be traded on-exchange or off-exchange. On-exchange derivatives are subject to the risks of exchange trading generally, including potentially the requirement to provide margin – although off-exchange derivatives may also face margining. Off-exchange derivatives may take the form of bilateral "over-the-counter" contracts ("OTC"). Although these forms of derivatives may be traded differently, both arrangements may be subject to the credit risk of the issuer or the counterparty (if OTC) and, like any contract, are subject also to the particular terms of the contract, as well as the risks highlighted in section 3 – Risks of Entering Into Derivatives below.

OTC contracts are individually negotiated. As the terms of the Transactions are not standardised, the Transactions may be difficult to value. Different pricing formulas and financial assumptions may yield different values, and different financial institutions may quote different prices for the same transaction. In addition, the value of an off-exchange derivative will vary over time and is affected by many factors, including the remaining time until maturity, the estimated market price, price volatility and prevailing interest rates. In any event the value of a derivative may depend on prices, values or levels of the underlying assets. Below we set out additional clarifications and limitations that are common as between derivatives in general, regardless of the underlying asset that the derivative contract references.

# i. Value of derivatives is derived from one or more underlying assets and other market and economic factors

The prices, values, or levels of an underlying asset are determined in the market for that underlying asset. You should be aware that each market for an underlying asset has its own particular characteristics and risks, including, to the extent applicable, the market's institutional structure, trading rules of any exchange, market practices, liquidity, governance, regulation (or lack thereof) and participants. The terms of a Transaction may refer to such features and allocate or otherwise provide for associated risks. Alternatively, there may be known or anticipated eventualities that could affect a market that are not provided for in the terms of a Transaction or its governing documentation. Before you enter into any Transaction, you should review the publicly available information regarding the market characteristics and risks pertaining to the relevant underlying asset, review all the disclosures that we have provided that are relevant to Transactions in such underlying assets, and (as you may deem appropriate) consult advisors with specific expertise regarding the markets for such underlying assets and the Transaction.

# ii. Entering into a Transaction is not equivalent to investment in or ownership of the underlying asset

Unless specifically provided for in the terms of a Transaction or governing documentation, a Transaction will not confer ownership rights or any beneficial or legal interest in the underlying reference asset, including without limitation any stock, fund, partnership interest, note, bond, security, loan or other instrument of indebtedness, foreign exchange rate, currency, commodity, futures contract, or other asset, index or financial measure underlying a Transaction or underlying an index that is the underlying reference for a Transaction.

# iii. The economic return of a Transaction may not be the same as the return from the underlying asset

The mathematical relationship between the payments and deliveries under a Transaction and the price, level or value of the underlying asset will be specified under each Transaction or its governing documentation, and in general there is no reason to expect that the economic return of a Transaction will be equivalent to, or correlated to that of an investment in the underlying asset. Even if a Transaction is a total return swap, contract for differences, or similar instrument that you have entered into for the purpose of obtaining the equivalent of a long or short position in or exposure to an underlying asset, the economic return of the Transaction may not be the same as the return from the underlying asset. Such divergences may occur due to a variety of factors, including, but not limited to:

- Payments or deliveries under a Transaction may be determined based on the prices, values, or levels of the underlying asset only at specified observation or valuation times;
- The Transaction may apply interim compounding to rates of return observed for the underlying asset over shorter periods than the term of the Transaction;
- The Transaction terms may include or reflect an adjustment for fees or commissions, financing charges, hedging costs or breakage costs;

- The tax or accounting treatment, and the legal, tax and accounting requirements and results, of the Transaction may differ significantly from owning the underlying asset;
- The Transaction may not provide the same rights to unwind or transfer the Transaction as direct ownership of the underlying asset would allow in deciding when and how to dispose of the underlying asset;
- The price source or valuation methodology under the Transaction may yield a different value than would be realised by disposing of the underlying asset in financial or physical markets for such underlying asset;
- The Transaction may include optionality, cancellation, "barrier," leverage or other similar features that may give disproportionate effect to changes in prices, values, or levels or other factors; and/or
- The Transaction may contain terms providing for adjustments, early termination or cancellation due to corporate events, disruption of our ability to hedge in relevant markets, changes in law or other extraordinary events.

Accordingly, changes in prices, values, or levels of an underlying asset may not result in a comparable payment or delivery under, or change in the value of, the Transaction. If the price, value, or level of the underlying asset for a Transaction has increased on any day, the value of the Transaction on such day may not increase comparably, if at all. Such changes in value may vary throughout the day and differ based on the time of valuation. It is also possible for the price, value, or level of an underlying asset to increase while the value of the Transaction declines and exposes you to substantial economic losses.

A Transaction and related underlying asset may be priced in separate markets, and the values of the Transaction and underlying asset may diverge for significant periods or indefinitely. Also, models we use to value Transactions, including methodologies, assumptions and inputs to those models, may change, which could cause a change to the value we attribute to the Transaction without necessarily affecting the value of the underlying asset.

## iv. No assurance of Transactions providing you with a desired return or result

Unless the terms of the Transaction expressly guarantee a stated return, there is no assurance that a Transaction will provide you with a positive or anticipated return or achieve your objectives. It is impossible to predict whether and the extent to which the underlying rates, prices, assets, indices, or other underlying asset relevant to a particular Transactions will rise or fall. The levels or performance of relevant rates, prices, assets, indices, or other underlying assets may be influenced by complex and interrelated political, economic, financial and other factors.

You should be willing to accept the risk of exposure to the levels or performance of such rates, prices, assets, indices, or other underlying assets and the risk of suffering substantial economic losses from or in connection with the Transactions, which may require you to make a payment to us. Even if the Transactions provide you with a positive or anticipated return, the return on the Transactions may be inferior to returns available in connection with other Transactions that you could have entered into or other arrangements that you could have made, including owning the underlying asset.

## v. No assurance of Transactions achieving your desired hedging objectives

In some cases, you may enter into Transactions to hedge, reduce or otherwise manage price or other risks to which you or your affiliates are exposed through owning an asset, owing a liability or being a party to other transactions or anticipated transactions. There may be imperfect correlation (sometimes referred to as "basis risk") between changes in the value of a Transaction and the particular exposures you wish to hedge, and the amount of basis risk may increase over time. You may also be exposed to risk as a result of differences in legal documentation between a Transaction and the particular exposure you wish to hedge, including differences in how the underlying asset is defined under the hedged item and the definition applicable to the Transaction, or as a result of differences in the dates or times as of which prices, values or levels are to be determined for the hedged item versus the Transaction.

In addition, the notional amount of a Transaction may not remain matched to the amount of exposure you wish to hedge, as would be the case, for example, if an anticipated investment, purchase, sale, acquisition, disposition or other transaction does not occur. Unless otherwise agreed, we have no obligation to terminate or modify any Transaction in response to these or other changes in your circumstances or to accommodate your hedging strategies or needs. You should carefully review the risks of entering into a Transaction before you acquire an asset, liability or other item to be hedged and the risks of any prepayment, liquidation or other disposition of an asset, liability or other hedged item before the Transaction matures.

Hedging entails economic costs reflected in the pricing of Transactions, which can be significant. Although a hedge Transaction may be structured such that no upfront purchase price is payable, you should understand that significant potential amounts could become payable for modifying the Transaction or terminating it early, depending upon the existing market conditions, as described in this Disclosure.

