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(TO PROSPECTUS SUPPLEMENT AND PROSPECTUS EACH DATED APRIL 7, 2017)
MEDIUM-TERM SENIOR NOTES, SERIES N

Issued by Citigroup Global Markets Holdings Inc.

All payments due on the securities fully and unconditionally guaranteed by Citigroup Inc.

$1,000,000,000±± VelocityShares® Long LIBOR ETNs due August 16, 2032 (the "**Long LIBOR ETNs**")

$500,000,000±± VelocityShares® Short LIBOR ETNs due August 16, 2032 (the "**Short LIBOR ETNs**")

ETNs	Exchange Ticker	Indicative Value Ticker	CUSIP	ISIN
Long LIBOR ETNs	ULBR	ULBRIV	17325K743	US17325K7431
Short LIBOR ETNs	DLBR	DLBRIV	17325K529	US17325K5294

We are offering two separate series of exchange traded notes (collectively, the "**ETNs**"), each linked to a Janus Velocity LIBOR Index (each, an "**Index**"). The Long LIBOR ETNs are linked to the Janus Velocity Long LIBOR Index (the "**Long LIBOR Index**"). The Short LIBOR ETNs are linked to the Janus Velocity Short LIBOR Index (the "**Short LIBOR Index**").

- The **Long LIBOR Index** aims to approximate the daily performance of a hypothetical long investment in the composite forward LIBOR rate, as if the composite forward LIBOR rate itself were an asset that could be invested in. It does so by tracking the return on a hypothetical short position in Eurodollar futures contracts, where that position is recalibrated daily to result in a return over the next Index Business Day that approximates the percentage change in the composite forward LIBOR rate over that next day, subject to the long LIBOR floor. If the composite forward LIBOR rate is less than the long LIBOR floor of 1.00% on any Index Business Day, the Long LIBOR Index will aim to approximate only a portion of (referred to as the "targeted participation" in) the percentage change in the composite forward LIBOR rate over the next day.
  - For example, suppose the composite forward LIBOR rate decreases from 1.00% on one Index Business Day to 0.90% on the next. Because the composite forward LIBOR rate on the first day is not below the long LIBOR floor, the Long LIBOR Index would have a 100% targeted participation in the percentage change in the composite forward LIBOR rate over the next day. In this example, the 0.10% absolute change would represent a 10% percentage decrease in the composite forward LIBOR rate (since 0.10% is 10% of 1.00%), and the Long LIBOR Index would aim to decline by approximately 10% (subject to the effects of carry and the contract spread described below).
  - Now suppose the composite forward LIBOR rate increases from 0.50% on one Index Business Day to 0.55% on the next. Because the composite forward LIBOR rate on the first day is below the long LIBOR floor, the Long LIBOR Index would have less than 100% targeted participation (in this case, 50% targeted participation) in the percentage change in the composite forward LIBOR rate over the next day. In this example, the 0.05% absolute change would represent a 10% percentage increase in the composite forward LIBOR rate (since 0.05% is 10% of 0.50%), and the Long LIBOR Index would aim to increase by approximately 5% (which is 50% of 10%), subject to the effects of carry and the contract spread described below.
- The **Short LIBOR Index** aims to approximate the daily performance of a hypothetical short position in the composite forward LIBOR rate, as if the composite forward LIBOR rate itself were an asset that could be shorted. It does so by tracking the return on a hypothetical long position in Eurodollar futures contracts, where that position is recalibrated daily to result in a return over the next Index Business Day that approximates the *inverse* of the percentage change in the composite forward LIBOR rate over that next day, subject to the short LIBOR floor. If the composite forward LIBOR rate is less than the short LIBOR floor of 2.50% on any Index Business Day, the Short LIBOR Index will aim to approximate only a portion of (referred to as the "targeted participation" in) the inverse of the percentage change in the composite forward LIBOR rate over the next day.
  - For example, suppose the composite forward LIBOR rate increases from 2.50% on one Index Business Day to 2.60% on the next. Because the composite forward LIBOR rate on the first day is not below the short LIBOR floor, the Short LIBOR Index would have a 100% targeted participation in the inverse of the percentage change in the composite forward LIBOR rate over the next day. In this example, the 0.10% absolute change would represent a 4% percentage increase in the composite forward LIBOR rate (since 0.10% is 4% of 2.50%), and the Short LIBOR Index would aim to decline by approximately 4% (subject to the effects of carry and the contract spread described below).
  - Now suppose the composite forward LIBOR rate decreases from 1.25% on one Index Business Day to 1.20% on the next. Because the composite forward LIBOR rate on the first day is below the short LIBOR floor, the Short LIBOR Index would have less than 100% targeted participation (in this case, 50% targeted participation) in the inverse of the percentage change in the composite forward LIBOR rate over the next day. In this example, the 0.05% absolute change would represent a 4% percentage decrease in the composite forward LIBOR rate (since 0.05% is 4% of 1.25%), and the Short LIBOR Index would aim to increase by approximately 2% (which is 50% of 4%), subject to the effects of carry and the contract spread described below.

The **composite forward LIBOR rate** on each day is equal to the weighted average of the forward 3-month U.S. dollar LIBOR rates implied in the daily settlement prices of the next 8 quarterly Eurodollar futures contracts, where these contracts have a weighted average tenor of approximately one year. Eurodollar futures contracts are interest rate futures whose trading prices imply market expectations about 3-month U.S. dollar LIBOR rates in the future, which we refer to as implied forward LIBOR rates. As described in more detail in "Information About Eurodollar Futures Contracts" below, there is an inverse relationship between the price of a Eurodollar futures contract and its implied forward LIBOR rate. Eurodollar futures contracts are not related to the Euro currency and do not have currency exposure.

It is important to understand that each Index only aims to "approximate" its targeted participation in the daily percentage change in the composite forward LIBOR rate (or the inverse thereof, in the case of the Short LIBOR Index). The daily performance of each Index will differ from its

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targeted participation in the daily percentage change (or the inverse thereof, in the case of the Short LIBOR Index) in the composite forward LIBOR rate because of the effects of carry and the contract spread. In addition, over any period longer than one day, the Indices may experience a decay effect. The effects of carry, decay and the contract spread accumulate over time and can cause a significant deviation over time between the performance of the applicable Index and its targeted participation in the percentage change (or inverse thereof) in the composite forward LIBOR rate. As a result, the ETNs are intended only for short-term trading. Furthermore, the return on your ETNs will differ from the performance of the applicable Index because of certain costs included in the terms of the ETNs, including a Daily Investor Fee, Early Redemption Charge and creation fee. See "Risk Factors", "Description of the Janus Velocity LIBOR Indices" and "Specific Terms of the ETNs" in this pricing supplement.

The ETNs have been listed on the NYSE Arca under the exchange ticker symbols set forth in the table above. As long as an active secondary market in the ETNs exists, we expect that investors will purchase and sell the ETNs primarily in this secondary market. However, we have no obligation to maintain any listing on the NYSE Arca or any other exchange.

The ETNs are not intended to be "buy and hold" investments. The ETNs are intended to be short-term trading tools for sophisticated investors to manage short-term trading risks. The Indices are designed to approximate their stated investment objectives on a daily basis, and their performance over longer periods of time can differ significantly from their stated daily objectives. The ETNs are riskier than securities that have longer-term investment objectives. Any decision to hold the ETNs for more than one day should be made with great care and only as the result of a series of daily (or more frequent) investment decisions to remain invested in the ETNs for the next one-day period. Accordingly, the ETNs should be purchased only by sophisticated investors who understand and can bear the potential risks and consequences associated with a short-term investment based on the composite forward LIBOR rate and that may be subject to the effects of carry and decay, may be highly volatile and may experience significant losses, up to the entire amount invested, in a short period of time. Investors should actively and frequently monitor their investments in the ETNs, even intra-day. ***It is possible that you will suffer significant losses in the ETNs even if the performance of the composite forward LIBOR rate over the time you hold the ETNs is positive, in the case of the Long LIBOR ETNs, or negative, in the case of the Short LIBOR ETNs.***

Investing in the ETNs involves significant risks. See "Risk Factors" beginning on page PS-8 of this pricing supplement.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined that this pricing supplement is truthful or complete. Any representation to the contrary is a criminal offense.

Citigroup Global Markets Inc. ("**CGMI**"), an affiliate of ours, is the agent for this offering. We have issued and sold a portion of the ETNs to CGMI on the Initial Settlement Date and received proceeds equal to 100% of their Closing Indicative Value as of the Inception Date. For any ETNs we issue and sell after the Initial Settlement Date, we expect to receive proceeds equal to 100% of their Indicative Value at the time we price the sale of the ETNs to CGMI. CGMI may offer and sell ETNs from time to time as principal to investors and to dealers at a price based on the Indicative Value at the time of sale. Dealers may in turn offer and sell ETNs to investors at market prices prevailing at the time of sale, at prices related to market prices or at negotiated prices. We will not pay any commissions or underwriting fees to CGMI or any other dealer. For any ETNs it sells, CGMI is expected to charge to purchasers a creation fee of up to approximately 0.15% *times* the Indicative Value at which CGMI prices the sale of such ETNs, *provided however* that CGMI may from time to time increase or decrease the creation fee. In exchange for providing certain services relating to the distribution of the ETNs, CGMI, a member of the Financial Industry Regulatory Authority ("**FINRA**"), or another FINRA member may receive all or a portion of the Daily Investor Fee described below. In addition, CGMI will charge investors an Early Redemption Charge of 0.20% *times* the Closing Indicative Value on the Early Redemption Valuation Date of any ETN that is redeemed at the investor's option. CGMI and its affiliates may also profit from expected hedging activity related to these offerings, even if the value of the ETNs declines. Please see "Supplemental Plan of Distribution (Conflicts of Interest)" in this pricing supplement for more information.

The ETNs are not deposits or savings accounts but are unsecured debt obligations of Citigroup Global Markets Holdings Inc. guaranteed by Citigroup Inc. The ETNs and the guarantee of the ETNs by Citigroup Inc. are not insured or guaranteed by the Federal Deposit Insurance Corporation or by any other governmental agency or instrumentality.

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± This amended and restated pricing supplement amends and restates and supersedes Pricing Supplement No. 2017—USNCH0609 dated August 15, 2017 and Pricing Supplement No. 2017—USNCH0610 dated August 15, 2017. We refer to this amended and restated pricing supplement as the "pricing supplement".

±± Reflects the aggregate stated principal amount of such ETNs offered hereby (corresponding to 40,000,000 ETNs in the case of the Long LIBOR ETNs and 20,000,000 ETNs in the case of the Short LIBOR ETNs). As of December 18, 2017, we expect there to be issued and outstanding the following:

- $1,300,000 in stated principal amount of Long LIBOR ETNs (52,000 ETNs), outstanding and held by the public and $8,700,000 in stated principal amount of Long LIBOR ETNs (348,000 ETNs) outstanding and held in inventory.
- $620,275 in stated principal amount of Short LIBOR ETNs (24,811 ETNs), outstanding and held by the public and $3,129,725 in stated principal amount of Short LIBOR ETNs (125,189 ETNs) outstanding and held in inventory.

General

The ETNs are medium-term senior notes of Citigroup Global Markets Holdings Inc., guaranteed by Citigroup Inc., maturing August 16, 2032 (the "**Maturity Date**"). The ETNs are intended to be short-term trading tools and are not intended to be held to maturity.

The initial issuance of ETNs of each series priced on August 15, 2017 (the "**Inception Date**") and settled on August 18, 2017 (the "**Initial Settlement Date**").

The ETNs are designed for investors who seek exposure to the daily performance of the applicable Index. The ETNs do not guarantee any return of principal and do not pay any interest during their term. For each ETN, investors will be entitled to receive a cash payment at maturity, upon early redemption or upon acceleration, as applicable, that will be linked to the performance of the applicable Index, *plus* a Daily Accrual and *less* a Daily Investor Fee and, if applicable, Early Redemption Charge (each as defined herein). Investors should be willing to forgo interest payments and, if the applicable Index declines, be willing to lose up to 100% of their investment. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

The exchange ticker, denomination and stated principal amount per ETN for each series of ETNs is set forth below. ETNs may be sold by us to CGMI, and by CGMI to investors or dealers, at a price that is higher or lower than the stated principal amount, based on the most recent Indicative Value of the ETNs. For information regarding potential splits or reverse splits of the ETNs, see "Specific Terms of the ETNs—Split or Reverse Split of the ETNs" herein.

ETNs	Exchange Ticker	Denomination and Stated Principal Amount per ETN
Long LIBOR ETNs	ULBR	$25.00
Short LIBOR ETNs	DLBR	$25.00

Delivery of the ETNs in book-entry form only will be made through The Depository Trust Company ("**DTC**"). Any further issuances of ETNs of any series will form a single series with the offered ETNs of such series, will have the same CUSIP number and will trade interchangeably with the offered ETNs of such series upon settlement. Any further issuances and sales will increase the outstanding number of the applicable series of the ETNs. See "Supplemental Plan of Distribution (Conflicts of Interest)" in this pricing supplement for further information.

If there is a substantial demand for the ETNs, we may issue and sell additional ETNs to CGMI, and CGMI may sell such ETNs to investors and dealers, frequently. However, we and CGMI are under no obligation to issue or sell additional ETNs of any series at any time, and if we and CGMI do issue and sell additional ETNs of any series, we or CGMI may limit or restrict such sales, and we may stop and subsequently resume selling additional ETNs of such series at any time. Furthermore, the stated principal amount of each series of ETNs stated at the top of the cover page of this pricing supplement is the maximum amount of each series of ETNs that we have currently authorized for issuance. Although we have the right to increase the authorized amount of either series of ETNs at any time, it is our current intention not to issue more than the current maximum authorized amount of each series of ETNs, even if there is substantial market demand for additional ETNs of such series. We may also reduce the maximum authorized amount of each series of ETNs at any time and have no obligation to issue up to the maximum authorized amount.

Any limitation or suspension on the issuance or sale of the ETNs by us or CGMI may materially and adversely affect the price and liquidity of the ETNs in the secondary market. Alternatively, the decrease in supply may cause an imbalance in the market supply and demand, which may cause the ETNs to trade at a premium over the Indicative Value of the ETNs. Any premium may be reduced or eliminated at any time. Paying a premium purchase price over the Indicative Value of the ETNs could lead to significant losses in the event the investor sells such ETNs at a time when such premium is no longer present in the marketplace or such ETNs are accelerated, including at our option, which we have the discretion to do at any time. If we accelerate the ETNs of any series at our option, investors will receive a cash payment in an amount equal to the Closing Indicative Value on the final Valuation Date of an Optional Acceleration Valuation Period, which will not include any premium. Investors should consult their financial advisors before purchasing or selling the ETNs, especially ETNs trading at a premium over their Indicative Value.

We are not obligated to maintain the listing of the ETNs on the NYSE Arca or any other exchange. The ETNs may cease to be listed on the NYSE Arca or any other exchange because they cease to meet the listing requirements of the exchange or because we elect in our sole discretion to discontinue the listing of the ETNs on any exchange. We may elect to discontinue the listing of the ETNs at any time and for any reason, including in connection with a decision to discontinue further issuances and sales of the ETNs. If the ETNs cease to be listed on the NYSE Arca or any other exchange, the liquidity of the ETNs is likely to be significantly adversely affected and the ETNs may trade at a significant discount to their Indicative Value.