#### vi. Termination of Transactions

Under the relevant governing documentation, a Transaction and potentially our entire relationship may be subject to early termination upon the occurrence of events that may be characterized as "events of default" or "termination events" (some examples of which might include failures to pay, insolvency, force majeure or illegality) in relation to you, us, and/or any guarantor or other credit support provider. Certain Transactions may also be subject to early termination upon the occurrence of extraordinary events specified in the terms of such Transactions or governing documentation, or may provide an optional early termination right for one or both of the parties. The event or events giving rise to a right of termination may be outside your control and may occur at a time when the price, level or value of the underlying asset, or the value of the Transaction otherwise, is such that you would owe a substantial termination payment. You may owe this termination payment even if we are the defaulting party. Additionally, if the Transaction terminates early, you may not be able to establish, or may incur costs in establishing, substitute arrangements for the Transaction.

We have no obligation to consider your interests in determining whether or when to terminate the Transactions following one of these or other events that entitle us to terminate Transactions. Termination and the corresponding determination of a termination amount could occur at a time when the relevant markets are volatile, illiquid or not functioning in accordance with normal market conditions.

If we determine an early termination amount, we may take into account, subject to the terms of the Transaction and other governing documentation, our and your creditworthiness, our funding costs, hedging or hedge unwind costs (which may include costs related to the failure of a custodian or hedge counterparty), loss of bargain, relevant documentation terms, market data from internal sources and other factors. Such determinations may involve subjective judgment and uncertainty, which may adversely affect the Transaction's intended economic benefits. Termination amounts may differ significantly from daily marks, market values or values used for collateral requirements.

The treatment of Transactions in your or our insolvency may be more favourable to us than the treatment of alternative arrangements you might have entered into to achieve the same economic objective. For instance, if you are the subject of an insolvency proceeding, Transactions between you and us may qualify for special treatment intended to, among other things, facilitate prompt termination and access to collateral.

# 2.2 The characteristics of Commodity Transactions

The following is a discussion of the terms and characteristics of Transactions commonly entered into by MBCL and its counterparties where the underlying assets are physical commodities, contracts for future delivery of physical commodities or physical events (such as weather, transportation or emissions) ("Commodity Transactions").

The categories employed below are illustrative only, and are intended to assist you in understanding key features of certain prospective Commodity Transactions. The discussion should not be viewed as a comprehensive description of any particular Commodity Transaction that may be under discussion between you and us, nor should this discussion be construed as us imparting any investment advice. A particular Commodity Transaction may have additional or different risks, terms and characteristics than described below, even if it is referred to by one of the following category names. The risks inherent with any Commodity Transaction will be specific to your situation and rationale for entering into the Commodity Transaction, and this and the risks set out throughout this Disclosure should be borne by you in mind at all times.

# i. Physical or cash settlement

Commodity Transactions are capable of being either physically-settled or cash-settled, depending on the instrument used. The characteristics, utility to you and inherent risks between these two methods of settlement differ, and prior to entering into the contract, you should ensure that you have a sufficient understanding of the relevance of these factors to any Commodity Transaction entered into by you.

## ii. Forwards and futures

Commodity Transactions in forwards or futures involve the situation where a party agrees to buy or sell an underlying asset to another party at a future date at a price agreed today. Forwards and futures are similar with the main difference being the way in which they are traded. Forward contracts are OTC private, bilateral contracts that have been tailored for the specific needs of the parties, where each party takes a credit risk on the other. Futures contracts are a form of forward contract but are standardised – as to, amongst other things, lot size, contractual terms, tick size and

settlement date — exchange traded contracts, with the clearing of the product ensuring that counterparty performance is guaranteed through a related clearing house, minimising counterparty credit risk, although where we provide clearing services to you, note that under the principal to principal clearing model used by European exchanges you retain credit risk as against us and in the event of our insolvency you will not have any rights directly against the clearing house..

Both futures and forwards entail a large degree of risk. Such risk arises from the leverage or gearing available for futures and forward transactions, meaning that a small deposit or down payment can lead to disproportionately large losses as well as gains of equal measure. Futures and forwards both may contain contingent liabilities in particular around margining requirements. Margining requirements have evolved in order to mitigate counterparty credit risk, and this concept is explained in section 3.1.v – Credit Risk. Please note that margining may also be relevant for certain OTC forward contracts, and other derivative contracts that are OTC and not centrally cleared.

## iii. Commodity options

Under an option, one party (the option writer) grants the other party (the option holder), the right, but crucially, not the obligation to:

- In the case of a <u>call</u> option, buy an underlying asset from the option writer at a fixed price on a future date;
- In the case of a <u>put</u> option, sell an underlying asset to the option writer at a fixed price on a future date.

A commodity option is an option where the underlying reference asset is a commodity, a contract for future delivery of a commodity or rights or indexes relating to commodities or events.

Under a conventional <u>physically-settled</u> option structure, the purchaser of a call option has the right to purchase a specified quantity of the underlying commodity at the strike price, and the purchaser of a put option has the right to sell a specified quantity of the underlying commodity at the strike price.

Under a conventional <u>cash-settled</u> commodity option, the option holder pays a premium in exchange for the right to receive upon exercise of the option (i) in the case of a call option, the excess, if any, of the commodity reference price (as determined pursuant to the terms of the option) above the option's strike price (the price at which the option holder can sell the underlying commodity); or (ii) in the case of a put option, the excess, if any, of the option's strike price above the commodity reference price (as so determined). The commodity reference price may be the spot price of a specified commodity or the price for a specified futures contract on a commodity, among other things.

When you purchase an option, you may suffer a total loss of premium (plus transaction costs) if that option expires without being exercised. In addition, you may suffer a total loss of premium (plus transaction costs) due to the inability of your counterparty to return the premium, if required under the terms of the transaction; this represents a counterparty credit risk. An option's time value (i.e., the component of the option's value that exceeds the in-the-money amount) tends to diminish over time. Even though an option may be in-the-money to the purchaser at various times prior to its expiration date, the purchaser's ability to realize the value of an option depends on when and how

the option may be exercised. For example, the terms of the Transaction may provide for the option to be exercised automatically if it is in-the-money on the expiration date.

Conversely, the terms may require timely delivery of a notice of exercise, and exercise may be subject to other conditions (such as the occurrence or non-occurrence of certain events, such as knock-in, knock-out or other barrier events) and timing requirements, including the "style" of the option (see within this section below). Before entering into an option, you should make sure that you fully understand the method, conditions and timing requirements for exercising the option, including requirements to deliver a notice of exercise, whether and how automatic exercise applies, the definitions of and method for determining any barrier events, whether the terms permit partial exercise and/or exercise on more than one date, and any requirements as to a minimum exercise amount or an exercise amount that is an integral multiple of a specified amount. The "style" of an option refers generally to when the option is exercisable or to the times at which the price or value of the underlying commodity will affect the option's payout.

An *American-style* option may be exercised at any time (i.e., on any business day as defined in the relevant documentation) during the specified exercise period prior to the time of expiration.

A *European-style* option may be exercised only on the specified exercise date (or expiration date) prior to the expiration time.

A *Bermudan-style* option may be exercised on the specified exercise date (or expiration date) prior to the expiration time and on a discrete number of specified prior dates.

An *Asian-style* option is a variant of the European-style option. In an Asian-style option, also known as an "average price" option, the reference price or value in relation to the underlying commodity is derived from an agreed upon calculation, which, by way of example, may be based upon an average of the underlying commodity's reference prices or values at predetermined dates occurring during a specified "averaging period," with the exercise date occurring at the end of such averaging period. An Asian-style option's payout is therefore based upon the difference between the average reference price or value of the underlying commodity and the option strike price.