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Any limitation or suspension on the issuance of the ETNs and any delisting of the ETNs will not affect the early redemption right of holders as described herein. However, an investor will not be able to exercise that right unless the investor submits for redemption at least the minimum number of ETNs specified below.

Janus Distributors LLC, doing business as Janus Henderson Distributors ("**JHD**"), or its affiliates will receive a portion of the Daily Investor Fee in consideration for its role in marketing and placing the ETNs under the "VelocityShares®" brand. Janus Index & Calculation Services, LLC ("**JICS**") will receive a portion of the Daily Investor Fee for the license of certain intellectual property in connection with the Indices. See "Supplemental Plan of Distribution (Conflicts of Interest)" in this pricing supplement for further information.

This pricing supplement provides specific pricing information in connection with the issuance of each series of the ETNs. Prospective investors should read this pricing supplement together with the accompanying prospectus supplement and prospectus for a description of the specific terms and conditions of the ETNs. This pricing supplement amends and supersedes the accompanying prospectus supplement and prospectus to the extent that the information provided in this pricing supplement is different from the terms set forth in the prospectus supplement or the prospectus.

CGMI may from time to time purchase outstanding ETNs of any series in the open market, in connection with early redemptions or in other transactions, and CGMI may use this pricing supplement together with the accompanying prospectus supplement and prospectus in connection with resales of some or all of the purchased ETNs in the secondary market.

Key Terms

Issuer: Citigroup Global Markets Holdings Inc., a wholly owned subsidiary of Citigroup Inc.

Guarantee: All payments due on the ETNs are fully and unconditionally guaranteed by Citigroup Inc.

Index: The return on the ETNs of each series will be based on the daily performance of the applicable Index specified below during the term for such series of ETNs. Each Index is provided by Janus Index & Calculation Services, LLC (the "**Index Sponsor**" or "**JICS**"). The Index Sponsor has retained Solactive AG to calculate and publish the level of each Index on each Index Business Day (in that role, the "**Index Calculation Agent**"). The level of each Index is published on Bloomberg under the ticker specified in the table below. See "Description of the Janus Velocity LIBOR Indices" in this pricing supplement for further information about each Index.

ETNs	Index	Index Ticker
Long LIBOR ETNs	Janus Velocity Long LIBOR Index	ULBRID
Short LIBOR ETNs	Janus Velocity Short LIBOR Index	DLBRID

An Index, or any successor index or substitute index, may be modified, replaced or adjusted from time to time, as determined by the ETN Calculation Agents (defined below) as set forth below. The ETN Calculation Agents may modify, replace or adjust an Index under certain circumstances even if the Index Sponsor continues to publish the applicable Index without modification, replacement or adjustment. See "Risk Factors—The ETN Calculation Agents may perform their own calculation of the level of an Index if it is discontinued or if the ETN Calculation Agents determine that there has been a change in the applicable Index or the futures contracts included in the applicable Index" and "Specific Terms of the ETNs—Discontinuation or Modification of an Index; Substitution of an Index" in this pricing supplement for further information.

If the 3-month U.S. dollar LIBOR rate is or will be discontinued or its status as an economic benchmark is significantly diminished and an alternative rate exists that is regarded by market participants as a successor or substitute for 3-month U.S. dollar LIBOR for any relevant purpose, the ETN Calculation Agents may substitute an alternative index tracking futures contracts on such alternative rate for the applicable Index under the terms of the ETNs. See "Risk Factors—If the 3-month U.S. dollar LIBOR rate is discontinued or its status as an economic benchmark is significantly diminished, the ETNs may become based on an alternative to 3-month U.S. dollar LIBOR and/or to Eurodollar futures contracts, and in such event the ETNs may perform unpredictably and unfavorably" in this pricing supplement.

Closing Indicative Value: Any payment on the ETNs, whether upon early redemption, acceleration or at maturity, will be based on the Closing Indicative Value of the applicable series of ETNs on one or more Valuation Dates, as described herein. The Closing Indicative Value for each series of ETNs on the Inception Date was $25.00. The Closing Indicative Value on December 18, 2017 per $25.00 stated principal amount of the Long LIBOR ETNs is $29.94. The Closing Indicative Value on December 18, 2017 per $25.00 stated principal amount of the Short LIBOR ETNs is $21.75. The Closing Indicative Value on each calendar day following the Inception Date for each series of ETNs will equal:

- For each calendar day prior to the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, (1)(a) the Closing Indicative Value for such series of ETNs on the immediately preceding calendar day *times* (b) the Daily ETN Performance for such series of ETNs on such calendar day *minus* (2) the Daily Investor Fee for such series of ETNs on such calendar day.
- For each calendar day during the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, the sum of (1) the Index Exposure and (2) the Notional Cash Amount on such calendar day.

The Closing Indicative Value will never be less than zero. If any series of ETNs undergoes a split or reverse split, the Closing Indicative Value for such series of ETNs will be adjusted accordingly (see "Specific Terms of the

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ETNs—Split or Reverse Split of the ETNs" in this pricing supplement). JICS or its agent is responsible for computing and disseminating the Closing Indicative Value, subject to CGMI's right to dispute JICS' calculation of the Closing Indicative Value, in which case, if the ETN Calculation Agents are unable to agree, CGMI's determination of the Closing Indicative Value shall be conclusive and binding.

The Closing Indicative Value of each series of ETNs on each Index Business Day is based on the closing level of the applicable Index on that Index Business Day. The closing level of each Index on each Index Business Day is determined based on the daily settlement prices of the Eurodollar futures contracts underlying that Index, which are determined as of 3:00 p.m., New York City time, on each Index Business Day. Although the daily settlement prices are determined as of 3:00 p.m., there is typically a time lag in the publication of the daily settlement prices, and the closing level of each Index based on those daily settlement prices is typically not published until after the close of trading for the ETNs on the NYSE Arca. Accordingly, the Closing Indicative Value of each series of ETNs will also not be published until after the close of trading for the ETNs on the NYSE Arca, but will be based on the daily settlement prices of the applicable Eurodollar futures contracts as of 3:00 p.m.

Daily ETN Performance: The Daily ETN Performance for any series of ETNs on any Index Business Day will equal (1) one *plus* (2) the Daily Accrual for such series of ETNs on such Index Business Day *plus* (3) the Daily Index Performance for such series of ETNs on such Index Business Day. The Daily ETN Performance for any series of ETNs is deemed to equal one on any day that is not an Index Business Day.

Daily Accrual: The Daily Accrual represents the rate of interest that could be earned on a notional capital reinvestment at the three month U.S. Treasury rate as reported on Bloomberg under ticker USB3MTA (or any successor ticker on Bloomberg or any successor service). The Daily Accrual for any series of ETNs on any Index Business Day will equal:

$$\left(\frac{1}{1 - Tbills_{t-1} * \frac{91}{360}}\right)^{\frac{d}{91}} - 1$$

where $Tbills_{t-1}$ is the three month U.S. Treasury rate reported on Bloomberg on the prior Index Business Day and *d* is the number of calendar days from and including the immediately prior Index Business Day to but excluding the date of determination. The Daily Accrual for any series of ETNs is deemed to equal zero on any day that is not an Index Business Day.

Daily Index Performance: The Daily Index Performance for any series of ETNs on any Index Business Day will equal, except as otherwise provided herein, (1)(a) the closing level of the applicable Index on such Index Business Day *divided by* (b) the closing level of the applicable Index on the immediately preceding Index Business Day *minus* (2) one. If a Market Disruption Event occurs or is continuing on any Index Business Day or occurred or was continuing on the immediately preceding Index Business Day with respect to any series of ETNs, the ETN Calculation Agents will determine the Daily Index Performance for such series of ETNs on each such Index Business Day by calculating and using an appropriate alternative closing level of the applicable Index for each such Index Business Day taking into account the nature and duration of such Market Disruption Event. The ETN Calculation Agents will calculate such alternative closing level without giving effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology during the continuance of the Market Disruption Event. In addition, on each Valuation Date after the first Valuation Date of the Final Valuation Period or an Optional Acceleration Valuation Period, the Daily Index Performance will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Valuation Period begins. See "Specific Terms of the ETNs" for more information. The Daily Index Performance for any series of ETNs is deemed to equal zero on any day that is not an Index Business Day.

Daily Investor Fee: The Daily Investor Fee for any series of ETNs on any Index Business Day will equal the product of (1) the Closing Indicative Value for such series of ETNs on the immediately preceding Index Business Day *times* (2)(a) the Investor Fee Factor for such series of ETNs *times* (b) 1/365 *times* (c) *d*, where *d* is the number of calendar days from and including the immediately prior Index Business Day to but excluding the date of determination. The Daily Investor Fee for any series of ETNs is deemed to equal zero on any day that is not an Index Business Day.

The Daily Investor Fee reduces the daily return of each series of ETNs. Over the time you hold the ETNs, if the level of the applicable Index decreases or does not increase sufficiently, in addition to the Daily Accrual, to offset the effect of the Daily Investor Fee (and, if applicable, the Early Redemption Charge and the creation fee), you will receive less than the amount you paid for them upon sale, at maturity or upon early redemption or acceleration.

Investor Fee Factor: The Investor Fee Factor for each series of ETNs is as follows:

Long LIBOR ETNs: 1.50%

Short LIBOR ETNs: 1.50%

Index Exposure: For each Valuation Date during the Final Valuation Period or any Optional Acceleration Valuation Period, as applicable, the product of (i) (a) the Index Exposure on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, the Closing Indicative Value on the immediately preceding Index Business Day) *multiplied by* the Daily ETN Performance on the current Valuation Date *minus* (b) the Daily Investor Fee on the current Valuation Date and (ii) a fraction equal to (a) the number of scheduled Valuation Dates left in the applicable Valuation Period, excluding the current Valuation Date, *divided by* (b) the number of scheduled Valuation

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Dates left in the applicable Valuation Period, including the current Valuation Date. The Index Exposure on any day that is not a Valuation Date will be deemed to be the same as on the immediately preceding Valuation Date.

Notional Cash Amount: For each Valuation Date during the Final Valuation Period or any Optional Acceleration Valuation Period, as applicable, the sum of (i) the Notional Cash Amount on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, $0.00) and (ii) (a) (1) the Index Exposure on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, the Closing Indicative Value on the immediately preceding Valuation Date) *multiplied by* the Daily ETN Performance on the current Valuation Date *minus* (2) the Daily Investor Fee on the current Valuation Date *multiplied by* (b) 1 *divided by* the number of scheduled Valuation Dates left in the applicable Valuation Period, including the current Valuation Date. The Notional Cash Amount on any day that is not a Valuation Date will be deemed to be the same as on the immediately preceding Valuation Date.

Intraday Indicative Value: The "Intraday Indicative Value" for each series of ETNs is designed to approximate the economic value of such series of ETNs at a given time. It is calculated using the same formula as the Closing Indicative Value, except that instead of using the closing level of the applicable Index, the calculation is based on the most recent intraday level of the applicable Index at the particular time. The Intraday Indicative Value for each series of the ETNs will be calculated every 15 seconds on each Index Business Day during NYSE Arca trading hours and will be disseminated over the Consolidated Tape, or other major market data vendor. At any time at which a Market Disruption Event with respect to a series of ETNs has occurred and is continuing, there shall be no Intraday Indicative Value for such series of ETNs, except for purposes of determining whether a Trigger Event has occurred. JICS or its agent is responsible for computing and disseminating the Intraday Indicative Value, except that CGMI has sole discretion to determine the Intraday Indicative Value in connection with an Automatic Acceleration.

The Intraday Indicative Value is a calculated value and is not the same as the trading price of the ETNs and is not a price at which you can buy or sell the ETNs in the secondary market. The Intraday Indicative Value does not take into account the factors that may influence the trading price of the ETNs, such as imbalances of supply and demand, lack of liquidity and credit considerations. **The actual trading price of the ETNs in the secondary market may vary significantly from their Intraday Indicative Value.**

Investors can compare the trading price of the ETNs (if such concurrent price is available) against the Intraday Indicative Value to determine whether the ETNs are trading in the secondary market at a premium or a discount to the economic value of the ETNs at any given time. Investors are cautioned that paying a premium purchase price over the Intraday Indicative Value at any time could lead to the loss of any premium in the event the investor sells the ETNs when the premium is no longer present in the marketplace or when the ETNs are accelerated, including at our option, which we have the discretion to do at any time. It is also possible that the ETNs will trade in the secondary market at a discount below the Intraday Indicative Value and that investors would receive less than the Intraday Indicative Value if they had to sell their ETNs in the market at such time.

As discussed above under "—Closing Indicative Value", the daily settlement prices of Eurodollar futures contracts are determined as of 3:00 p.m., New York City time, on each Index Business Day. However, because of a time lag in the publication of the daily settlement prices, the closing level of each Index, which is based on the daily settlement prices, is typically not published until after the close of trading on the NYSE Arca. Between 3:00 p.m. and the close of trading on the NYSE Arca, the Index Calculation Agent suspends real-time updates to the calculation of the intraday level of each Index, because an accurate intraday level during this time period would require a reset of hypothetical Eurodollar futures contract exposure based on the closing level on that day, which will not yet be available. Throughout this full time period, the Intraday Indicative Value of each series of ETNs will continue to be calculated and disseminated based on the most recently published intraday level of the applicable Index. However, because real-time updates to the calculation of the intraday Index level will be suspended as of 3:00 p.m., the Intraday Indicative Value will not change, and therefore will not reflect trading in Eurodollar futures contracts that takes place, during this time period. **For this reason, between 3:00 p.m. and the close of trading on the NYSE Arca, the Intraday Indicative Value is likely to differ from the value of the ETNs that would be determined if complete and fully up-to-date information were available and used in the calculation. As a result, we expect there to be uncertainty about the intrinsic value of the ETNs during this time period, and the trading price of the ETNs is likely to diverge from the Intraday Indicative Value during this time period. Investors should exercise caution in connection with any trading in this time period, particularly if there is a significant move in Eurodollar futures prices during this time period.**

Although the daily settlement price of Eurodollar futures contracts (and, in turn, the closing level of each Index) is determined as of 3:00 p.m. on each Index Business Day, this value may differ from the most recent published trading price of Eurodollar futures contracts (and, in turn, each intraday Index level) at 3:00 p.m. because the daily settlement price is determined according to the procedure described in "Information About Eurodollar Futures Contracts" in this pricing supplement, which is not based simply on the last reported trade at 3:00 p.m. Accordingly, the Closing Indicative Value that is published after the close of trading on the NYSE Arca based on the closing level of the applicable Index may differ from the Intraday Indicative Value published based on the intraday level of the applicable Index at 3:00 p.m.