Uncovered option writing (i.e., selling an option when the seller does not own a like quantity of an offsetting position in the underlying asset) exposes the seller to potentially significant loss. The potential loss of uncovered call writing is unlimited. The seller of an uncovered call is in an extremely risky position, and may incur large losses if the reference price or value of the underlying asset increases above the exercise price by more than the amount of any premiums earned. As with writing uncovered calls, the risk of writing uncovered put options is substantial. The seller of an uncovered put option bears a risk of loss if the reference price or value of the underlying asset declines below the exercise price by more than the amount of any premiums earned. Such loss could be substantial if there is a significant decline in the value of the underlying asset. Uncovered option writing is thus suitable only for the knowledgeable investor who understands the risks, has the financial capacity and willingness to incur potentially substantial losses, and has sufficient liquid assets to meet applicable collateral or margin requirements. For combination writing, where the investor writes both a put and a call on the same underlying asset, the potential loss is unlimited.

You should also be aware that the risk-return profile of an option may vary depending on the characteristics of the relevant Transaction. For example, a "knock-out option" may expire prior to the scheduled expiration date if the reference price or value of the underlying commodity reference falls

below, in the case of a put option, or exceeds, in the case of a call option, an agreed upon price or value at specific points in time, or at any time during the exercise period, depending upon how the option is structured. The buyer of such an option bears the risk of reference price movements causing the option to expire prior to the scheduled expiration date.

## Complex or exotic options

- Cap/floor. A cap or a floor is an option or series of options on a floating commodity reference
  price in which the buyer of the cap or floor receives a payment only if the floating price
  exceeds an agreed upon strike price (in the case of a cap) or falls below the strike price (in
  the case of a floor), on a specified date or dates. If the buyer of a cap or floor pays the
  premium during or at the conclusion of the trade, both the buyer and seller will have
  counterparty credit risk.
- **Collar**. A collar is a type of option in which one of the parties purchases a cap and sells a floor. The premium received from selling the floor may offset all or a portion of the premium for the purchased cap, or may in some instances be greater than the cap premium. As with other options, the sale of a floor or cap entails certain risks as noted above.
- Barrier. A barrier option is an option under which the right to exercise may be created or extinguished, or the terms of which may change in some other pre-defined manner, upon the occurrence of an event or condition (a "barrier event") defined by reference to observed values of the underlying commodity during the term of the option. A barrier event may consist, for example, of the price of the underlying commodity reaching or exceeding a predetermined barrier price or may require more complex conditions on the path of the relevant underlying commodity. A barrier option that becomes potentially exercisable upon the occurrence of a barrier event is known as a "knock-in" option, while a barrier option that is extinguished upon the occurrence of a barrier event is known as a "knock-out" option. Other types of barrier options include "one-touch" barrier options (the holder of the option receives a payment if the price of the underlying commodity reaches or surpasses a predetermined barrier price by its expiration date) and "no-touch" barrier options (the holder of the option receives a payment if the price of the underlying commodity never reaches a predetermined barrier price by its expiration date). The value of a barrier option may change non-linearly and abruptly, particularly as the relevant commodity reference price approaches the level that triggers the barrier event.

Barrier events are typically identified under the terms of a particular Commodity Transaction and may provide that the calculation agent or other designated party will determine whether a barrier event has occurred. Barrier events may occur unexpectedly and, subject to the terms of the relevant Commodity Transaction documentation, based upon information available to the calculation agent or other designated party that may not be contemporaneously (if at all) observable by you. You should review and understand thoroughly the applicable barrier event, including such factors as whether there is a requirement that an actual Transaction at the price or level that triggers a barrier event (the "barrier price") has occurred, and whether a specified minimum size or other criteria apply to the observed triggering event. There can be no assurance that you will be able to execute a spot or other transaction at the barrier price, even if you have placed a limit order at such price with us or in an unrelated trading venue. Accordingly, any trading or hedging strategy that relies on the execution of a Transaction at the barrier price (such as reliance on a stop-loss order to mitigate losses in the event that a purchased barrier option is extinguished) may not be effective.

Subject to any express agreement in the documentation governing a barrier option between us, we may, in our discretion, decide to engage in hedging activities with respect to the barrier option. Such activities may include buying and selling, on a dynamic basis, the underlying commodity in the spot market or entering into derivatives on such underlying commodity. Our hedging strategy may entail unwinding our hedge when a barrier event occurs under your option. We may anticipate the barrier event and begin unwinding our hedge before the barrier event occurs, or our hedging strategy may require greater and more frequent dynamic adjustments to our hedge as market prices approach the barrier price. Unwinding or adjusting the hedge typically consists of buying or selling a quantity of the underlying commodity, or terminating or entering into derivatives positions with market counterparties. This activity may affect the likelihood of the barrier event occurring or not occurring.

Accumulators. An accumulator is a contract pursuant to which one party is obligated to purchase from the other party a specified quantity of a commodity at a pre-determined price on a series of pre-determined dates over a specified period of time. If the commodity reference price is either above or below a pre-determined "knock-out" price, all accumulations remaining in the specified period are cancelled. The notional amount of the contract may increase periodically, increasing leverage, based on whether a predefined condition is triggered (e.g., if the commodity reference price falls below a certain level during the specified period). Therefore, the notional amount may increase at a time when the price for the underlying commodity is falling, but the price at which the purchaser must pay for the underlying commodity remains fixed. This feature may magnify losses for the purchaser of an accumulator. An accumulator is unlike a typical option contract in that it typically involves, like a forward contract, the obligation and not the option to buy the underlying commodity. An accumulator may be cash- or physically-settled and you should therefore be aware of the risks and characteristics described in section 3.2.vi - Physical Settlement. Since an accumulator involves the periodic purchase of the underlying commodity, a buyer is essentially entering into a complex series of option contracts that it buys and/or sells periodically.

A Commodity Transaction labelled as an "accumulator" in your Transaction documentation may alternatively refer to the kind of Commodity Transaction described as a range accrual swap in section 2.2.iv. Please also review the characteristics and risks associated with a range accrual swap below.

• Commodity swaptions. A commodity swaption is an option that provides one party with the right, but not the obligation, to enter into a commodity swap at an agreed-upon fixed price on the specified future exercise date or dates – see section 2B.iv – Commodity Swaps. In a "pay-fixed" commodity swaption, the holder of the swaption has the right to enter into a commodity swap as a payer of the fixed price and receiver of the floating price, whereas in a "receive-fixed" swaption, the holder has the right to enter into a commodity swap as a receiver of the fixed price and a payer of the floating price. In either case, the writer of the swaption has the obligation to enter into the opposite side of the commodity swap from the holder. Swaptions are options and have the risks and characteristics described above in relation to "Commodity options".

In some cases, you may decide to purchase a commodity swaption to lock in commodity hedging terms in advance of a future transaction or in anticipation of future requirements or exposure. You should be aware that if the future transaction is not consummated or the future requirements or exposure do not come about for any reason, you will have received no hedging benefit from the premium payment and other costs incurred in purchasing the swaption.

In some cases, you may decide to sell a commodity swaption. Selling a swaption may involve substantial risks analogous to uncovered option writing. Your objective in selling the swaption, for example, may be to capture the value of options you own. You should be aware that such strategies are inherently risky, depend on a confluence of factors that are difficult to predict and may result in substantial losses.

As with other options, a swaption has an exercise style, which may be European, American or Bermudan, and exercise may be subject to various conditions. You should review and understand the conditions and requirements for exercising a swaption and the consequences of exercise, as described above.

## Transactions with option-like features

Some Transactions that are not considered options may have option-like features, such as caps, floors, collars, early termination rights or rights to change the underlying asset. Such Transactions will be subject to risks associated with options as a result of such option-like features, as discussed above, in addition to the other risks of the particular Transactions.

## iv. Commodity swaps

A swap agreement is a derivative where two counterparties exchange one stream of cash flows with another stream of cash flows, where the cash flows are calculated by reference to an underlying commodity.