Valuation Dates: Each Index Business Day in the Final Valuation Period or any Optional Acceleration Valuation Period and any Early Redemption Valuation Date.*

Payment at If the ETNs have not been previously redeemed or accelerated, on the Maturity Date holders will receive, for each

(continued from previous page)

Maturity:	$25.00 stated principal amount ETN of each series, a cash payment equal to the Closing Indicative Value of such series of ETNs on the final Valuation Date of the Final Valuation Period, as calculated by the ETN Calculation Agents. The "**Final Valuation Period**" is the period of five Index Business Days commencing on August 3, 2032, each subject to postponement as described herein. We refer to the amount of such payment as the "**Maturity Redemption Amount**." The ETNs are intended to be short-term trading tools and are not intended to be held to maturity. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.
Maturity Date:	The scheduled Maturity Date for each series of ETNs is August 16, 2032.*
Early Redemption:	Prior to maturity or acceleration, you may, subject to certain restrictions described below, offer at least the applicable minimum number of the ETNs to us for redemption on an Early Redemption Date during the term of the ETNs. If you elect to offer the ETNs for redemption, and the requirements for acceptance by us are met, you will receive a cash payment per ETN on the Early Redemption Date equal to the Early Redemption Amount. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc. You must offer for redemption at least 50,000 ETNs of any one series, or an integral multiple of 50,000 ETNs of such series in excess thereof, at one time in order to exercise your right to cause us to redeem the ETNs on any Early Redemption Date (the "**Minimum Redemption Amount**"), except that we or CGMI, as one of the ETN Calculation Agents, may from time to time reduce, in part or in whole, the Minimum Redemption Amount. Any such reduction will be applied on a consistent basis for all holders of the relevant series of ETNs at the time the reduction becomes effective. If the ETNs undergo a split or reverse split, the minimum number of ETNs needed to exercise your right to redeem will remain the same.
Early Redemption Mechanics:	You may exercise your early redemption right by causing your broker or other person with whom you hold the ETNs to deliver a Redemption Notice (as defined herein) to the Redemption Agent (as defined herein). If your Redemption Notice is delivered prior to 4:00 p.m. New York City time, on any Business Day, the immediately following Index Business Day will be the applicable "**Early Redemption Valuation Date**" for such series of ETNs. Otherwise, the second following Index Business Day will be the applicable Early Redemption Valuation Date. For an exercise of the early redemption right to be effective, the applicable Early Redemption Valuation Date must be on or before the first day of any Optional Acceleration Valuation Period or Final Valuation Period. In addition, if a Trigger Event occurs or an Automatic Acceleration Valuation Period is continuing on any date that would otherwise be an Early Redemption Valuation Date, you will not be entitled to receive the Early Redemption Amount and instead will receive the Automatic Acceleration Redemption Amount. See "Specific Terms of the ETNs—Redemption Procedures" in this pricing supplement. Because the Early Redemption Amount you will receive for each ETN will not be calculated until the Index Business Day (or the second following Index Business Day) immediately following the Business Day you offer your ETNs for redemption, you will not know the applicable Early Redemption Amount at the time you exercise your early redemption right and will bear the risk that your ETNs will decline in value between the time of your exercise and the time at which the Early Redemption Amount is determined.
Early Redemption Date:	The third Business Day following an Early Redemption Valuation Date.*
Early Redemption Amount:	A cash payment per ETN equal to the greater of (A) zero and (B)(1) the Closing Indicative Value for such series of ETNs on the Early Redemption Valuation Date *minus* (2) the Early Redemption Charge.
Early Redemption Charge:	The Early Redemption Charge for any series of ETNs will equal 0.20% *times* the Closing Indicative Value for such series of ETNs on the Early Redemption Valuation Date.
Acceleration at Our Option:	We will have the right to accelerate the ETNs of any series in whole but not in part on any Business Day occurring on or after the Inception Date (an "**Optional Acceleration**"). Upon an Optional Acceleration, you will receive a cash payment per ETN in an amount (the "**Optional Acceleration Redemption Amount**") equal to the Closing Indicative Value of such series of ETNs on the final Valuation Date of the Optional Acceleration Valuation Period. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc. In the case of an Optional Acceleration of the ETNs of any series, the "**Optional Acceleration Valuation Period**" shall be a period of five consecutive Index Business Days specified in our notice of Optional Acceleration, the first Index Business Day of which shall be at least two Business Days after the date on which we give you notice of such Optional Acceleration. The Optional Acceleration Redemption Amount will be payable on the third Business Day following the last such Index Business Day in the Optional Acceleration Valuation Period (such third Business Day the "**Optional Acceleration Date**").* We will give you notice of any Optional Acceleration of the ETNs through customary channels used to deliver notices to holders of exchange traded notes.
Automatic Acceleration:	If the Intraday Indicative Value of any series of ETNs at any time on any scheduled Index Business Day is less than 50% of the Closing Indicative Value of such series of ETNs on the immediately preceding Index Business Day (meaning that the Intraday Indicative Value has declined by more than 50% from the prior day's Closing Indicative Value) (such event, a "**Trigger Event**"), such series of ETNs will be automatically accelerated (an "**Automatic Acceleration**") and the holders of such ETNs will receive a cash payment per ETN on the Automatic Acceleration Date equal to the Automatic Acceleration Redemption Amount. We refer to the date on which the relevant Trigger Event occurs as the "**Trigger Date**" and to the scheduled Index Business Day immediately following the Trigger Date as the "**Automatic Acceleration Valuation Date**".

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	In the event of Automatic Acceleration of any series of ETNs, the "**Automatic Acceleration Redemption Amount**" of such series of ETNs will be a value equal to the Closing Indicative Value of such series of ETNs on the Automatic Acceleration Valuation Date, calculated as though the closing level of the applicable Index on both the Trigger Date and the Automatic Acceleration Valuation Date were equal to the Automatic Acceleration Index Level of the applicable Index. The "**Automatic Acceleration Index Level**" of the applicable Index will be an alternative closing level of the applicable Index calculated by the ETN Calculation Agents and will be the closing level that would be calculated on the Trigger Date if the official daily settlement price on the Trigger Date of each Eurodollar futures contract included in the applicable Index on the Trigger Date were equal to the volume-weighted average trading price of such contract during the Automatic Acceleration Valuation Period. If a Trigger Event occurs on any scheduled Index Business Day, the "**Automatic Acceleration Valuation Period**" is the period commencing immediately upon the occurrence of the Trigger Event and continuing during Eurodollar Trading Hours (as defined in "Specific Terms of the ETNs—Automatic Acceleration") until the end of Eurodollar Trading Hours on the Automatic Acceleration Valuation Date. The Automatic Acceleration Redemption Amount will be payable on the third Business Day following the Automatic Acceleration Valuation Date (such third Business Day, the "**Automatic Acceleration Date**").
Business Day:	Any day that is not (a) a Saturday or Sunday or (b) a day on which banking institutions generally are authorized or obligated by law or executive order to close in New York.
Index Business Day:	An "**Index Business Day**" is a weekday on which the New York Stock Exchange and Chicago Mercantile Exchange are both open for trading for their regular trading sessions.
ETN Calculation Agents:	CGMI, which is an affiliate of ours, and JICS. See "Specific Terms of the ETNs—Role of ETN Calculation Agents" in this pricing supplement.

* Any Valuation Date for any series of ETNs is subject to postponement if such date is not an Index Business Day or as a result of a Market Disruption Event; any Valuation Date in a Valuation Period is subject to postponement if a preceding Valuation Date in such Valuation Period is postponed; the Maturity Date will be postponed if the scheduled Maturity Date is not a Business Day or if the last scheduled Valuation Date in the Final Valuation Period is postponed; any Early Redemption Date will be postponed if a Market Disruption Event occurs or is continuing on the corresponding Valuation Date; and the Optional Acceleration Date will be postponed if the last scheduled Valuation Date in the Optional Acceleration Valuation Period is postponed, in each case as described herein under "Specific Terms of the ETNs." No interest or additional payment will accrue or be payable as a result of any postponement of any Valuation Date, the Maturity Date, any Early Redemption Date or the Optional Acceleration Date, as applicable.

The "Key Terms" set forth above are only a summary of certain key terms of the ETNs. You should carefully review the section "Specific Terms of the ETNs" in this pricing supplement, together with the sections "Description of the Notes" in the accompanying prospectus supplement and "Description of Debt Securities" in the accompanying prospectus, for a complete description of the terms of each series of ETNs.

UNDERSTANDING THE VALUE OF THE ETNS

Any payment on the ETNs, whether upon early redemption, acceleration or at maturity, will be based on the Closing Indicative Value of the applicable ETNs on one or more Valuation Dates. The Intraday Indicative Value of the ETNs at any time during an Index Business Day provides an indication of what the Closing Indicative Value of the ETNs would be if the then-current intraday level of the applicable Index were to be the closing level of that Index on that Index Business Day.

We have arranged for the Intraday Indicative Value and Closing Indicative Value (each, an "**Indicative Value**") for each series of ETNs to be published on each Index Business Day under the applicable Indicative Value ticker for such series of ETNs, as set forth on the cover of this pricing supplement, because we believe these values provide important information to investors seeking to buy or sell the ETNs in the secondary market. However, the Intraday Indicative Value and Closing Indicative Value of the ETNs are not the same as the trading price of the ETNs, which is the price at which you may be able to sell your ETNs in the secondary market. The trading price of the ETNs is a market-determined price that will reflect market supply and demand and may differ from the most recent Indicative Value. The trading price of each series of ETNs will be published on each Index Business Day under the applicable exchange ticker for such series of ETNs, as set forth on the cover of this pricing supplement, and reflects the last reported trading price of such series of ETNs, regardless of the date and time of such trading price.

An explanation of each valuation is set forth below.

Closing Indicative Value

The Closing Indicative Value for each series of ETNs is designed to reflect the end-of-day economic value of such series of ETNs. The Closing Indicative Value for each series of ETNs on the Inception Date was $25.00. The Closing Indicative Value for any series of ETNs on any given calendar day following the Inception Date will be equal to:

- For each calendar day prior to the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, (1)(a) the Closing Indicative Value for such series of ETNs on the immediately preceding calendar day *times* (b) the Daily ETN Performance for such series of ETNs on such calendar day *minus* (2) the Daily Investor Fee for such series of ETNs on such calendar day.

- For each calendar day during the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, the sum of (1) the Index Exposure and (2) the Notional Cash Amount on such calendar day.

The Closing Indicative Value will never be less than zero.

The Closing Indicative Value of each series of ETNs on each Index Business Day is based on the closing level of the applicable Index on that Index Business Day. The closing level of each Index on each Index Business Day is determined based on the daily settlement prices of the Eurodollar futures contracts that then compose that Index, which are determined as of 3:00 p.m., New York City time, on each Index Business Day. Although the daily settlement prices are determined as of 3:00 p.m., there is typically a time lag in the publication of the daily settlement prices, and the closing level of each Index based on those daily settlement prices is typically not published until after the close of trading for the ETNs on the NYSE Arca. Accordingly, the Closing Indicative Value of each series of ETNs will also not be published until after the close of trading for the ETNs on the NYSE Arca, but will be based on the daily settlement prices of the applicable Eurodollar futures contracts as of 3:00 p.m.

During the Final Valuation Period or any Optional Acceleration Valuation Period, the Closing Indicative Value is calculated in a manner that results in a proportional reduction of exposure to the applicable Index on each Valuation Date in that Valuation Period. In other words, on each Valuation Date over the course of the applicable Valuation Period, a portion of each ETN's value will be converted into notional cash exposure (and thereby crystallized) based on the level of the applicable Index on that day, and on each subsequent Valuation Date a progressively smaller portion of the ETN's value will be exposed to changes in the applicable Index on that day and a progressively greater amount will be converted into notional cash exposure, until at the end of the Valuation

Period the full amount of the ETN's exposure has been converted into notional cash exposure. The cumulative amount of that notional cash exposure is the Closing Indicative Value on the last Valuation Date of the applicable Valuation Period. On each Valuation Date after the first Valuation Date of the Final Valuation Period or an Optional Acceleration Valuation Period, the Daily Index Performance (and, in turn, the Daily ETN Performance and the Closing Indicative Value) will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Valuation Period begins.

For more information about the calculation of the Closing Indicative Value, see "Specific Terms of the ETNs—Closing Indicative Value" in this pricing supplement.

Intraday Indicative Value

The "**Intraday Indicative Value**" for each series of ETNs is designed to reflect the economic value of such series of ETNs at a given time. It is calculated using the same formula as the Closing Indicative Value, except that instead of using the closing level of the applicable Index, the calculation is based on the most recent intraday level of the applicable Index at the particular time. The Intraday Indicative Value of each series of ETNs will be calculated every 15 seconds on each Index Business Day during NYSE Arca trading hours and will be disseminated over the Consolidated Tape, or other major market data vendor, and will be published under the applicable Indicative Value ticker for such series of ETNs, as set forth on the cover of this pricing supplement. At any time at which a Market Disruption Event with respect to any series of ETNs has occurred and is continuing, there shall be no Intraday Indicative Value for such series of ETNs, except for purposes of determining whether a Trigger Event has occurred.

As discussed above under "—Closing Indicative Value", the daily settlement prices of Eurodollar futures contracts are determined as of 3:00 p.m., New York City time, on each Index Business Day. However, because of a time lag in the publication of the daily settlement prices, the closing level of each Index, which is based on the daily settlement prices, is typically not published until after the close of trading on the NYSE Arca. Between 3:00 p.m. and the close of trading on the NYSE Arca, the Index Calculation Agent suspends real-time updates to the calculation of the intraday level of each Index, because an accurate intraday level during this time period would require a reset of hypothetical Eurodollar futures contract exposure based on the closing level on that day, which will not yet be available. Throughout this full time period, the Intraday Indicative Value of each series of ETNs will continue to be calculated and disseminated based on the most recently published intraday level of the applicable Index. However, because real-time updates to the calculation of the intraday Index level will be suspended as of 3:00 p.m., the Intraday Indicative Value will not change, and therefore will not reflect trading in Eurodollar futures contracts that takes place, during this time period. **For this reason, between 3:00 p.m. and the close of trading on the NYSE Arca, the Intraday Indicative Value is likely to differ from the value of the ETNs that would be determined if complete and fully up-to-date information were available and used in the calculation. As a result, we expect there to be uncertainty about the intrinsic value of the ETNs during this time period, and the trading price of the ETNs is likely to diverge from the Intraday Indicative Value during this time period. Investors should exercise caution in connection with any trading in this time period, particularly if there is a significant move in Eurodollar futures prices during this time period.**

Although the daily settlement price of Eurodollar futures contracts (and, in turn, the closing level of each Index) is determined as of 3:00 p.m. on each Index Business Day, this value may differ from the most recent published trading price of Eurodollar futures contracts (and, in turn, each intraday Index level) at 3:00 p.m. because the daily settlement price is determined according to the procedure described in "Information About Eurodollar Futures Contracts" in this pricing supplement, which is not based simply on the last reported trade at 3:00 p.m. Accordingly, the Closing Indicative Value that is published after the close of trading on the NYSE Arca based on the closing level of the applicable Index may differ from the Intraday Indicative Value published based on the intraday level of the applicable Index at 3:00 p.m.

For more information about the calculation of the Intraday Indicative Value, see "Specific Terms of the ETNs—Intraday Indicative Value" in this pricing supplement.