- Fixed-for-floating swaps: In a fixed-for-floating commodity swap, one party (the "fixed price payer") makes periodic payments based on a fixed price for a specified commodity that is agreed upon at the execution of the swap, while the other party (the "floating price payer") makes payments based on a floating price for such commodity that is reset periodically. The floating price may be a spot price for the specified commodity, the price for a specified nearest futures contract for such commodity or an average price of such spot prices or futures contracts prices calculated over a period. For example, the floating price for a fixed-for-floating swap on oil with monthly payments may be based on the average of the settlement prices for the first nearby month NYMEX WTI Crude Oil Futures for each day of the relevant month. From the perspective of the fixed price payer, an increase in the overall price of the relevant commodity in the market will cause the swap to increase in value, because the fixed price payer's contractually specified fixed price obligations will be lower than the commodity price then prevailing in the market. Conversely, if the overall price of the relevant commodity falls, the value of the swap to the fixed price payer will decline. From the perspective of the floating price payer, the corresponding value changes will be reversed.
- Basis swaps: In a commodity basis swap, periodic payments are exchanged based on two floating commodity reference prices. The two floating commodity reference prices are often related to each other, yet different. For example, one of the floating commodity reference prices may be for a liquid, highly-traded commodity or contract while the other is for a similar but less frequently traded reference commodity or contract. Alternatively, one of the floating prices may be a spot price for a commodity while the other is a futures price (or forward price) for the same commodity. As a final example, one of the floating prices may be for a futures contract for delivery of a commodity to a particular location and the other is a futures contract for delivery to a different location. The value of a basis swap generally is

sensitive to changes in the relationship between the two floating commodity reference prices, which in turn depends on market conditions affecting the supply and demand for the relevant reference commodities. An alternative structure for a commodity basis swap involves a fixed price payment (which may be negative) on one leg and a floating price payment equal to the difference between two specified floating prices on the other leg. If a leg is a negative amount, the applicable "payer" will receive that amount from its counterparty instead of paying such amount.

• Range accrual swaps. In a typical range accrual swap, one payment leg is either a fixed or floating commodity reference price. The other payment leg can either be fixed or floating as well, but payments will only accrue at the specified rate on days on which a certain condition is met. For example, payments may only accrue for the second payer on days when the commodity reference price is within a specified range. The party paying the simple fixed or floating payment assumes the risk that the commodity reference price will stay outside of the specified range in which payments accrue (or, more generally, that the specified accrual condition does not occur). The condition for accrual may be observed daily, weekly, monthly or such other time period as agreed upon by the parties. The range can stay the same throughout the life of the swap or could change according to a predefined schedule.

A Commodity Transaction of the kind described in the immediately preceding paragraph may also be referred to as an accumulator in your Transaction documentation. Please also review the characteristics and risks associated with an accumulator in section 2B.iii Commodity Options.

Extendable swaps. An extendable swap is a swap that provides a party (typically the fixed price payer) the option to lengthen the term of the swap beyond the original termination date. The fixed price payer may want to exercise its right to extend the swap if the relevant commodity reference price is rising, since the fixed price payer would benefit from continuing to pay a fixed price that is now likely below market levels while receiving a floating price for an underlying commodity that is increasing in price. Fixed price payers are likely to pay a premium for this extension option in the form of paying a higher fixed price than they otherwise would for a more vanilla fixed-for-floating commodity swap. If you sell an extendable swap to us and we, as the fixed price payer, exercise our option to extend the swap, you must continue to pay us the floating price agreed upon, which will likely result in a swap with terms less favourable to you than if you entered into a new vanilla fixed-forfloating commodity swap at the time of extension. The first part of an extendable swap is simply a commodity swap and therefore involves the risks and characteristics associated with a commodity swap with similar terms and features. An extendable swap also essentially contains an option to enter into another swap, and therefore involves the same risks and characteristics as swaptions described under section 2.2.iii – Commodity Options.

# 3 RISKS OF ENTERING INTO DERIVATIVES

# 3.1 The risks of derivatives generally

The price or value of a derivative will depend on fluctuations in the financial markets outside of anyone's control. The nature and extent of investment risks varies between countries and from

derivative to derivative. These investment risks will vary with, amongst other things, the type of Transaction being entered into, including how the financial products have been created or their terms drafted, the needs and objectives of particular investors, the manner in which a particular derivative is made or offered, sold or traded, the location or domicile of the issuer, the diversification or concentration in a portfolio (e.g. the amount invested in any one currency, security, country or issuer), the complexity of the Transaction and the use of leverage.

The material risk types set out below could have an impact on each type of investment. We have noted in section 2 – The Nature/ Characteristics of Derivatives – where a particular risk as stated below applies to a particular investment. Please note that all Transactions may contain elements of some or all of the risks outlined below, and that you should review the express terms of the Transaction in order to understand the risks associated with that particular Transaction. If you do not understand the risks involved with a Transaction, you should not enter into the Transaction.

#### i. Market risk

Market risk is the risk that the value of a Transaction, or the amount of payments or deliveries to be made under a Transaction, will be adversely affected by: fluctuations in the level or volatility of, or correlation or relationship between, one or more market prices, rates or indices or other market factors; by new information related to an underlying asset or changes in perceptions regarding contingencies affecting an underlying asset; or by illiquidity in the market for the underlying asset or the Transaction or in a related market.

Depending on the terms of a specific Transaction, its value may be affected by multiple factors in addition to the prices, values, or levels of the underlying asset. The factors that may affect the value of a Transaction (and, in some cases, the value of the underlying asset itself) include:

- actual and/or expected volatilities (i.e., the frequency and magnitude of changes) in the prices, values, or levels of the underlying asset;
- correlation (i.e., the tendency to move together in the same or opposite directions) of the prices, values, or levels of the underlying asset;
- market interest rates, currency exchange rates, forward rates and yield and forward price curves;
- liquidity in the markets for Transactions and the underlying assets, or in related markets;
- the term of the Transaction;
- optionality that a party has under the terms of a Transaction and its governing documentation, including but not limited to optional early termination rights or rights to choose which particular securities, commodities, currencies, or other assets it may deliver in satisfaction of an obligation;

- the terms of collateral or other credit support arrangements, including whether a party is permitted to re-use collateral and the rights to choose the composition of the credit support it is required to deliver;
- in the case of cleared Transactions, the clearinghouse's margining methodology, including in particular its method, if any, of adjusting for imputed interest on cumulative variation margin;
- actions of government, regulatory and tax authorities; and
- our creditworthiness or your creditworthiness, whether actual or perceived, including actual
  or anticipated upgrades or downgrades in a party's credit ratings or changes in other credit
  measures.

The market risk of a Transaction may be accentuated by complex payout calculations or other features. Such features include leverage, multipliers, option-like payouts, non-linear dependence on an underlying price, value, or level, or dependence on the path of an underlying price, value or level. Transactions with such features may include, caps, collars, floors, exotic options, Transactions with knock-in or knock-out rights, or range accrual swaps and options. Such Transactions may be subject to significant changes in value as a result of relatively small changes in the price, value or level of an underlying asset or other market factors.

Furthermore, inflation may also reduce the value of any payments that you receive under a Transaction compared to your expectations when entering into the Transaction.

In addition to the market risk factors set out above, markets in commodities are also susceptible to additional risks. The market value of a Commodity Transaction may be influenced by many unpredictable factors, such as:

- prevailing spot prices for the commodity;
- supply and demand for the commodity;
- market activity;
- liquidity;
- economic, financial, political, regulatory, geographical, biological, or judicial events; and
- the general interest rate environment.