Trading Price

The market value of the ETNs at any given time, which we refer to as the trading price, is the price at which you may be able to sell your ETNs in the secondary market at such time, if one exists. In the absence of an active secondary market for the ETNs, the last reported trading price may not reflect the actual price at which you may be able to sell your ETNs at a particular time. The trading price of the ETNs in the secondary market is not the same as the Indicative Value of the ETNs at any time, even if a concurrent trading price in the secondary market were available at such time. The trading price of any series of the ETNs at any time may vary significantly from the Indicative Value of such ETNs at such time because the market value reflects investor supply and demand for the ETNs. Any premium may be reduced or eliminated at any time. Paying a premium purchase price over the Indicative Value of the ETNs could lead to significant losses in the event the investor sells such ETNs at a time when such premium is no longer present in the marketplace or such ETNs are accelerated, including at our option, which we have the discretion to do at any time. If we accelerate the ETNs of any series at our option, investors will receive a cash payment in an amount based on the Closing Indicative Value of such ETNs on the final Valuation Date of an Optional Acceleration Valuation Period, which will not include any premium. Investors should consult their financial advisors before purchasing or selling the ETNs, especially ETNs trading at a premium over their Indicative Value.

See "Risk Factors—The Intraday Indicative Value and the Closing Indicative Value and the applicable Redemption Amount are not the same as the closing price or any other trading price of the ETNs in the secondary market" in this pricing supplement.

Early Redemption Amount

If you elect to offer your ETNs for early redemption, and the requirements for acceptance by us are met (including the requirement that you submit at least the Minimum Redemption Amount of 50,000 ETNs of any one series or an integral multiple of 50,000 ETNs of such series in excess thereof), you will receive a cash payment per ETN on the Early Redemption Date equal to the Early Redemption Amount. The Early Redemption Amount, if applicable, will be equal to the greater of (A) zero and (B) (1) the Closing Indicative Value on the Early Redemption Valuation Date *minus* (2) the Early Redemption Charge, which is equal to 0.20% *times* the Closing Indicative Value on the Early Redemption Valuation Date, and will be calculated by the ETN Calculation Agents.

For more information about the calculation of the Early Redemption Amount, see "Specific Terms of the ETNs—Payment Upon Early Redemption" in this pricing supplement.

Optional Acceleration Redemption Amount

We will have the right to accelerate the ETNs of any series in whole but not in part on any Business Day occurring on or after the Inception Date. Upon an Optional Acceleration, you will receive the Optional Acceleration Redemption Amount. The Optional Acceleration Redemption Amount will be equal to the Closing Indicative Value of the applicable series of ETNs on the final Valuation Date of the Optional Acceleration Valuation Period. On each Valuation Date after the first Valuation Date of an Optional Acceleration Valuation Period, the Daily Index Performance will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Optional Acceleration Valuation Period begins.

For more information about the calculation of the Optional Acceleration Redemption Amount, see "Specific Terms of the ETNs—Acceleration at Our Option" in this pricing supplement.

Automatic Acceleration Redemption Amount

If the Intraday Indicative Value of any series of ETNs at any time on any scheduled Index Business Day is less than 50% of the Closing Indicative Value of such series of ETNs on the immediately preceding Index Business Day, such series of ETNs will be automatically accelerated and the holders of such ETNs will receive the Automatic Acceleration Redemption Amount per ETN on the Automatic Acceleration Date. The Automatic Acceleration Redemption Amount will be a cash payment equal to the Closing Indicative Value of such series of ETNs on the Automatic Acceleration Valuation Date, calculated as though the closing level of the applicable Index on both the Trigger Date and the Automatic Acceleration Valuation Date were equal to the Automatic Acceleration Index Level

of the applicable Index. The Automatic Acceleration Index Level of the applicable Index will be an alternative closing level of the applicable Index calculated by the ETN Calculation Agents and will be the closing level that would be calculated on the Trigger Date if the official daily settlement price on the Trigger Date of each Eurodollar futures contract included in the applicable Index on the Trigger Date were equal to the volume-weighted average trading price of such contract during the Automatic Acceleration Valuation Period.

For more information about the calculation of the Automatic Acceleration Redemption Amount, see "Specific Terms of the ETNs—Automatic Acceleration" in this pricing supplement.

Maturity Redemption Amount

If the ETNs have not been previously redeemed or accelerated, on the Maturity Date the holder will receive a cash payment per ETN equal to the Maturity Redemption Amount, which will be equal to the Closing Indicative Value of the applicable series of ETNs on the final Valuation Date of the Final Valuation Period. On each Valuation Date after the first Valuation Date of the Final Valuation Period, the Daily Index Performance will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Final Valuation Period begins.

For more information about the calculation of the Maturity Redemption Amount, see "Specific Terms of the ETNs—Payment at Maturity" in this pricing supplement.

HYPOTHETICAL EXAMPLES

Illustrations of the Calculation of the Closing Indicative Value prior to the Final Valuation Period or an Optional Acceleration Valuation Period

The examples below illustrate how the Closing Indicative Value of the ETNs would be calculated on a hypothetical Index Business Day (referred to as **Day 2** below) based on various hypothetical percentage changes in the closing level of the applicable Index from the prior Index Business Day (referred to as **Day 1** below). The examples below illustrate one-day returns on the ETNs because the Indices are designed to approximate their stated investment objectives on a daily basis. The examples below illustrate the calculation of the Closing Indicative Value prior to the Final Valuation Period or any Optional Acceleration Valuation Period. For illustrations of the calculation of the Closing Indicative Value during the Final Valuation Period or any Optional Acceleration Valuation Period, see "—Illustrations of the Calculation of the Closing Indicative Value during the Final Valuation Period or an Optional Acceleration Valuation Period" below.

The examples below only illustrate changes in the Closing Indicative Value of the ETNs and do not reflect the impact of any creation fee or Early Redemption Charge on an investor's return on the ETNs. If an investor were to purchase the ETNs from CGMI, the investor would incur a fee equal to the Indicative Value used to price the sale of the ETNs to that investor *times* the creation fee of up to 0.15%, and if an investor were to exercise the early redemption right, the investor would incur a fee equal to the Closing Indicative Value on the applicable Early Redemption Valuation Date *times* 0.20%. If applicable, the creation fee and Early Redemption Charge will reduce an investor's return on an investment in the ETNs.

The examples below do not reflect the Automatic Acceleration feature of the ETNs. The examples show scenarios in which the Closing Indicative Value on Day 2 has fallen to zero in order to show that it is possible for a significant decline in the level of the applicable Index to result in a complete loss in value of the ETNs over a period of just one Index Business Day. However, in these scenarios, once the Intraday Indicative Value of the ETNs of any series has fallen to less than 50% of the prior Index Business Day's Closing Indicative Value, the ETNs of that series would be automatically accelerated and holders would receive an amount equal to the Automatic Acceleration Redemption Amount, rather than the Closing Indicative Value on Day 2.

The examples below assume various percentage changes in the closing level of the applicable Index from Day 1 to Day 2 and do not illustrate how the closing level of the applicable Index itself is calculated. For information about how each Index is calculated, see "Description of the Janus Velocity LIBOR Indices" below.

The examples below are based on the following hypothetical assumptions:

Term	Assumed Value
Closing Indicative Value on prior Index Business Day (Day 1)	$100
3-month U.S. Treasury rate on prior Index Business Day ($Tbills_{t-1}$)	0.10%
Number of calendar days since prior Index Business Day (d)	1

Based on these assumptions, the Daily Accrual and Daily Investor Fee for the examples below would be calculated as follows:

$$\text{Daily Accrual} = \left(\frac{1}{1 - Tbills_{t-1} * \frac{91}{360}}\right)^{\frac{d}{91}} - 1 = \left(\frac{1}{1 - 0.001 * \frac{91}{360}}\right)^{\frac{1}{91}} - 1 = 0.000002778133$$

Daily Investor Fee = Closing Indicative Value on Day 1 × (Investor Fee Factor × 1/365 × d)

= $100 × (0.015 × 1/365 × 1)

= $0.004109589

The table below illustrates how the Closing Indicative Value (or "**CIV**") of the ETNs would be calculated on a given Index Business Day (**Day 2**) based on the assumptions specified above and assuming various hypothetical percentage changes in the closing level of the applicable Index from the prior Index Business Day (**Day 1**). The percentage change in the closing level of the applicable Index from Day 1 to Day 2 is referred to as the "Daily Index Performance" in the table below. Each row in the table below illustrates the calculation of the Closing Indicative Value on Day 1 given the Daily Index Performance specified in that row. The table below is merely illustrative and does not show all possible outcomes.

CIV Day 1 ($)	×	**Daily ETN Performance** [**1**	**+**	**Daily Accrual**	**+**	**Daily Index Performance**]	**–**	**Daily Investor Fee ($)**	**=**	**CIV Day 2 ($)**
100	×	[1	+	0.000002778133	+	**-100.00%**]	–	0.004109589	=	0.0000
100	×	[1	+	0.000002778133	+	**-50.00%**]	–	0.004109589	=	49.9962
100	×	[1	+	0.000002778133	+	**-25.00%**]	–	0.004109589	=	74.9962
100	×	[1	+	0.000002778133	+	**-10.00%]**	–	0.004109589	=	89.9962
100	×	[1	+	0.000002778133	+	**-5.00%]**	–	0.004109589	=	94.9962
100	×	[1	+	0.000002778133	+	**-3.00%]**	–	0.004109589	=	96.9962
100	×	[1	+	0.000002778133	+	**-1.00%]**	–	0.004109589	=	98.9962
100	×	[1	+	0.000002778133	+	**0.00%]**	–	0.004109589	=	99.9962
100	×	[1	+	0.000002778133	+	**1.00%]**	–	0.004109589	=	100.9962
100	×	[1	+	0.000002778133	+	**3.00%]**	–	0.004109589	=	102.9962
100	×	[1	+	0.000002778133	+	**5.00%]**	–	0.004109589	=	104.9962
100	×	[1	+	0.000002778133	+	**10.00%]**	–	0.004109589	=	109.9962
100	×	[1	+	0.000002778133	+	**25.00%**]	–	0.004109589	=	124.9962
100	×	[1	+	0.000002778133	+	**50.00%**]	–	0.004109589	=	149.9962
100	×	[1	+	0.000002778133	+	**100.00%]**	–	0.004109589	=	199.9962

As the table above illustrates, the change in the Closing Indicative Value of the ETNs from one Index Business Day to the next will reflect the percentage change in the closing level of the applicable Index over that period, *plus* the Daily Accrual and *minus* the Daily Investor Fee. If the closing level of the applicable Index declines sufficiently from one Index Business Day to the next, the ETNs may lose all of their value over that one-day period.

Illustrations of the Calculation of the Closing Indicative Value during the Final Valuation Period or an Optional Acceleration Valuation Period

If we exercise our right to accelerate the ETNs of any series at our option, or if the ETNs of any series remain outstanding until maturity, the amount we will be obligated to pay on the Optional Acceleration Date or the Maturity Date, as applicable, will be equal to the Closing Indicative Value of the applicable ETNs on the final Valuation Date of the applicable Valuation Period, which will consist of five consecutive Index Business Days.

During the Final Valuation Period or an Optional Acceleration Valuation Period, as applicable, the Closing Indicative Value of the applicable series of ETNs will be calculated on each Valuation Date of that Valuation Period in a manner that differs from the manner in which the Closing Indicative Value is calculated prior to the Valuation Period. On each day of the Final Valuation Period or an Optional Acceleration Valuation Period, the Closing Indicative Value of the ETNs will be equal to the Index Exposure on that day *plus* the Notional Cash Amount on that day. This calculation is designed to achieve a proportional reduction of exposure to the applicable Index on each Valuation Date in the Valuation Period. In other words, on each Valuation Date over the course of the applicable Valuation Period, a portion of each ETN's value will be converted into notional cash exposure (and thereby crystallized) based on the level of the applicable Index on that day, and on each subsequent Valuation Date a progressively smaller portion of the ETN's value will be exposed to changes in the applicable Index on that day and a progressively greater amount will be converted into notional cash exposure, until at the end of the Valuation Period the full amount of the ETN's exposure has been converted into notional cash exposure. The cumulative amount of that notional cash exposure is the Closing Indicative Value on the last Valuation Date of the applicable Valuation Period. On each Valuation Date after the first Valuation Date of the Final Valuation Period or an Optional Acceleration Valuation Period, the Daily Index Performance (and, in turn, the Daily ETN Performance and the Closing Indicative Value) will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Valuation Period begins.

The table below illustrates the hypothetical calculation of the Closing Indicative Value ("**CIV**") of the ETNs on each Valuation Date during the Final Valuation Period or an Optional Acceleration Valuation Period. The table below assumes that the Closing Indicative Value of the ETNs on the Index Business Day immediately preceding the beginning of the Valuation Period is $100 and that the first Valuation Date occurs on a Monday (*i.e.*, for purposes of calculating the Daily Investor Fee, three calendar days after the immediately preceding Index Business Day). In the table below, "**IF**" refers to a fraction equal to the number of scheduled Valuation Dates left in the Valuation Period, excluding the current Valuation Date, *divided by* (b) the number of scheduled Valuation Dates left in the applicable Valuation Period, including the current Valuation Date; and "**NF**" refers to a fraction equal to 1 *divided by* the number of scheduled Valuation Dates left in the applicable Valuation Period, including the current Valuation Date.

The table assumes Daily ETN Performances on each Valuation Date of the applicable Valuation Period as indicated below. A Daily ETN Performance of greater than 1 means that the applicable Index has increased since the prior Index Business Day, and a Daily ETN Performance of less than 1 means that the applicable Index has decreased since the prior Index Business Day. The Daily ETN Performance numbers below are entirely hypothetical and have been selected for the sole purpose of illustrating the mechanics of the calculation of the Closing Indicative Value during the Final Valuation Period or an Optional Acceleration Valuation Period. The actual Closing Indicative Values determined during any actual Valuation Period will differ from the illustration below.

	Index Exposure							**Notional Cash Amount**								
Day	Index Exposure on Prior Index Business Day	× Daily ETN Performance	- Daily Investor Fee	× IF =	Index Exposure on Current Index Business Day	+	Notional Cash Amount on Prior Index Business Day	+ Index Exposure on Prior Index Business Day	× Daily ETN Performance	- Daily Investor Fee	× NF =	Notional Cash Amount on Current Index Business Day	=	**CIV**
1	[($100	× 0.97)	- $0.01233)	× 4/5] =	**$77.59**	+	$0.00	+ [($100	× 0.97)	- $0.01233)	× 1/5] =	**$19.40**	=	**$96.99**
2	[($77.59	× 1.03)	- $0.00399)	× 3/4] =	**$59.94**	+	$19.40	+ [($77.59	× 1.03)	- $0.00399)	× 1/4] =	**$39.38**	=	**$99.31**
3	[($59.94	× 0.98)	- $0.00408)	× 2/3] =	**$39.16**	+	$39.38	+ [($59.94	× 0.98)	- $0.00408)	× 1/3] =	**$58.95**	=	**$98.11**
4	[($39.16	× 1.02)	- $0.00403)	× 1/2] =	**$19.97**	+	$58.95	+ [($39.16	× 1.02)	- $0.00403)	× 1/2] =	**$78.92**	=	**$98.89**
5	[($19.97	× 0.94)	- $0.00406)	× 0] =	**$0.00**	+	$78.92	+ [($19.97	× 0.94)	- $0.00406)	× 1] =	**$97.69**	=	**$97.69**

RISK FACTORS

An investment in the ETNs is significantly riskier than an investment in conventional debt securities. The ETNs are subject to all of the risks associated with an investment in our conventional debt securities (guaranteed by Citigroup Inc.), including the risk that we and Citigroup Inc. may default on our obligations under the ETNs, and are also subject to risks associated with fluctuations in the level of the applicable Index.