These factors interrelate in complex ways, and the effect of one factor on the market value of the Commodity Transaction may offset or enhance the effect of another factor.

## ii. Liquidity risk

Liquidity risk is the risk that a party may be unable to, or may have limited ability to, unwind or transfer a particular position in a timely manner at or near the market price or at all. Liquidity risk may vary greatly depending upon the terms of the Transaction, including, for example, notional amounts, rates, collateralization, highly customized features and other market sensitive terms.

In evaluating this risk in the context of Transactions, you should consider that a Transaction may be terminated or modified only pursuant to the terms of the Transaction or by mutual agreement of the parties. Similarly, any novation or other transfer of a Transaction may be made only pursuant to the terms of the Transaction or with the consent of the remaining party and, in either case, on terms agreed between the transferor and transferee. If our consent is required, we may not consent for a variety of reasons, which we may not be required to disclose to you.

Even though market-makers and dealers are likely to quote prices or terms for entering into or terminating particular Transactions and provide indicative prices or mid-market valuations for outstanding Transactions, there can be no assurance that another dealer will be available and willing to accept as transferee your rights and obligations under any Transaction between us, or that we would consent to such transfer. Even though market liquidity may exist generally for a particular type of uncleared Transaction at the time you enter into the Transaction, such liquidity may be diminished or unavailable in the future as more Transactions become cleared. Market liquidity for a type of Transaction may also be adversely affected by the development of updated or new industry standard terms, their adoption by market participants (including through amendments to outstanding Transactions via industry protocols) and the migration of trading interest to such new or updated standard terms.

There also can be no assurance that another dealer or market participant will be available and willing to offer you transactions that offset your Transactions with us. Even if an offsetting transaction is available, in the case of an uncleared Transaction, engaging in such an offsetting transaction will not automatically close out your Transaction with us (as might occur in the case of cleared transactions carried at the same clearing broker) and may not function as an effective hedge for that Transaction. Accordingly, it may not be possible for you to modify, terminate or offset your obligations or your exposure to the risks associated with a particular Transaction prior to its scheduled termination date.

In contrast, liquidity risk may be mitigated to a degree when a Transaction is cleared through a clearing house, insofar as your ability to close out your Transaction by entering into an offsetting transaction with other market participants would not require our consent or an existing trading relationship between us and that other market participant. However, there can be no assurance that the level of liquidity for a cleared Transaction you enter into will continue to exist. Your ability to clear Transactions through a clearing house in the future will depend upon a variety of factors, including the willingness of clearing members to offer you clearing services, which could depend, among other things, on the level of your creditworthiness and your ability to meet margin calls.

## iii. Clearing house protections/settlement risk

Settlement risk is the risk that a counterparty or intermediary agent fails to deliver a commodity or other obligation, or its value in cash, in accordance with the agreed terms after the other counterparty has already fulfilled its obligations to deliver under the agreed arrangements. As a result, settlement risk involves both liquidity and credit risks. The risk that transactions cannot be settled affects every type of asset and instrument which requires a transfer system to pass between counterparties. However, this risk is particularly acute in foreign exchange transactions and where

different legs of the transaction settle in different time zones or in different settlement systems where netting is not possible.

As a mitigation to settlement risk, the performance of a transaction may be guaranteed by a clearing house or by an exchange (where relevant). However, this guarantee will usually be in favour of the clearing house or exchange member and may not be able to be enforced by the end client or beneficiary of the Transaction. As a result, Transactions may be subject to the credit and insolvency risks of the firm through whom the transaction was executed as discussed in section 3.1.v – Credit Risk.

## iv. Funding risk

Funding risk is the risk that, as a result of the unpredictability of payment or delivery obligations or margin (collateral) requirements under Transactions, or mismatches or delays in the timing of cash flows due from or to a party pursuant to Transactions or related hedging, trading, collateral or other transactions or activities, a party may not have adequate cash available to fund current obligations.

For example, there is no purchase price paid or received on the purchase or sale of a futures contract. Instead, an amount of cash or cash equivalents must be deposited with a broker as "initial margin". This amount varies based on the requirements imposed by the exchange clearing houses, but may be lower than 5 percent of the notional amount of the futures contract. This margin deposit provides collateral for the obligations of the parties to the futures contract. The market participant normally makes to, and receives from, the clearing broker or clearing house subsequent daily payments as the price of the futures contract fluctuates. These payments are called "variation margin" and are made as the existing positions in the futures contract become more or less valuable, a process known as "marking to market". Subject to the Transaction and the governing documentation, failure to provide margin on a margin call in order to maintain your position within the applicable notice periods (which may be short) may result in your position being subsequently liquidated, and the Transaction, other governing documentation and potentially our entire relationship being terminated, potentially requiring a termination payment by you.

Depending upon your other arrangements with us or with your other creditors, such failure to comply or such termination may also trigger cross-default provisions in these other arrangements, which may provide us or your other creditors with rights to accelerate or terminate these other arrangements, possibly increasing your funding risk to the extent you are required to make additional payments or deliveries.

## v. Credit risk

Credit risk is the risk that a party to a Transaction or, if applicable, a party's guarantor or credit support provider, will fail to perform its obligations when due, including its obligations to return collateral which it is no longer entitled to hold, or that the amount of collateral provided by that party or its credit support provider proves insufficient. Because of this credit risk, our and your creditworthiness and that of our and your guarantor or other credit support provider, if any, is a material consideration in entering into or determining the terms of a Transaction, and has an impact on the pricing, costs or credit enhancement of the Transaction. A party's exposure to credit risk, if so agreed, may be reduced by the delivery to it or to its custodian of collateral to secure the obligations of the other party or its guarantor or credit support provider, and the other party's exposure to credit risk for the return of such collateral may be reduced by delivering such collateral to such custodian to

be held under mutually acceptable custodial arrangements, subject to the credit risk of the custodian as discussed below. Unless otherwise expressly agreed in writing or required by applicable law, neither your counterparty nor any guarantor or credit support provider for your counterparty will have any obligation to deliver collateral in connection with the Transactions.

For some Transactions, our role may be solely that of an executing broker (i.e., we and you may agree upon the terms of Transactions for give-up to a different entity for submission for clearing through a different entity that acts as your clearing broker). We refer to such Transactions, if accepted by the designated clearinghouse as "cleared Transactions". The consequences of a Transaction not being accepted by a clearing broker or clearinghouse will be governed by applicable law and the terms of any agreement between you and us. You should be aware that an agreement on the terms of a Transaction for give-up or clearing that is not accepted by the clearing broker or clearinghouse might result in there not being an outstanding Transaction between you and us, although governing documentation or applicable law may provide for the payment of compensation amounts to us in such circumstances.

With respect to cleared Transactions, you will have exposure to the credit and operational risks of your clearing broker and the clearinghouse. Applicable law and clearinghouse rules may afford some protection from the credit and operational risks of your clearing broker for funds that you have deposited or earned with respect to cleared Transactions. You should familiarize yourself with these protections, particularly in the event of the insolvency or bankruptcy of your clearing broker. The extent to which you may be able to recover your funds or property in the event of the insolvency of your clearing broker will depend on, among other factors, the following features of applicable laws, regulations, rules and security arrangements:

- requirements, if any, to segregate your funds from those of the clearing broker and its other customers;
- restrictions, if any, on the use of such funds by the clearinghouse and other depositories, including whether the funds may be used to satisfy obligations owed by the clearing broker or its other customers;
- whether applicable arrangements confer a beneficial, security or other interest in property held by or due from the clearinghouse, or property under the control of the clearing broker;
- the priority of your claim to such property relative to other customers, the clearinghouse and general creditors of the clearing broker; and
- arrangements, if any, for, and legal restrictions on, the portability of Transactions and associated collateral.