The risk factors below describe certain significant risks associated with an investment in the ETNs. You should read these risk factors together with the risk factors included in the accompanying prospectus supplement and in the documents incorporated by reference in the accompanying prospectus, including Citigroup Inc.'s most recent Annual Report on Form 10-K and any subsequent Quarterly Reports on Form 10-Q, which describe risks relating to the business of Citigroup Inc. more generally.

The risk factors below use certain terms and concepts that are described in greater detail under "Information About 3-Month U.S. Dollar LIBOR", "Information About Eurodollar Futures Contracts", "Description of the Janus Velocity LIBOR Indices" and "Specific Terms of the ETNs" in this pricing supplement. Accordingly, the risk factors below should be read together with those sections.

The ETNs do not pay interest or guarantee any return of your initial investment and you may lose all or a significant part of your investment in the ETNs.

The terms of the ETNs differ from those of ordinary debt securities in that the ETNs neither pay interest nor guarantee payment of the stated principal amount per ETN at maturity or upon redemption or acceleration, and you may incur a loss of your initial investment. Because the payment due at maturity or upon redemption or acceleration may be less than the amount originally invested in the ETNs, the return on the ETNs may be negative.

The Early Redemption Amount, Optional Acceleration Redemption Amount, Automatic Acceleration Redemption Amount and Maturity Redemption Amount, as applicable (each, a "**Redemption Amount**"), will each depend on the change in the level of the applicable Index. You may lose all or a significant amount of your investment in the ETNs if the level of the applicable Index decreases or does not increase sufficiently. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

The ETNs are likely to be highly volatile and, therefore, highly speculative and highly risky.

Each series of ETNs tracks an Index that aims to approximate its targeted participation in the daily percentage change (or the inverse thereof, in the case of the Short LIBOR Index) in the composite forward LIBOR rate (subject to the effects of carry and the contract spread, as described in "Description of the Janus Velocity LIBOR Indices" below). A relatively small absolute change in the composite forward LIBOR rate from one day to the next may result in a relatively large percentage change. For example, if the composite forward LIBOR rate declines from 1.00% to 0.90% from one Index Business Day to the next, that would represent a change of only 0.10% in absolute terms but a 10% change in percentage change terms (since 0.10% is 10% of 1.00%). In this circumstance, even though the absolute change is relatively small, the Long LIBOR Index would aim to decline by approximately 10% (subject to the effects of carry and the contract spread) over that one-day period, and the Indicative Value of the Long LIBOR ETNs would incur a similar loss (subject to the Daily Accrual and the Daily Investor Fee).

The lower the composite forward LIBOR rate (leaving aside the effects of the applicable LIBOR floor), the greater the impact of any given absolute change in the composite forward LIBOR rate. For example, a 0.10% absolute change in the composite forward LIBOR rate represents a larger percentage change from 1.00% than it does from 2.00%. Therefore, leaving aside the effects of the applicable LIBOR floor, lower composite forward LIBOR rates are associated with higher volatility.

The hypothetical back-tested performance of the Indices shows significant historical volatility. See "Hypothetical Back-Tested and Historical Index Information" below. Accordingly, the ETNs are highly speculative and highly risky and are suitable only for sophisticated investors who understand and can bear the risks associated with a highly volatile investment.

The ETNs are designed to be short-term trading instruments and are not suitable for investors with longer-term investment objectives.

The ETNs are not intended to be "buy and hold" investments. The Indices are designed to approximate their stated investment objectives on a daily basis, and their performance over longer periods of time can differ significantly from their stated daily objectives. Even over a single day, the Indices only aim to *approximate* the targeted participation in the daily percentage change of the composite forward LIBOR rate (or its inverse, in the case of the Short LIBOR Index). Over longer periods, there is likely to be a significant deviation between the targeted participation in the percentage change of the composite forward LIBOR rate (or its inverse, in the case of the Short LIBOR Index) and the return of each Index.

A significant portion of this deviation is due to a phenomenon we call "carry". Carry refers to the return (positive or negative) on a position in Eurodollar futures contracts that results solely from the passage of time. This return is independent of changes in the composite forward LIBOR rate.

Carry results because each Index holds a position in hypothetical portfolios of Eurodollar futures contracts over successive one-day periods. On each Index Business Day, each Index reflects gains or losses on Eurodollar futures contracts held since the prior Index Business Day that each have a one-day shorter tenor than they had on the day before. This one-day shortening of tenor may itself have an impact on the prices of those Eurodollar futures contracts that is independent of changes in the composite forward LIBOR rate.

The impact of carry on either Index may be positive or negative and will depend on the shape and steepness of the implied forward LIBOR rate curve. In general, if the implied forward LIBOR rate curve is upward sloping, carry will have a negative effect on the Long LIBOR Index, and if the implied forward LIBOR rate curve is downward sloping, carry will have a negative effect on the Short LIBOR Index. The steeper the curve, the greater the impact of carry. We cannot predict the shape or steepness of the implied forward LIBOR rate curve or the impact of carry on either Index over any future period. The effects of carry are cumulative and are likely to increase as time passes.

See "Description of the Janus Velocity LIBOR Indices" below for more about the effects of carry and for hypothetical illustrations of the potential effects of carry, and see "Hypothetical Forward LIBOR Rate Curves and Eurodollar Futures Trading Price Curves" for examples of hypothetical implied forward LIBOR rate curves.

In addition to carry, the Indices may be adversely affected by "decay", as described below under "—The Short LIBOR Index will experience a "decay" effect, which will worsen over time and will be greater the more volatile the composite forward LIBOR rate" and "—The Long LIBOR Index will experience a "decay" effect at any time when the composite forward LIBOR rate is less than the long LIBOR floor". The effects of decay are likely to worsen the longer the ETNs are held but may have a significant effect over a period as short as two days.

Investors should carefully consider whether the ETNs are appropriate for their investment portfolio. ***Over time, the effects of carry and decay can be quite significant. Even if the composite forward LIBOR rate were to increase significantly over time (in the case of the Long LIBOR Index) or decrease significantly over time (in the case of the Short LIBOR Index), the level of the applicable Index may nevertheless decline significantly because of the effects of carry and/or decay. For this reason, the ETNs are suitable only as short-term trading instruments.*** **You should proceed with extreme caution in considering an investment in the ETNs.**

The ETNs should be purchased only by sophisticated investors who understand the potential consequences of an investment linked to the applicable Index and that is subject to the effects of carry and decay. The ETNs are not appropriate for investors who intend to hold the ETNs as a long-term investment. Any decision to hold the ETNs for more than even one day should be made with great care and **only** as the result of a series of daily (or more frequent) investment decisions to remain invested in the ETNs for the next one-day period.

In addition to carry and decay, the contract spread will contribute to a deviation between the targeted participation in the percentage change of the composite forward LIBOR rate (or its inverse, in the case of the Short LIBOR Index) and the return of each Index, as described in more detail below.

See "Hypothetical Back-Tested and Historical Index Information" in this pricing supplement for information regarding the hypothetical back-tested and historical effects of carry, decay and the contract spread on the Indices. That section includes tables that quantify the effects of carry, decay and the contract spread on each Index during each calendar month in the historical period shown. The tables show that the effects of carry, decay and the contract spread have reduced the performance of the Long LIBOR Index by as much as ***14.13%*** over a single calendar month, and have reduced the performance of the Short LIBOR Index by as much as ***6.45%*** over a single calendar month. Those numbers represent the difference between the performance of the applicable Index over the applicable calendar month and the performance that the applicable Index would have had if it simply reflected the targeted participation in the percentage change (or inverse thereof, in the case of the Short LIBOR Index) in the composite forward LIBOR rate over that month. It is impossible to predict the effects of carry, decay and the contract spread on either Index in the future. The effects of carry, decay and the contract spread over any calendar month in the future may equal or exceed these levels. Over longer periods of time, the effects of carry, decay and the contract spread will likely significantly exceed these levels.

The Long LIBOR ETNs are particularly likely to incur negative carry costs.

Although either Index may incur a negative carry cost, the implied forward LIBOR rate curve has historically been upward sloping more often than it has been downward sloping. An upward sloping implied forward LIBOR rate curve results in a negative carry cost for the Long LIBOR Index. See "Hypothetical Back-Tested Index Information" for hypothetical back-tested data regarding the historical effects of carry, decay and the contract spread on the Long LIBOR Index. ***As a result of this negative carry cost, it is nearly certain that the value of the Long LIBOR ETNs will decline to zero or near zero over their term, regardless of the performance of the composite forward LIBOR rate.***

The Short LIBOR ETNs may incur negative carry costs.

Although the Long LIBOR ETNs are particularly likely to incur negative carry costs, the Short LIBOR ETNs may also incur negative carry costs. The Short LIBOR ETNs may incur these costs if the implied forward LIBOR rate curve is downward sloping. The Short LIBOR ETNs may also incur these costs even if the implied forward LIBOR rate curve is generally upward sloping, if the direction of the slope is different at different parts of the curve and the downward sloping portions are more pronounced than the upward sloping portions. The implied forward LIBOR rate curve may be downward sloping, either generally or in particular sections, because of expectations of falling LIBOR rates, because of sudden market dislocations, because of idiosyncratic supply and demand factors at particular points in the implied forward LIBOR rate curve or for other reasons. These factors are impossible to predict and may cause a position in the Short LIBOR ETNs to incur losses even if the composite forward LIBOR rate is flat or even declines.

Even if the Short LIBOR Index experiences positive carry, the Short LIBOR ETNs may nevertheless experience a sharp decline as a result of a rising composite forward LIBOR rate and/or the decay effect.

The Short LIBOR ETNs track the Short LIBOR Index, which reflects a hypothetical short position with respect to the composite forward LIBOR rate and will decline if the composite forward LIBOR rate rises. Even at a time when the Short LIBOR Index experiences positive carry, that positive carry may be more than offset by a rising composite forward LIBOR rate, resulting in a potentially significant decline in the value of the Short LIBOR ETNs. Furthermore, the Short LIBOR Index will experience a decay effect, as described below under "—The Short LIBOR Index will experience a "decay" effect, which will worsen over time and will be greater the more volatile the composite forward LIBOR rate." The decay effect may offset any positive carry and may, either independently or together with rising composite forward LIBOR rates, result in a decline in the value of the Short LIBOR ETNs even at a time when the Short LIBOR Index experiences positive carry.

Even if the Long LIBOR Index experiences positive carry, the Long LIBOR ETNs may nevertheless experience a sharp decline as a result of a declining composite forward LIBOR rate and/or the decay effect.

The Long LIBOR ETNs track the Long LIBOR Index, which reflects a hypothetical long investment in the composite forward LIBOR rate and will decline if the composite forward LIBOR rate declines. Even at a time when the Long LIBOR Index experiences positive carry, that positive carry may be more than offset by a declining composite forward LIBOR rate, resulting in a potentially significant decline in the value of the Long LIBOR ETNs.

Furthermore, the Long LIBOR Index may experience a decay effect, as described below under "—The Long LIBOR Index will experience a "decay" effect at any time when the composite forward LIBOR rate is less than the long LIBOR floor." The decay effect may offset any positive carry and may, either independently or together with declining composite forward LIBOR rates, result in a decline in the value of the Long LIBOR ETNs even at a time when the Long LIBOR Index experiences positive carry.

The ETNs may incur greater carry costs than alternative means of investing in forward LIBOR rates.

The Indices tracked by the ETNs seek to approximate the daily performance of a hypothetical long or short position in the composite forward LIBOR rate. The composite forward LIBOR rate is the weighted average of the forward LIBOR rates implied in the daily settlement prices of the next 8 quarterly Eurodollar futures contracts, where those contracts have a weighted average tenor of approximately one year. An investor could obtain similar exposure by investing directly in Eurodollar futures contracts and rolling that position periodically. For example, an investor could invest in a Eurodollar futures contract with a tenor of 12 months and hold that position for 3 months, and then unwind that position and invest in the next quarterly Eurodollar futures contract (which will then have a tenor of 12 months), and so on. Or an investor could invest in a Eurodollar futures contract with a tenor of 12 months on one day, and then on the next day unwind a portion of that position and invest that portion in a Eurodollar futures contract expiring 3 months later, and so on each day in a manner that maintains a weighted average tenor of approximately one year. There are many other ways in which an investor could invest in Eurodollar futures contracts and obtain exposure to forward LIBOR rates. The carry costs incurred by the ETNs may be more or less than the carry costs incurred by any other method of obtaining exposure to forward LIBOR rates, depending on the steepness of the implied forward LIBOR rate curve at each relevant section of that curve.

Because of the applicable LIBOR floor, the Indices may aim to approximate only a portion of the daily percentage change (or the inverse thereof, in the case of the Short LIBOR Index) in the composite forward LIBOR rate.

At any time when the composite forward LIBOR rate is less than the applicable LIBOR floor, the Indices will aim to approximate only a portion of the daily percentage change (or the inverse thereof, in the case of the Short LIBOR Index) in the composite forward LIBOR rate.

In the case of the Long LIBOR Index, the long LIBOR floor is 1.00%. As a result, at any time when the composite forward LIBOR rate is less than 1.00%, the Long LIBOR Index will aim to approximate only a portion of the daily percentage change in the composite forward LIBOR rate. The "targeted participation" of the Long LIBOR Index from one Index Business Day to the next will be equal to the composite forward LIBOR rate on the first Index Business Day *divided by* the long LIBOR floor. For example, if the composite forward LIBOR rate is 0.50% on a given Index Business Day, that would result in a 50% targeted participation (0.50% *divided by* the long LIBOR floor of 1.00%), and the Long LIBOR Index would aim to approximate only 50% of the percentage change in the composite forward LIBOR rate over the next Index Business Day (subject to the effects of carry and the contract spread). This would mean, for example, that if the composite forward LIBOR rate were to increase by 5% over the next Index Business Day (from 0.50% to 0.55%), the Long LIBOR Index would aim to increase by only approximately 2.5% (subject to the effects of carry and the contract spread).

In the case of the Short LIBOR Index, the short LIBOR floor is 2.50%. As a result, at any time when the composite forward LIBOR rate is less than 2.50%, the Short LIBOR Index will aim to approximate only a portion of the inverse of the daily percentage change in the composite forward LIBOR rate. The "targeted participation" of the Short LIBOR Index from one Index Business Day to the next will be equal to the composite forward LIBOR rate on the first Index Business Day *divided by* the short LIBOR floor. For example, if the composite forward LIBOR rate is 0.50% on a given Index Business Day, that would result in a 20% targeted participation (0.50% *divided by* the short LIBOR floor of 2.50%), and the Short LIBOR Index would aim to approximate only 20% of the inverse of the percentage change in the composite forward LIBOR rate over the next Index Business Day (subject to the effects of carry and the contract spread). This would mean, for example, that if the composite forward LIBOR rate were to decrease by 5% over the next Index Business Day (from 0.50% to 0.45%), the Short LIBOR Index would aim to increase by only approximately 1% (subject to the effects of carry and the contract spread).