You should be aware that for cleared Transactions you may not have the ability to instruct the clearinghouse regarding the disposition of your Transactions or funds, and that upon a clearing member's default, the clearinghouse will deal with your funds and Transactions in accordance with its default management procedures, which may include the ability to terminate all cleared Transactions.

Once a Transaction is accepted for clearing and becomes a cleared Transaction, none of your executing dealer, your named counterparty (if there was a prior outstanding Transaction that was

novated to the clearinghouse), or any of their respective guarantors or other credit support providers, if any, will have any further contractual obligation to you with respect to such Transactions, unless otherwise agreed.

Upon entering into any Transaction with your named counterparty, your ability to subsequently clear such Transactions through a clearinghouse or to novate your position in an uncleared Transaction to another dealer or market participant, and the cost thereof to you or the value you may receive in connection with any such novation, may be influenced by the creditworthiness of your named counterparty and, if applicable, any guarantor or other credit support provider for your named counterparty. Your ability to clear or novate a Transaction may be materially adversely impaired if one or more clearinghouses, other clearing brokers, dealers or other market participants, as the case may be, refuse to extend credit to your named counterparty (whether on a secured or margined basis or otherwise), or if credit limits, position limits, or other limits for your named counterparty (including any guarantor or other credit support provider, if applicable) would be exceeded.

## vi. Third party custodian collateral risk

Third party custodian collateral risk is the risk that if you or any guarantor or credit support provider posts collateral in connection with the Transactions that is held in an account at a third-party custodian, then the return of such collateral is subject to the credit and operational risks of that third-party custodian. Such risks may or may not have been expressly allocated between the parties in the terms of the Transaction and other governing documentation. If such third-party custodian were to default in its obligations to return that collateral when due, you (or, if applicable, your guarantor or credit support provider) could suffer substantial economic losses.

Similar risks, and considerations regarding their allocation, apply if your named counterparty or any guarantor or credit support provider for your named counterparty agrees to post collateral to you in connection with the Transactions that is to be held at a third-party custodian. Your ability to realize upon that collateral is subject to the credit and operational risks of that third-party custodian, and you could suffer substantial economic losses if that custodian breaches its custodial obligations. You also will be exposed to the credit risk of any issuer or obligor of any instrument comprising such collateral.

Regardless of which party may be delivering collateral, if the third party custodian takes other action to resolve uncertainty regarding its duties with respect to the disposition of the collateral, or otherwise fails to act in a timely manner, there could be significant delays in obtaining the return of your collateral or your ability to realize upon our collateral.

## vii. Operational risks

Operational risk is the risk of loss to a party arising from inadequacies in, or failures of, processes, procedures, systems and/or controls for conducting Transactions, including (i) recording, monitoring and quantifying the risks and contractual obligations associated with Transactions, (ii) recording and valuing Transactions and related transactions, (iii) making payments or deliveries, (iv) exercising rights before they expire, including option exercise rights, in a manner that complies with the terms of the relevant Transactions, (v) meeting regulatory filing, reporting and other requirements, or (vi) detecting human error or systems failures, including disaster recovery procedures.

Examples of operational risks include failures to record Transactions or life cycle events (including amendments, transfers, early terminations, or automatic exercises), to obtain quotations or market data needed to make payment, delivery or settlement computations, to give or respond to notices in a timely manner or to review and disaffirm erroneous confirmations before they become binding, and the loss of systems connectivity to, or the failure of, a trading facility or confirmation/affirmation platform.

Losses from operational risks can be substantial, including the loss of the entire value of a Transaction, which may be the case, for example, if an unexercised option expires in-the-money to you. The extent of your exposure to losses from the operational risks of parties not under your control may be determined, in part, by applicable law and/or contractual provisions that allocate or limit liability.

## viii. Legal and documentation risks

Legal and documentation risks include the risks that Transactions or related arrangements may not be legally enforceable, or that their documentation does not correctly reflect a party's understanding. As a result, disputes could arise as to the enforceability of Transactions or related documentation or the intended meaning of documentation terms, or ambiguous terms could be construed by a court or arbitrator in a manner that is materially adverse to a party's expectations. Changing documentation practices, including as a result of the development of new or updated industry standard terms, and their possible non-uniform adoption by market participants, may give rise to documentation basis risk (i.e., the risk that Transactions that are intended to be economically similar may behave differently in certain circumstances due to their incorporation of different documentation terms). Accordingly, parties should monitor evolving documentation practices and be alert to the possibility that new documentation terms may be incorporated through bilateral documentation, industry protocols, or changes in the rules of a confirmation service or trading facility. An industry protocol is typically a multilateral contractual amendment mechanism that allows for various standardized amendments to be made to the relevant existing agreements between any two parties who choose to adhere to the protocol. Industry protocols require adherence on the part of both parties to existing agreements in order for the protocol to apply to the parties' documentation.

The terms of a Transaction may contain new or unique features that may not be fully understood or standard in the market at the time you enter into the Transaction or may no longer be part of the standard terms of a Transaction as the standards evolve. Such features and evolving standards may expose you to various risks, including litigation risk, basis risk (i.e., the risk that otherwise similar Transactions entered into at different times may have different terms) and liquidity risk with respect to your Transaction.

Legal risks also include the risks that Transactions, or activities associated with Transactions, conflict with or violate applicable law (including bankruptcy laws) or the provisions of other contracts or instruments, potentially subjecting a party to legal claims, regulatory proceedings, legal or equitable remedies and/or sanctions.

In the event that your named counterparty to the Transactions or, if applicable, its guarantor or other credit support provider, becomes subject to an insolvency proceeding, the laws governing the insolvency proceeding will have an important bearing on your rights, obligations, remedies and claims under the Transactions. Although applicable insolvency laws may contain protections for

certain contractual rights with respect to qualifying financial contracts, the consequences of our insolvency for you will depend on various factors, including our and your regulatory status, specific applicable law, the characteristics of the Transactions, the terms of any master agreements and credit support arrangements governing the Transactions, the manner in which a court or bankruptcy official exercises its statutory or equitable powers (including, where applicable, to assign or repudiate contracts), and the existence in some jurisdictions or regulatory regimes of mandatory waiting periods to allow contracts to be transferred or assumed before termination rights may be exercised.

If a third party custodian holding your collateral becomes subject to an insolvency proceeding, your ability to recover your collateral will depend on similar factors, including the applicable insolvency regimes, whether the custodian has maintained sufficient unencumbered assets to satisfy claims of other custodial customers, the legal characterization of your relationship with the custodian and the relative priorities and claim amounts of other claimants. Your claim for the return of cash collateral from the third-party custodian may be that of an unsecured creditor.

The protections, if any, afforded to uncleared Transactions and to collateral that you have delivered to us to secure your obligations in connection with uncleared Transactions differ from those applicable to transactions cleared through a clearinghouse. In particular, you should be aware that if the governing documentation for uncleared Transactions effects an outright transfer of title in the collateral to us or permits us to re-use or rehypothecate the collateral, you may lose your proprietary interest in the collateral and have only an unsecured claim for the return of the collateral value remaining after its application to satisfy your obligations to us. Unless otherwise provided by law, you should assume that delivered cash and other collateral is not insured by any government or governmental agency.

You should evaluate these considerations carefully, as well as all other legal, regulatory and documentation issues associated with conducting Transactions, in consultation with your legal advisors.

#### ix. Valuation risk

Valuation risk is the risk that the value of a Transaction may be incapable of being precisely valued. The price and characteristics of a Transaction are individually negotiated between the parties. Because Transactions may not be standardized or publicly traded, their value at any time may not be precisely ascertainable or even well defined. Our pricing models may differ from those of other dealers and may arrive at different values. Our pricing models contain proprietary features. The assumptions and theoretical analyses underlying a pricing model may prove to be incorrect, and the observable market inputs used in the model, which we may obtain from third party sources, may not be representative of current market conditions. We make no representations or warranties regarding the accuracy of information from third party sources. Reported prices for similar transactions, even if they are available, may not be directly comparable due to differences in transaction size, credit or collateral terms or other particular features that may not be ascertainable from the information reported. Consequently, it may be difficult for you to establish an independent value for an outstanding Transaction.

Commodity valuation risk is the risk that the value of a Transaction may be incapable of being precisely valued due to the susceptibility of commodity reference prices to distortion and the potential inaccuracy of data used to determine such commodity reference prices.

Markets in physical commodities are highly differentiated by location, supply and demand, time and manner of delivery, quality standards for deliverable products and other factors. The depth, liquidity and number and nature of participants may vary greatly among segments in the market for the same commodity. Prices prevailing in different segments generally will differ, and historically observed relationships, if any, between prices in different segments or for different commodities may not persist.

The terms of a Commodity Transaction (including certain physically-settled Commodity Transactions) will specify the source or method of determining the prices, levels or values ("commodity reference prices") relevant to the computation of payments and deliveries and the satisfaction of exercise and other conditions, such as automatic exercise and knock-in or knock-out events. Examples of commodity reference prices include price indexes compiled and published by market data providers and prices used to settle exchange-traded or cleared futures or other contracts related to an underlying commodity. You should independently evaluate the appropriateness of the selected commodity reference price(s) to your objectives for entering into a Commodity Transaction, including whether a specified commodity reference price accurately reflects the prevailing cash market fundamentals in a relevant physical market segment and the potential that it may be susceptible to distortion or manipulation.

Market data providers may compile their commodity reference prices from pricing data submitted voluntarily by market participants. You should be aware that price submissions to a market data provider may or may not be based on actual transactions and that the data provider may not be able to audit submissions for their accuracy or completeness. Other factors you should consider include:

- computational procedures used by the market data provider to reduce the impact of potentially unrepresentative data, such as requiring a minimum number of submissions and the rejection of outlying data;
- conflicts of interest that may affect the market data provider;
- the information the market data provider publicly discloses, which may or may not accurately reflect all relevant information available to the market data provider; and
- governance of the market data provider, whether it is subject to regulatory oversight and the nature of such regulatory oversight.

Market data providers may make certain information relevant to this assessment publicly available, and we urge you to consider such information carefully. If we or an affiliate make submissions that are used to compile a commodity reference price and also act as principal in Commodity Transactions that use the commodity reference price as a price underlying our Transaction valuation, then we face an inherent conflict of interest.

Prices of exchange-traded contracts may be affected by the method used for determining the official settlement price, including discretionary determinations of an exchange or clearinghouse settlement committee (on which we or an affiliate may participate), and by market disruption events as described below.

An exchange, clearinghouse, market data provider, government agency or other body that determines a commodity reference price may make methodological or other changes that could

change the value of the commodity reference price, including changes related to the method by which the commodity reference price is calculated, or the timing for publication of the commodity reference price. In addition, the determining body may alter, discontinue or suspend calculation or dissemination of the commodity reference price or change the terms of or de-list a contract that defines a commodity reference price. Determining bodies and the institutions that make submissions in the commodity reference price determination process, which may include us and our affiliates, have no obligation to consider your interests in calculating, revising, discontinuing or taking other actions that may affect any commodity reference price.

## x. Legislative and regulatory risk

Legislative and regulatory risk is the risk that changes to market regulation may impact – whether adversely or not – on many aspects of a Transaction, resulting in considerations (including those relating to the economic viability of the Transaction) initially deemed material to the entering into of the Transaction being deemed irrelevant, or new considerations being deemed relevant.

As part of global governmental and private sector efforts to stabilize and reform financial markets, changes in the regulation of persons who engage in Transactions and the regulations surrounding underlying assets, derivatives and their related markets have been considered, proposed, adopted, and/or implemented. For example, the European Market Infrastructure Regulation and the recast Markets in Financial Instruments Directive establishes a more comprehensive regulatory framework for Transactions. Amongst various other things, such regulation provides for the mandatory clearing and trading on regulated markets of certain derivatives, the reporting of certain Transactions, additional transparency arrangements, the imposition of position limits and the mandatory registration with national and supranational regulators of a wider class of market participants. It is anticipated that promulgation of new rules will be followed by periods in which the meaning and application of rules will be evolving. Further and unforeseeable changes may result. The regulatory changes and resulting requirements of the Dodd-Frank Act in the USA, the European Market Infrastructure Regulation, the recast Markets in Financial Instruments Directive, and the global Basel III framework and similar international reform efforts may limit or restrict, or increase the costs of, engaging in Transactions and related activities for us, you (e.g., the costs to you of obtaining and maintaining a legal entity identifier and complying with recordkeeping obligations, if applicable) and/or other market participants with which you may wish to transact.

It is difficult to predict the precise impact of such regulations or the likelihood of proposed regulations being adopted, but these regulations could significantly increase compliance costs, cause significant and unexpected market disruptions, or adversely affect liquidity, valuations or volatility in the markets of underlying assets. Any of these consequences could in turn adversely affect the economic viability of a Transaction or, subject to the terms of the Transaction and other governing documentation, result in the termination of affected Transactions at unfavourable and unforeseeable prices or values.

## xi. Packaged transaction risk

Packaged transaction risk is the risk that arises where the individual Transactions making up a packaged transaction (i.e. a transaction involving two or more Transactions intended to behave in an integrated manner) behave in a manner unexpected to that intended at the outset of the packaged transaction, resulting in unintended and potentially adverse financial consequences.

With packaged transactions, each constituent Transaction may be documented, either separately or together with a single confirmation, as a combination of component Transactions, such as a 3-way energy option that involves the buying and simultaneous selling of a combination of options, or a refinery margin where crude is bought or sold and multiple refined petroleum products are sold or bought. You should review the terms of such combined Transactions and consider the possibility that termination events, disruption fallbacks, adjustments, extraordinary events and other important terms may not apply identically to each of the component Transactions, which may adversely affect the economic rationale of the combined Transaction. For example, if one of the component Transactions is a cleared Transaction but the other component Transactions are not, the cleared Transaction will be subject to the rules and procedures of the applicable clearinghouse, which may lead to differences between the component Transactions that were not intended. Furthermore, when you seek to unwind the combined Transaction, you may have to unwind the component Transactions on different terms or at different times which may lead to a different combined payout than expected.

You should refer to section 2 – The Nature/Characteristics of Derivatives – for important disclosures about the component Transactions. You should also consider carefully the relationships between the component Transactions and between the applicable asset classes noted in section 2, which may cause the characteristics and risks of the combination of Transactions to differ from what may be expected based on the individual characteristics and risks of each component Transaction.

# 3.2 Further material risks specific to Commodity Transactions

The following risks described are specific to all Commodity Transactions which may be in addition to the risks outlined above.

## i. Volatility risk

Volatility risk is the risk that commodity prices may change unpredictably, affecting the value of commodities or commodity indexes in unforeseeable ways – it is intrinsically linked to market risk as the factors giving rise to volatility risk may give rise to the market risks described in section 3.1.i – Market Risks. Similarly, the crystallisation of market risks is likely to give rise to excessive volatility. The value of commodities may then impact on, or give rise to, additional market risks. For instance, technological change may impact upon the spot prices for a commodity, which may then impact upon the market in that Commodity Transaction. Market prices may fluctuate rapidly based on numerous factors, including:

- changes in supply and demand relationships (whether actual, perceived, anticipated, unanticipated or unrealized);
- weather;
- agriculture;
- trade;
- fiscal, monetary and exchange control programs;

- domestic and foreign political and economic events and policies;
- disease;
- pestilence;
- technological developments;
- changes in interest rates, whether through governmental action or market movements; and
- monetary and other governmental policies, action and inaction.