At any time when the composite forward LIBOR rate is below the applicable LIBOR floor, an Index may significantly underperform the percentage change in the composite forward LIBOR rate (or the inverse thereof, in the case of the Short LIBOR Index).

The Short LIBOR Index will experience a "decay" effect, which will worsen over time and will be greater the more volatile the composite forward LIBOR rate.

The Short LIBOR Index will be subject to a "decay" effect, which refers to a likely tendency to lose value over time independent of the directional movement of the composite forward LIBOR rate over that time period. The decay effect will worsen over time and will be greater the more volatile the composite forward LIBOR rate. Although the decay effect is more likely to manifest itself the longer the Short LIBOR ETNs are held, the decay effect can have a significant impact on the performance of the Short LIBOR Index (and, therefore, the Short LIBOR ETNs) even over a period as short as two days.

The Short LIBOR Index will experience a decay effect any time the composite forward LIBOR rate moves in one direction on one Index Business Day and then moves in the other direction on the next Index Business Day. The decay effect results because the return of the Short LIBOR Index from Day 1 to Day 2 aims to approximate the inverse of the change in the composite forward LIBOR rate from Day 1 to Day 2, *expressed as a percentage of the composite forward LIBOR rate on Day 1*. For any given absolute change in the composite forward LIBOR rate from Day 1 to Day 2, the percentage change that results from that absolute change will be lower for a higher composite forward LIBOR rate on Day 1, and higher for a lower composite forward LIBOR rate on Day 1. As a result, if the composite forward LIBOR rate increases by a given amount from Day 1 to Day 2, and then decreases by the same absolute amount from Day 2 to Day 3, the increase from Day 1 to Day 2 will represent a greater percentage change (and therefore result in a greater decline in the level of the Short LIBOR Index) than the decrease (and corresponding increase in the level of the Short LIBOR Index) from Day 2 to Day 3. This will result in a lower Short LIBOR Index level on Day 3 than on Day 1, even though the composite forward LIBOR rate is the same on Day 3 as it was on Day 1.

For example, assume the composite forward LIBOR rate is 2.50% on Day 1, 2.60% on Day 2 and then returns to 2.50% on Day 3. In this example, the 0.10% absolute increase from Day 1 to Day 2 would represent a 4% percentage increase from Day 1 to Day 2, since 0.10% is 4% of the composite forward LIBOR rate of 2.50% on Day 1. As a result, the level of the Short LIBOR Index (which moves inversely with the composite forward LIBOR rate) would aim to decrease by approximately 4%. From Day 2 to Day 3, the 0.10% absolute decrease would represent an approximately 3.8462% percentage decrease in the composite forward LIBOR rate from Day 2 to Day 3, since 0.10% is approximately 3.8462% of the composite forward LIBOR rate of 2.60% on Day 2. As a result, the Short LIBOR Index would aim to increase by only approximately 3.8462% from Day 2 to Day 3. After decreasing by 4% from Day 1 to Day 2, and then increasing by only 3.8462% (of the Day 2 index level, which was lower than the Day 1 index level) from Day 2 to Day 3, the closing level of the Short LIBOR Index would be lower on Day 3 than it was on Day 1, even though the composite forward LIBOR rate is the same on Day 3 as it was on Day 1.

The table below illustrates the potential decay effect on the Short LIBOR Index over a hypothetical period of 21 Index Business Days. On each Index Business Day in the table below, the composite forward LIBOR rate has either increased or decreased by 0.10% in absolute terms from the composite forward LIBOR rate on the previous day. The table shows, for each Index Business Day, the percentage change in the composite forward LIBOR rate from the prior Index Business Day, the resulting Short LIBOR Index level and the percentage change in that level from the level of the Short LIBOR Index on Day 0. To isolate the decay effect, the table below assumes no carry and disregards the contract spread. If carry and the contract spread were taken into account, the Short LIBOR Index levels could be lower than the levels indicated below. The table assumes a hypothetical Short LIBOR Index level on Day 0 of 100. The figures illustrated below are purely hypothetical and are not meant to be indicative of what the actual composite forward LIBOR rate or daily percentage change in the composite forward LIBOR rate will be at any time.

Day	Composite Forward LIBOR Rate	% Change from Prior Day's Composite Forward LIBOR Rate	Short LIBOR Index Level	% Change from Short LIBOR Index Level on Day 0
0	2.50%		100.0000	
1	2.50%	0.0000%	100.0000	0.0000%
2	2.60%	4.0000%	96.0000	-4.0000%
3	2.50%	-3.8462%	99.6923	-0.3077%
4	2.60%	4.0000%	95.7046	-4.2954%
5	2.50%	-3.8462%	99.3856	-0.6144%
6	2.60%	4.0000%	95.4101	-4.5899%
7	2.50%	-3.8462%	99.0798	-0.9202%
8	2.60%	4.0000%	95.1166	-4.8834%
9	2.50%	-3.8462%	98.7749	-1.2251%
10	2.60%	4.0000%	94.8239	-5.1761%
11	2.50%	-3.8462%	98.4710	-1.5290%
12	2.60%	4.0000%	94.5321	-5.4679%
13	2.50%	-3.8462%	98.1680	-1.8320%
14	2.60%	4.0000%	94.2413	-5.7587%
15	2.50%	-3.8462%	97.8659	-2.1341%
16	2.60%	4.0000%	93.9513	-6.0487%
17	2.50%	-3.8462%	97.5648	-2.4352%
18	2.60%	4.0000%	93.6622	-6.3378%
19	2.50%	-3.8462%	97.2646	-2.7354%
20	2.60%	4.0000%	93.3740	-6.6260%
21	**2.50%**	-3.8462%	**96.9653**	**-3.0347%**

In this example, the composite forward LIBOR rate is the same at the end of the hypothetical 21 Index Business Day period as it was at the beginning of the period, but the level of the Short LIBOR Index is more than 3% lower than it was at the beginning of the period due to the decay effect. If the period of time illustrated by the table were longer, or if the volatility of the composite forward LIBOR rate were greater (i.e., if the daily percentage changes in the composite forward LIBOR were greater than the percentage changes illustrated above), the decay effect would be greater, and possibly significantly greater.

To isolate the decay effect, the table above assumes that the composite forward LIBOR rate is the same at the end of the 21 Index Business Day period as it was at the beginning of the period. If the composite forward LIBOR rate had increased over this period, the decay effect would have exacerbated the resulting decrease in the level of the Short LIBOR Index. If the composite forward LIBOR rate had decreased over this period, the decay effect would have offset the decrease at least partially. It is possible that, even if the composite forward LIBOR rate had decreased over this period, the decay effect could have been greater than the effect of the decrease, resulting in a decline in the level of the Short LIBOR Index even at a time when the composite forward LIBOR rate has decreased.

By illustrating the decay effect over 21 Index Business Days, we are not suggesting that 21 Index Business Days is an appropriate period of time to hold the Short LIBOR ETNs. Rather, we are illustrating the potential negative effects of decay over 21 Index Business Days to illustrate how these effects increase over a number of days and to illustrate that the risks of the Short LIBOR ETNs increase the longer they are held. As described elsewhere in this pricing supplement, the Short LIBOR ETNs are intended to be short-term trading tools for sophisticated investors to manage short-term trading risks.

The Long LIBOR Index will experience a "decay" effect at any time when the composite forward LIBOR rate is less than the long LIBOR floor.

At any time when the composite forward LIBOR rate is less than the long LIBOR floor, the Long LIBOR Index will have a targeted participation of less than 100% in the percentage change in the composite forward LIBOR rate over the next Index Business Day. The targeted participation will reset on each Index Business Day on which

the composite forward LIBOR rate is less than the long LIBOR floor based on that day's composite forward LIBOR rate. A higher composite forward LIBOR rate results in a higher targeted participation over the next Index Business Day, and a lower composite forward LIBOR rate results in a lower targeted participation over the next Index Business Day.

This daily resetting of the targeted participation at a time when the composite forward LIBOR rate is below the long LIBOR floor is likely to cause the Long LIBOR Index (and, therefore, the Long LIBOR ETNs) to experience a "decay" effect, which is likely to worsen over time and will be greater the more volatile the composite forward LIBOR rate. The decay effect refers to a likely tendency of the Long LIBOR Index to lose value over time when the composite forward LIBOR rate is less than the long LIBOR floor, independent of the directional movement of the composite forward LIBOR rate over that time period. Although the decay effect is more likely to manifest itself the longer the Long LIBOR ETNs are held, the decay effect can have a significant impact on the performance of the Long LIBOR Index (and, therefore, the Long LIBOR ETNs) even over a period as short as two days.

At any time when the composite forward LIBOR rate is less than the long LIBOR floor, the decay effect results whenever the composite forward LIBOR rate moves in one direction on one Index Business Day and then moves in the other direction on the next Index Business Day. In other words, if the composite forward LIBOR rate is below the long LIBOR floor and increases on one Index Business Day and decreases on the next, or decreases on one Index Business Day and increases on the next, the Long LIBOR Index will experience a decay in its value.

For the Long LIBOR Index, the decay results because, if the composite forward LIBOR rate decreases on one day and then increases on the next, it will have a higher targeted participation in the decline than it has in the increase. For example, suppose the composite forward LIBOR rate is 0.50% on Day 1, 0.40% on Day 2 and returns to 0.50% on Day 3. In this example, the Long LIBOR Index would have a 50% targeted participation in the 20% decline in the composite forward LIBOR rate from Day 1 to Day 2, because the composite forward LIBOR rate on Day 1 of 0.50% *divided by* the long LIBOR floor of 1.00% is 50%. The Long LIBOR Index would then have only a 40% targeted participation in the 25% increase in the composite forward LIBOR rate from Day 2 to Day 3, because the composite forward LIBOR rate on Day 2 of 0.40% *divided by* the long LIBOR floor of 1.00% is 40%. As a result, even though the composite forward LIBOR rate is the same on Day 3 as it was on Day 1, the level of the Long LIBOR Index would be lower on Day 3 than it was on Day 1.

The table below illustrates the potential decay effect on the Long LIBOR Index over a hypothetical period of 21 Index Business Days when the composite forward LIBOR rate is below the long LIBOR floor. On each Index Business Day in the table below, the composite forward LIBOR rate has either increased or decreased by 0.10% in absolute terms from the composite forward LIBOR rate on the previous day. The table shows, for each Index Business Day, the percentage change in the composite forward LIBOR rate from the prior Index Business Day, the targeted participation in that percentage change, the resulting Long LIBOR Index level and the percentage change in that level from the level of the Long LIBOR Index on Day 0. To isolate the decay effect, the table below assumes no carry and disregards the contract spread. If carry and the contract spread were taken into account, the Long LIBOR Index levels could be lower than the levels indicated below. The table assumes a hypothetical Long LIBOR Index level on Day 0 of 100. The figures illustrated below are purely hypothetical and are not meant to be indicative of what the actual composite forward LIBOR rate or daily percentage change in the composite forward LIBOR rate will be at any time.

Day	Composite Forward LIBOR Rate	% Change from Prior Day's Composite Forward LIBOR Rate	Targeted Participation	Long LIBOR Index Level	% Change from Long LIBOR Index Level on Day 0
0	0.50%			100.0000	
1	0.50%	0%	50%	100.0000	0.0000%
2	0.40%	-20%	50%	90.0000	-10.0000%
3	0.50%	25%	40%	99.0000	-1.0000%
4	0.40%	-20%	50%	89.1000	-10.9000%
5	0.50%	25%	40%	98.0100	-1.9900%
6	0.40%	-20%	50%	88.2090	-11.7910%

7	0.50%	25%	40%	97.0299	-2.9701%
8	0.40%	-20%	50%	87.3269	-12.6731%
9	0.50%	25%	40%	96.0596	-3.9404%
10	0.40%	-20%	50%	86.4536	-13.5464%
11	0.50%	25%	40%	95.0990	-4.9010%
12	0.40%	-20%	50%	85.5891	-14.4109%
13	0.50%	25%	40%	94.1480	-5.8520%
14	0.40%	-20%	50%	84.7332	-15.2668%
15	0.50%	25%	40%	93.2065	-6.7935%
16	0.40%	-20%	50%	83.8859	-16.1141%
17	0.50%	25%	40%	92.2745	-7.7255%
18	0.40%	-20%	50%	83.0470	-16.9530%
19	0.50%	25%	40%	91.3517	-8.6483%
20	0.40%	-20%	50%	82.2166	-17.7834%
21	**0.50%**	25%	40%	**90.4382**	**-9.5618%**

In this example, the composite forward LIBOR rate is the same at the end of the hypothetical 21 Index Business Day period as it was at the beginning of the period, but the level of the Long LIBOR Index is more than 9.5% lower than it was at the beginning of the period due to the decay effect. If the period of time illustrated by the table were longer, or if the volatility of the composite forward LIBOR rate were greater (i.e., if the daily percentage changes in the composite forward LIBOR were greater than the percentage changes illustrated above), the decay effect would be greater, and possibly significantly greater.

To isolate the decay effect, the table above assumes that the composite forward LIBOR rate is the same at the end of the 21 Index Business Day period as it was at the beginning of the period. If the composite forward LIBOR rate had decreased over this period, the decay effect would have exacerbated the resulting decrease in the level of the Long LIBOR Index. If the composite forward LIBOR rate had increased over this period, the decay effect would have offset the increase at least partially. It is possible that, even if the composite forward LIBOR rate had increased over this period, the decay effect might have been greater than the effect of the increase, resulting in a decline in the level of the Long LIBOR Index even at a time when the composite forward LIBOR rate has increased.

By illustrating the decay effect over 21 Index Business Days, we are not suggesting that 21 Index Business Days is an appropriate period of time to hold the Long LIBOR ETNs. Rather, we are illustrating the potential negative effects of decay over 21 Index Business Days to illustrate how these effects increase over a number of days and to illustrate that the risks of the Long LIBOR ETNs increase the longer they are held. As described elsewhere in this pricing supplement, the Long LIBOR ETNs are intended to be short-term trading tools for sophisticated investors to manage short-term trading risks.

The performance of each Index will be reduced by a contract spread.

The performance of each Index is reduced by a hypothetical daily transaction cost that we refer to as the contract spread. The contract spread is intended to reflect a hypothetical transaction cost associated with the daily adjustment to each Index's exposure to Eurodollar futures contracts. As discussed in "Description of the Janus Velocity LIBOR Indices" below, the weights of the first and eighth quarterly Eurodollar futures contracts tracked by each Index are adjusted daily in an attempt to maintain a weighted average tenor of approximately one year. In addition, each Index's exposure to all eight Eurodollar futures contracts is adjusted daily as necessary to approximate the targeted participation in the daily percentage change (or the inverse thereof) in the composite forward LIBOR rate over the next day. These adjustments to each Index's exposure to the Eurodollar futures contracts result in increases or decreases in the size of each Index's hypothetical position in each of those contracts. The amount of the hypothetical position in each contract that is either increased or decreased is not implemented at the daily settlement price for the relevant contract on that day, but at the daily settlement price as adjusted by a notional transaction cost equal to .0025. The daily deduction of this notional transaction cost will have a negative effect on the level of each Index on a daily basis.

See "Hypothetical Back-Tested and Historical Index Information" in this pricing supplement for information about the impact of the contract spread on the hypothetical back-tested and historical performance of

each Index. That section includes tables that quantify the effects of the contract spread on each Index during each calendar month in the historical period shown. The tables show that the effects of the contract spread have reduced the performance of the Long LIBOR Index by as much as ***3.18%*** (annualized) over a single calendar month, and have reduced the performance of the Short LIBOR Index by as much as ***1.77%*** (annualized) over a single calendar month. It is impossible to predict the effects of the contract spread on either Index in the future. The effects of the contract spread over any calendar month in the future may equal or exceed these levels.

The daily return of each series of ETNs will be reduced by the Daily Investor Fee.

The Indicative Value of each series of ETNs will be reduced on a daily basis by a Daily Investor Fee. The Daily Investor Fee is equal to 1.50% per annum and is applied to each day's Closing Indicative Value.

An Early Redemption Charge of 0.20% per ETN will be charged upon an early redemption.

We will charge a fee of 0.20% *times* the Closing Indicative Value per ETN upon an early redemption. The imposition of the fee will mean that you will not receive the full amount of the Closing Indicative Value upon an early redemption at your election.

The cumulative effect of embedded costs may cause your ETNs to decline in value even if you correctly anticipate the movement of the composite forward LIBOR rate.

The value of each series of ETNs will be reduced on a daily basis by the Daily Investor Fee, which is deducted from the Indicative Value of the ETNs on each Index Business Day, and by the contract spread, which reduces the value of each Index (and, in turn, the value of each series of ETNs) on each Index Business Day. Upon issuance of any ETNs, CGMI may charge a creation fee, and upon early redemption, an Early Redemption Charge will be deducted from the value of the ETNs. Furthermore, either Index may experience significant carry costs and/or decay over any given period of time. The cumulative effect of these costs will reduce the return on your investment in the ETNs independently of movements in the composite forward LIBOR rate, offsetting any favorable movement in the composite forward LIBOR rate and exacerbating any unfavorable movement. Even if the composite forward LIBOR rate moves in a direction that is favorable to you (*i.e.*, up in the case of the Long LIBOR ETNs, and down in the case of the Short LIBOR ETNs), these embedded costs may cause the value of your ETNs to decline.

The composite forward LIBOR rate differs from the spot LIBOR rate and may lead to returns on the ETNs that are materially different than if the ETNs were linked to the spot LIBOR rate.

As a composite of forward LIBOR rates, the composite forward LIBOR rate is not the same as the current spot LIBOR rate at any given time. The spot LIBOR rate at any time provides an indication of the current rate at which banks can obtain unsecured funding in the London interbank market at that time for a 3-month term in U.S. dollars. A forward LIBOR rate, by contrast, is a market indication of the rate at which banks may be able to borrow U.S. dollars for a 3-month term in the London interbank market in the future. Spot LIBOR rates and forward LIBOR rates are not necessarily driven by the same factors. Movements in spot LIBOR rates may not be reflected in movements of forward LIBOR rates, and movements in forward LIBOR rates may not be reflected in movements of spot LIBOR rates. They may even move in opposite directions. As a result, an investment based on the composite forward LIBOR rate may realize losses even if an otherwise similar investment based on the spot LIBOR rate would have achieved gains.

The composite forward LIBOR rate differs from the 1-year forward LIBOR rate and may lead to returns on the ETNs that are materially different than if the ETNs were linked to the 1-year forward LIBOR rate.

It is important to understand that the composite forward LIBOR rate is not equivalent to the 1-year forward LIBOR rate, even though it is based on Eurodollar futures contracts with a weighted average tenor of approximately 1 year. The composite forward LIBOR rate is a weighted average of forward LIBOR rates covering 8 different forward time periods ranging over a period of up to 2 years, and this weighted average may differ from the 1-year implied forward LIBOR rate at any given time. See "Hypothetical Forward LIBOR Rate Curves and Eurodollar Futures Trading Price Curves—Composite Forward LIBOR Rate Vs. 1-Year Implied Forward LIBOR Rate" for hypothetical forward LIBOR rate curves that illustrate the potential difference between the composite forward

LIBOR rate and the 1-year implied forward LIBOR rate. An investment based on the composite forward LIBOR rate may realize losses even if an otherwise similar investment based on the 1-year forward LIBOR rate would have achieved gains.

Favorable movements in some of the Eurodollar futures contracts tracked by the applicable Index may be offset by unfavorable movements in other contracts.

The composite forward LIBOR rate is a weighted average of the forward LIBOR rates implied in the prices of 8 Eurodollar futures contracts with tenors ranging over a period of up to 2 years. The forward LIBOR rates implied in the prices of those contracts need not move in a consistent direction. Even if certain of those forward LIBOR rates move in a favorable direction, others may move in an unfavorable direction, offsetting or more than offsetting the movements of the rates that moved in a favorable direction. As a result, an investment in or linked to only one or a smaller subset of the Eurodollar futures contracts underlying the Indices might achieve better returns than an investment in the ETNs.

The composite forward LIBOR rate will be influenced by many unpredictable factors.

The forward LIBOR rates that are used to calculate the composite forward LIBOR rate will be influenced by many factors, including:

- the monetary policy of the Federal Reserve;
- the perceived creditworthiness of financial institutions in the London interbank market;
- the current spot LIBOR rate;
- current market expectations about future spot LIBOR rates;
- current market expectations about inflation;
- supply and demand in the market for the Eurodollar futures contracts that are used to determine the implied forward LIBOR rates; and
- general credit and economic conditions.

We cannot predict how these factors may influence the composite forward LIBOR rate over any period of time in the future. The ETNs are subject to the risk that the composite forward LIBOR rate may change in unanticipated ways.

The composite forward LIBOR rate is determined based on the trading prices of Eurodollar futures contracts and will be affected by factors that affect the trading market for those contracts.

The composite forward LIBOR rate is not a pure measure of interest rates charged in the market, but rather is a measure implied in the trading prices of specified Eurodollar futures contracts. As a result, the composite forward LIBOR rate will be affected by factors that affect the trading market for those contracts, which may be independent of any fundamental change in market expectations of future spot LIBOR rates.

The trading price of a Eurodollar futures contract is based on market supply and demand. Imbalances in supply or demand or a lack of liquidity may influence trading prices independently of any fundamental change in market expectations of future spot LIBOR rates. For example, suppose a single market participant seeks to hedge a large obligation in a Eurodollar futures contract with a 1-year tenor, and suppose that particular tenor is relatively illiquid. In that circumstance, that large position may move the market for that contract, leading to a large shift in the price of that contract and resulting in a "kink" in the implied forward LIBOR rate curve. Factors such as these may cause Eurodollar futures contract trading prices – and thus the composite forward LIBOR rate – to fail to accurately reflect market expectations of future spot LIBOR rates.

The Long LIBOR ETNs and Short LIBOR ETNs are unlikely to perform exactly inversely to each other.

Although the Long LIBOR ETNs and Short LIBOR ETNs take opposite positions with respect to changes in the composite forward LIBOR rate, their performances are unlikely to be exact mirror images of each other, and the divergence from exact inverse performance is likely to increase over longer periods of time. Reasons for this divergence include differences in the applicable LIBOR floor (and therefore in the targeted participation in changes in the composite forward LIBOR rate) and the differing effects of decay on the Short LIBOR Index as compared to the Long LIBOR Index.

As the composite forward LIBOR rate increases, any favorable absolute change in the composite forward LIBOR rate will have a less favorable effect on the level of the applicable Index than it would if the composite forward LIBOR rate were lower.

Each Index aims to approximate its targeted participation in the daily percentage change (or the inverse thereof, in the case of the Short LIBOR Index) in the composite forward LIBOR rate (subject to the effects of carry and the contract spread, as described in "Description of the Janus Velocity LIBOR Indices" below). As the composite forward LIBOR rate increases, any favorable absolute change in the composite forward LIBOR rate will represent a smaller percentage change than it would if the same absolute change had occurred from a lower starting composite forward LIBOR rate. As a result, the increase in the level of the applicable Index resulting from that favorable absolute change will be lower than it would have been if the composite forward LIBOR rate had been lower.

For example, with respect to the Long LIBOR Index, if the composite forward LIBOR rate were to increase from 1.00% to 1.10% from one day to the next, which is an increase of 0.10% in absolute terms, that would represent a 10% percentage increase in the composite forward LIBOR rate, and the Long LIBOR Index would aim to increase by approximately 10%. But if the level of the composite forward LIBOR rate were to increase from 2.00% to 2.10% from one day to the next, which is also an increase of 0.10% in absolute terms, that would represent only a 5% percentage increase in the composite forward LIBOR rate, and the Long LIBOR Index would aim to increase by only approximately 5%.

To take a similar example with respect to the Short LIBOR Index, if the composite forward LIBOR rate were to decrease from 2.50% to 2.25% from one day to the next, which is a decrease of 0.25% in absolute terms, that would represent a 10% percentage decrease in the composite forward LIBOR rate, and the Short LIBOR Index would aim to increase by approximately 10%. But if the level of the composite forward LIBOR rate were to decrease from 5.00% to 4.75% from one day to the next, which is also a decrease of 0.25% in absolute terms, that would represent only a 5% percentage decrease in the composite forward LIBOR rate, and the Short LIBOR Index would aim to increase by only approximately 5%.

As these examples illustrate, the higher the composite forward LIBOR rate, the lower the benefit of any favorable absolute change in the composite forward LIBOR rate.

The ETNs are subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

Although the return on the ETNs of each series will be based on the performance of the applicable Index, the payment of any amount due on the ETNs, including any payment at maturity or upon early redemption or acceleration, is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc. Investors are dependent on Citigroup Global Markets Holdings Inc.'s ability to pay all amounts due on the ETNs and Citigroup Inc.'s ability to perform its obligations under its guarantee, and therefore investors are subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc. In addition, any decline in the credit ratings of Citigroup Global Markets Holdings Inc. or Citigroup Inc., any adverse changes in the market's view of the creditworthiness of either entity or any increase in either entity's credit spreads is likely to adversely affect the market value of the ETNs.

The ETNs may not be a suitable investment for you.

The ETNs may not be a suitable investment for you if:

- You are not willing to be exposed to daily fluctuations in the prices of Eurodollar futures contracts in general and in the level of the applicable Index in particular.
- You seek a certain return of your initial investment.
- You seek an investment with a longer-term investment objective.
- You are not willing to actively and frequently monitor your investment in the ETNs.
- You believe the level of the applicable Index will decrease or will not increase by an amount, and at a time or times, sufficient to offset the sum of the Daily Investor Fee (and, if applicable, the Early Redemption Charge and the creation fee) over your intended holding period of the ETNs and to provide you with a satisfactory return on your investment during the time you hold the ETNs.
- You prefer the lower risk and therefore accept the potentially lower returns of fixed income investments with comparable maturities and credit ratings.
- You seek current income from your investment.
- You are not a sophisticated investor or you seek an investment for purposes other than managing short-term trading risks.
- You do not want to pay the Daily Investor Fee, the Early Redemption Charge or the creation fee, which are charged on the ETNs and will reduce your return (or increase your loss, as applicable) on your investment.

If a Trigger Event occurs, the ETNs will be automatically accelerated and you will likely incur a significant loss on, and may lose up to all of, your investment.

If the Intraday Indicative Value of any series of ETNs at any time on any scheduled Index Business Day is less than 50% of the Closing Indicative Value of such series of ETNs on the immediately preceding Index Business Day (meaning that the Intraday Indicative Value has declined by more than 50% from the prior Index Business Day's Closing Indicative Value), a Trigger Event will be deemed to have occurred and such series of ETNs will be automatically accelerated. Upon such Automatic Acceleration, the holders of such ETNs will receive a cash payment per ETN equal to the Automatic Acceleration Redemption Amount, which will be equal to the Closing Indicative Value of such series of ETNs on the Automatic Acceleration Valuation Date (which is the Index Business Day immediately following the date on which the Trigger Event occurs), calculated as though the closing level of the applicable Index on both the date on which the Trigger Event occurs and on the Automatic Acceleration Valuation Date were equal to the Automatic Acceleration Index Level of the applicable Index. The Automatic Acceleration Index Level of the applicable Index will be an alternative closing level of the applicable Index calculated by the ETN Calculation Agents based on the volume-weighted average trading price of the underlying Eurodollar futures contracts over an Automatic Acceleration Valuation Period.

The fact that a Trigger Event occurs when the Intraday Indicative Value of the ETNs is less than 50% of the Closing Indicative Value on the prior Index Business Day does not mean that the Automatic Acceleration Redemption Amount payable following Automatic Redemption will be equal to 50% of the Closing Indicative Value on the prior Index Business Day. If the underlying Eurodollar futures contracts continue to move sharply in an adverse direction after the Trigger Event occurs and during the Automatic Acceleration Valuation Period, that adverse movement will be reflected in the Automatic Acceleration Redemption Amount. It is possible that the amount a holder receives after Automatic Acceleration of the ETNs would be significantly less than 50% of the Closing Indicative Value on the prior Index Business Day and may be zero.

If a Trigger Event occurs, the ETNs will be automatically accelerated, even if the sharp fall in the applicable Index that triggers the Trigger Event is temporary and quickly reversed. An Automatic Acceleration may cause the return on the ETNs to be worse than it would have been if the ETNs had not been automatically accelerated. For example, suppose there is a surprise announcement that causes a sharp (greater than 50%) drop in the level of the applicable Index one Index Business Day, causing a Trigger Event to occur and leading to Automatic

Acceleration of the ETNs based on that sharply lower level. Suppose then that, after having had time to absorb the news, the market recovers most of its losses. In that case, a direct investor in Eurodollar futures contracts would have seen its losses pared by the subsequent recovery. The investor in the ETNs, however, would have had its significant losses crystallized as a result of the Automatic Acceleration provision.

In the event of Automatic Acceleration, there is an increased risk that our hedging activity in Eurodollar futures contracts will impact the market price of those contracts, and in turn the Automatic Acceleration Redemption Amount of the applicable ETNs.

If a Trigger Event occurs with respect to any series of ETNs, those ETNs will be automatically accelerated and we will pay the holder of the ETNs an amount based on an alternative calculation of the level of the applicable Index using the volume-weighted average trading price of the underlying Eurodollar futures contracts over the Automatic Acceleration Valuation Period. If a Trigger Event occurs, we expect that the counterparty through which we hedge our obligations under the ETNs will seek to unwind any hedge it has in place with respect to the ETNs during the Automatic Acceleration Valuation Period. If the amount of ETNs outstanding at the time of a Trigger Event is substantial, our hedging counterparty may have a sizeable position with respect to Eurodollar futures contracts. The Automatic Acceleration Valuation Period may be as short as one Index Business Day. The efforts of our hedging counterparty to unwind a sizeable position in Eurodollar futures contracts over a relatively short period of time could have a potentially market-moving effect on the price of Eurodollar futures contracts and could exacerbate any price movements that take place within the Automatic Acceleration Valuation Period, resulting in a lower payment on the ETNs following the Automatic Acceleration. Our affiliates may also engage in other trading activity unrelated to the ETNs during the Automatic Acceleration Valuation Period. This trading activity could compound the effects of our hedging counterparty's hedging unwind activity during the Automatic Acceleration Valuation Period. Our affiliates may profit from trading activity during the Automatic Acceleration Valuation Period even at a time when investors in the applicable series of ETNs suffer a significant loss.