The current or "spot" prices of physical commodities may also affect, in a volatile and inconsistent manner, the prices of futures contracts in respect of a commodity. These factors may affect the value of the commodity or a commodity index, and therefore the value of the Commodity Transaction, and may cause such values to move in a sudden and unexpected manner.

## ii. Supply and demand risk

Supply of and demand for physical commodities tends to be particularly concentrated, so prices are likely to be volatile.

The prices of physical commodities can fluctuate widely due to supply and demand disruptions in major producing or consuming regions or industries.

Certain commodities are used primarily in one industry, and fluctuations in levels of activity in (or the availability of alternative resources to) one industry may have a disproportionate effect on global demand for a particular commodity. Political, economic and other developments that affect that industry may affect the value of a commodity.

In addition, because certain commodities may be produced in a limited number of countries and may be controlled by a small number of producers, political, economic and supply-related events in such countries or with such producers could have a disproportionate impact on the prices of such commodities.

Suspension or disruptions of market trading in commodities and related futures contracts may adversely affect the value of commodities.

Commodity markets are subject to temporary distortions or other disruptions due to various factors, including the lack of liquidity in the markets, the participation of speculators and government regulation and intervention.

In addition, some exchanges have regulations that limit the amount of fluctuation in some futures contract prices that may occur during a single business day. These limits are generally referred to as "daily price fluctuation limits" and the maximum or minimum price of a contract on any given day as a result of these limits is referred to as a "limit price".

Once the limit price has been reached in a particular contract, no trades may be made at a price beyond the limit, or trading may be limited for a set period of time. Limit prices have the effect of precluding trading in a particular contract or forcing the liquidation of contracts at potentially disadvantageous times or prices.

These circumstances could adversely affect the value of any commodity or commodity index and therefore any related Commodity Transaction.

## iii. Market disruption risk

Market disruption risk is the risk that certain disruption events arising from the market or market participants will impact on the economic rationale and viability of the Commodity Transaction by altering the method of determining the affected commodity reference price.

The terms of a Commodity Transaction may specify that certain events and conditions affecting the market for a commodity or related exchange-traded or cleared contract, or a price source, will be treated as market disruptions and their occurrence may result in the consequences discussed below (see "Consequences of Disruption Events" within this section below), including, if applicable, postponement of pricing dates and/or changes in the method by which the price, level or value of an underlying reference point is determined. Subject to the terms of a Commodity Transaction and the governing documentation, such events may include:

- failure of a price source to publish a price, discontinuance of the price source or cessation of trading of the underlying asset;
- divergences by more than a specified amount of alternative price sources from one another, such as between a price published by a market data provider and one derived from quotations obtained by the calculation agent from reference dealers;
- inability of the calculation agent to obtain quotations from the requisite number of reference dealers;
- suspension of or limitations on trading in an underlying contract or related instruments, including the triggering of price fluctuation limits, the establishment by a regulator of price caps, or the unscheduled early closing of a market for an underlying contract or related instruments (including market closure due to technological failures or force majeure events);
- changes in the method for determining a commodity reference price or in the composition of an underlying contract or related instruments; and
- the imposition of, change in or removal of certain taxes on positions in the underlying contract.

The existence of such disruption events and their consequences may be subject to discretionary determinations by the determining party or calculation agent, which may involve subjective judgment and uncertainty.

You should be aware of the potential risks of any market disruptions and should understand their effect on each prospective Commodity Transaction, including the consequences, if any, of any such event specified under the terms of the Commodity Transaction as well as the possibility that certain events might not be expressly provided for.

## iv. Physical settlement risk

If you enter into a physically settled Commodity Transaction, you (either directly or through a third party acting on your behalf) must have the operational capabilities to make or take delivery of the underlying commodity in accordance with the terms of the Commodity Transaction and you should be thoroughly familiar with delivery practices, procedures, customs and usages of the physical market and the governing contractual provisions, laws and regulations. Issues with which you should be familiar include, as applicable:

- delivery instruments (e.g., warehouse receipts, bills of lading, warehouse releases, LME warrants, consignment agreements or other instruments);
- the time and location at which title to the underlying commodity and/or risk of loss passes to the recipient;
- the conditions, if any, under which delivery may be excused, delayed or prevented;
- quality or quantity discrepancies with respect to a delivered commodity;
- the possibility that congestion in the deliverable supply of a commodity could prevent you
  from acquiring the commodity to meet your delivery obligations or make it significantly more
  costly for you to do so;
- the consequences of failing to make or take delivery in accordance with the terms of a
   Commodity Transaction, including the applicable measure of damages and additional
   liabilities such as borrowing costs, imbalance charges, storage, transportation costs such as
   demurrage, regulatory penalties, and other costs, damages or expenses recoverable in a
   particular Commodity Transaction;
- various modes of delivering or transporting the commodity subject to a Commodity
  Transaction and related legal instruments (e.g., rail/trucking and other freight and handling
  agreements, container line contracts of carriage, charter parties and contracts of
  affreightment), as well as any regulatory, health and safety, compliance and other related
  procedures, rules, tariffs and regulations incident thereto;
- indemnification obligations of the parties, including with respect to title defects and liabilities to third parties;
- limitations on liability or exclusions thereto, if any;

- features of transmission, transportation or electronic tracking systems generally, including, in particular, those that may result in mis-delivery or under-delivery and the process for reconciling outstanding balances among users of the system and between us under a Commodity Transaction;
- availability of insurance and scope of applicable policy coverage;
- settlement risk when payment dates occur after delivery dates; and
- in the case of physically settled Commodity Transactions subject to the rules of an exchange or clearinghouse, the rules and procedures governing delivery, including notice requirements and the procedures for matching long and short positions for delivery.

You should be aware, however, that not all contracts or transactions with such physical delivery features are Commodity Transactions or Transactions and that various differences in the applicable regulatory regimes and other circumstances may follow from this distinction.

#### 4 RISKS OF TITLE TRANSFER COLLATERAL ARRANGEMENTS

When you transfer money to us, or money is paid to us on your behalf, the full ownership of the money is transferred to us for the purpose of securing or otherwise covering any obligations you have to us in respect of a Transaction. As a result, money transferred to us will not be held in accordance with the client money rules set out in the FCA's Handbook from time to time. Instead, such money will be an unsecured amount owed by us to you and will not be held on your behalf (whether in a segregated account or otherwise). This means that we can deal with such money as our own and consequently, there are certain risks attached to such arrangements.

In the event of our insolvency, you will only have an unsecured claim against us for repayment of that money, and such claim will be subject to the exercise by us of any set-off rights that we may have under any agreement that we may enter into with you, or otherwise under general and applicable law.

There is a risk that your obligations to us become over-collateralised. This means that the amounts you have paid us are in excess of your obligations to us. In such an event, we will, in our discretion, transfer an equivalent amount of money back to you. Any retransfer amounts will be subject to any set-off rights that we may have under any agreement that we may enter into with you, or otherwise under general and applicable law.

You should also note that, conversely to security arrangements, in title transfer collateral arrangements, the retransfer to you of money may give risk to potential capital gains or stamp duty charges. You should seek independent tax advice from a tax advisor as to the effect of such arrangements if you have concerns.