If a Market Disruption Event occurs, the ETN Calculation Agents may be required to exercise discretion in making certain important determinations, and any determination they make may be adverse to you.

From time to time, the Eurodollar futures markets may be subject to trading disruptions, such as trading halts, trading at limit prices and the failure to publish trading prices, that may result in the occurrence of a Market Disruption Event under the terms of the ETNs. The ETN Calculation Agents will have discretion to determine whether any event constitutes a Market Disruption Event under the terms of the ETNs. In addition, at any time when a Market Disruption Event occurs, the ETN Calculation Agents will have discretion to calculate an appropriate level of the applicable Index to use for purposes of calculating the Closing Indicative Value or Intraday Indicative Value of the ETNs taking into account the nature and duration of such Market Disruption Event. If a Market Disruption Event occurs during a Valuation Period or on a Valuation Date (or on the immediately preceding Index Business Day), this discretionary determination by the ETN Calculation Agents will have a direct impact on the Redemption Amount that we pay to holders of the ETNs.

Although a Market Disruption Event may occur at any time, there is a heightened risk that a Market Disruption Event will occur at a time when a Trigger Event has occurred and the ETNs have been automatically accelerated. This is because a Trigger Event will occur when there has been an extraordinary intraday change in the level of the applicable Index, which is a time when markets are more likely to be disrupted. Accordingly, if an Automatic Acceleration of any series of ETNs occurs, there is a heightened risk that the ETN Calculation Agents will be required to exercise discretion in determining the level of the applicable Index, both for purposes of determining whether the Trigger Event has occurred and for purposes of calculating the amount of the payment to be received by holders of the ETNs following the acceleration.

In making discretionary determinations in connection with a Market Disruption Event, the ETN Calculation Agents will take into account the impact of that event on any hedging transaction that we or our affiliates may have in place with respect to the ETNs. In making these determinations, the ETN Calculation Agents will be obligated to act in good faith and using commercially reasonable judgment, but in so doing they may take actions to protect our interests and the interests of our affiliates even when so doing may not be in your interests. The ETN Calculation Agents are not your fiduciaries and have no obligation to take into account your interests in making discretionary determinations under the ETNs. Because one of the ETN Calculation Agents, CGMI, is our affiliate, CGMI's interests as our affiliate may cause its interests to conflict with yours in making any determinations under the ETNs.

In the event of any disagreement between CGMI and JICS in making determinations that the ETN Calculation Agents are required to make jointly under the terms of the ETNs, CGMI's determination (following a dispute resolution procedure) will control.

Any discretionary determinations made by the ETN Calculation Agents may adversely affect the return on the ETNs.

The NYSE Arca may halt trading in the ETNs or may limit the extent to which trading prices may change within specified time periods, which in either case would adversely impact investors' ability to sell the ETNs.

Trading in the ETNs may be halted due to market conditions or, in the judgment of the exchange, if necessary to protect investors or in the public interest. General exchange trading is subject to trading halts caused by extraordinary market volatility pursuant to "circuit breaker" rules based on a specified decline in a market index (e.g., the S&P 500® Index). In addition, a particular series of ETNs may be subject to "limit up" and "limit down" rules or trading pause requirements that are triggered by a significant change in the trading price of those ETNs within a specified period of time. These "limit up" and "limit down" and trading pause rules, if triggered, could prevent investors from transacting at the then prevailing Intraday Indicative Value or at all. If the level of the applicable Index declines during the trading day, triggering a "limit down" mechanism or trading pause, you may be unable to sell your ETNs for some period of time, either because no trading at all is permitted or because the price that any purchaser would be willing to pay for them at the time may be significantly below the lowest price that a purchaser would be permitted to pay for them on the exchange. In that circumstance, by the time you are finally able to sell your ETNs, you may have incurred significantly greater losses than you would have incurred had you been able to sell them when you initially wanted to. Additionally, the ability to short sell ETNs may be restricted when there is a 10% or greater change from the previous day's official closing price. Exchange rules relating to these matters are subject to change from time to time.

If a Trigger Event occurs, it will be on account of a large intraday decline in the Intraday Indicative Value of the applicable series of ETNs. Because of the extraordinary circumstances in which a Trigger Event occurs and the accompanying large decline in value of the ETNs, there is a greater likelihood that a trading halt or limit price with respect to the ETNs will be in effect for some period of time around the time when the Trigger Event occurs. As a result, if a Trigger Event occurs, there is an increased risk that you will be unable to sell your ETNs at that time and, therefore, will be unable to reduce your exposure to the ETNs at that time.

Although Eurodollar futures contracts trade 23 hours a day, the ETNs will trade only during regular trading hours on the NYSE Arca.

Eurodollar futures contracts trade 23 hours a day, 6 days a week. By contrast, the ETNs will trade on the NYSE Arca only during the hours that the NYSE Arca is open. Significant movements in the price of Eurodollar futures contracts, and therefore the level of each Index, may take place at times when the NYSE Arca is closed, and you will not have the opportunity to trade the ETNs until the NYSE Arca is open. For example, an announcement or development that has a significant impact on Eurodollar futures contract prices may take place overnight in New York. By the time the NYSE Arca opens, a significant change in the price of Eurodollar futures contracts may already have taken place, and the price at which you may be able to trade the ETNs may be significantly worse than the price you might have achieved had you been able to trade the ETNs sooner. If the overnight movement is sufficiently great, the Intraday Indicative Value may be zero from the moment the ETNs begin to trade on the NYSE Arca and the ETNs may be automatically accelerated for an Automatic Acceleration Redemption Amount equal to zero.

We may accelerate the ETNs at our option at any time on or after the Inception Date.

We have the right to accelerate the ETNs of any series at any time and pay you an amount equal to the Closing Indicative Value of such series of ETNs on the final Valuation Date of the Optional Acceleration Valuation Period. If we accelerate any series of ETNs, you will only receive the Optional Acceleration Redemption Amount for such series of ETNs and you will not receive any other compensation or amount for the loss of the investment opportunity of holding such series of ETNs. We will determine whether to exercise our right to accelerate any series

of ETNs at our option based on our interests and may do so at a time when it would be in your interests for the ETNs to remain outstanding.

The payment upon an Optional Acceleration or at maturity is based upon a declining exposure to the applicable Index over a number of Valuation Dates.

The payment upon an Optional Acceleration or at maturity is based upon the sum of the Index Exposure and Notional Cash Amount determined over the Final Valuation Period or Optional Acceleration Valuation Period, as applicable. The calculation of the Index Exposure and Notional Cash Amount during these periods simulates a proportionate move from Index Exposure to cash. This means that the return on the ETNs will not be based entirely on fluctuations of the applicable Index during this period and you will not entirely benefit from any favorable movements in the level of the applicable Index during this period as the Index Exposure declines. You should understand that the Daily Investor Fee will continue to accrue on both the Index Exposure and the Notional Cash Amount over the Final Valuation Period or Optional Acceleration Valuation Period, as applicable, even though your potential to benefit from any favorable performance of the applicable Index during that time will be based only on the Index Exposure. Moreover, even for the simulated cash position represented by the Notional Cash Amount, you will not be compensated for any interest or time value of money during this period prior to your receiving the payment upon acceleration or at maturity, as applicable.

There are restrictions on the minimum number of ETNs you may redeem and on the dates on which you may redeem them.

To exercise your early redemption right, you must redeem at least 50,000 ETNs of any one series, the Minimum Redemption Amount, at one time and you must cause your broker to deliver a notice of redemption, substantially in the form of Annex A (the "**Redemption Notice**"), to JHD (the "**Redemption Agent**") via email or other electronic delivery as requested by the Redemption Agent. If your Redemption Notice is delivered prior to 4:00 p.m., New York City time, on any Business Day, the immediately following Index Business Day will be the applicable "**Early Redemption Valuation Date**" for such series of ETNs. Otherwise, the second following Index Business Day will be the applicable Early Redemption Valuation Date. If the Redemption Agent receives your Redemption Notice no later than 4:00 p.m., New York City time, on any Business Day, the Redemption Agent will respond by sending your broker an acknowledgment of the Redemption Notice accepting your redemption request by 7:30 p.m., New York City time, on the Business Day prior to the applicable Early Redemption Valuation Date. The Redemption Agent or its affiliate must acknowledge to your broker acceptance of the Redemption Notice in order for your redemption request to be effective.

The redemption feature is intended to induce arbitrageurs to counteract any trading of the ETNs at a discount to their Indicative Value. There can be no assurance that arbitrageurs will employ the redemption feature in this manner.

You will not know the Early Redemption Amount for any ETNs you elect to redeem prior to maturity at the time you make such election.

In order to exercise your right to redeem the ETNs prior to maturity, you must cause your broker or other person with whom you hold the ETNs to deliver a Redemption Notice (as defined herein) to the Redemption Agent (as defined herein) by no later than 4:00 p.m., New York City time, on the Business Day prior to your desired Early Redemption Valuation Date. The Early Redemption Amount cannot be determined until the Early Redemption Valuation Date, and as such you will not know the Early Redemption Amount for the ETNs at the time you make an irrevocable election to redeem the ETNs. The Early Redemption Amount for the ETNs on the applicable Early Redemption Valuation Date may be substantially less than it would have been on the prior day and may be zero.

Each Index has limited historical information, and past performance is no guide to future performance.

Each Index was launched on September 30, 2016. Accordingly, each Index has limited historical data. There is no information regarding the actual performance of either Index during any period prior to September 30, 2016 and, therefore, there is no information regarding the actual performance of either Index during any market conditions other than those that have prevailed since September 30, 2016. Because each Index is of recent origin

with limited performance history, an investment linked to an Index may involve a greater risk than an investment linked to one or more indices with an established record of performance. A longer history of actual performance may have provided more reliable information on which to assess the validity of each Index's investment methodology and how each Index would have performed under a variety of market conditions.

Even though the Index Sponsor has calculated hypothetical back-tested historical performance data to illustrate how each Index may have performed in the past, those calculations are subject to significant limitations, in addition to the fact that past performance is never a guarantee of future performance. Unlike actual historical performance, such calculations do not reflect actual trading, liquidity constraints, fees and other costs. The hypothetical back-tested and historical performance shown for each Index should not be taken as any indication for future performance. The actual performance of each Index over the term of the related series of ETNs may bear little relation to the hypothetical back-tested or historical levels of that Index.

The market price of the ETNs may be influenced by many unpredictable factors.

The market value of the ETNs will fluctuate between the date you purchase them and the applicable Valuation Date or Valuation Period. You may also sustain a significant loss if you sell the ETNs in the secondary market. In addition to others, the following factors, many of which are beyond our control, will influence the market value of the ETNs, as well as the applicable Redemption Amount:

- the level of the applicable Index at any time;
- the volatility of the Eurodollar futures contracts included in the applicable Index;
- the liquidity of the Eurodollar futures contracts included in the applicable Index;
- economic, financial, regulatory, political, judicial, military and other events that affect interest rates, the Indices or the relevant Eurodollar futures contracts included in each Index;
- supply and demand for the ETNs in the secondary market, including, but not limited to, inventory positions with any market maker or other person or entity who is trading the ETNs (supply and demand for the ETNs will be affected by the total issuance of ETNs, and we are under no obligation to issue additional ETNs to increase the supply);
- the time remaining until the ETNs mature; and
- the actual or perceived creditworthiness of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

You cannot predict the future performance of the applicable Index based on its historical performance or that of the Eurodollar futures contracts that it tracks. The factors interrelate in complex ways, and the effect of one factor on the market value of the ETNs may offset or enhance the effect of another factor.

The liquidity of the market for the ETNs may vary materially over time.

We have sold a portion of the ETNs on the Initial Settlement Date, all of which were initially held by CGMI or its affiliates. CGMI may sell ETNs to investors or to dealers from time to time. We cannot predict how much investor demand there will be for the ETNs. The number of ETNs outstanding could be reduced at any time due to early redemptions of the ETNs as described in this pricing supplement or due to repurchases of the ETNs by our affiliates in the secondary market. Accordingly, the liquidity of the market for the ETNs could vary materially over the term of the ETNs. While you may elect to offer your ETNs for early redemption by us prior to maturity, such early redemption is subject to restrictive conditions and procedures described elsewhere in this pricing supplement, including the condition that you must offer at least the applicable Minimum Redemption Amount to us at one time.

There may not be an active trading market for your ETNs.

Although the ETNs have been listed on the NYSE Arca, there is no assurance that a trading market for the offered ETNs will develop or, if one develops, continue. Even if there is a secondary market for your ETNs, it may not be sufficiently liquid to enable you to sell your ETNs readily and you may suffer substantial losses and/or sell your ETNs at prices substantially less than their Intraday Indicative Value or Closing Indicative Value, including being unable to sell them at all or only for a price of zero in the secondary market.

No assurance can be given as to the continuation of the listing for the life of the offered ETNs, or the liquidity or trading market for the offered ETNs. We are not required to maintain any listing of your ETNs on the NYSE Arca and the liquidity of the market for any series of ETNs could vary materially over the term of the ETNs. The ETNs may cease to be listed on the NYSE Arca or any other exchange because they cease to meet the listing requirements of the exchange or because we elect in our sole discretion to discontinue the listing of the ETNs on any exchange. We may elect to discontinue the listing of the ETNs at any time and for any reason, including in connection with a decision to discontinue further issuances and sales of the ETNs. If the ETNs cease to be listed on the NYSE Arca or any other exchange, the liquidity of the ETNs is likely to be significantly adversely affected and the ETNs may trade at a significant discount to their Indicative Value.

The Intraday Indicative Value and the Closing Indicative Value and the applicable Redemption Amount are not the same as the closing price or any other trading price of the ETNs in the secondary market.

The Intraday Indicative Value and the Closing Indicative Value of each series of the ETNs are not the same as the closing price or any other trading price of such ETNs in the secondary market, if one exists. The Closing Indicative Value on each calendar day following the Inception Date for each series of ETNs will be determined according to a formula that is based on the performance of the applicable Index since its closing level on the prior Index Business Day. The Intraday Indicative Value of each series the ETNs will be calculated every 15 seconds on each Index Business Day during the period when a Market Disruption Event has not occurred or is not continuing and disseminated over the Consolidated Tape, or other major market data vendor. The Intraday Indicative Value at any time is based on the most recent intraday level of the applicable Index.

The trading price of the ETNs at any time is the price at which you may be able to sell your ETNs in the secondary market at such time, if one exists. In the absence of an active secondary market for the ETNs, the last reported trading price may not reflect the actual price at which you may be able to sell your ETNs at a particular time. The trading price of any series of the ETNs at any time may vary significantly from the Intraday Indicative Value and the Closing Indicative Value due to, among other things, imbalances of supply and demand, lack of liquidity, transaction costs, credit considerations and bid-offer spreads, and any corresponding premium in the trading price may be reduced or eliminated at any time.

Paying a premium purchase price over the Indicative Value of the ETNs could lead to significant losses in the event the investor sells such ETNs at a time when such premium is no longer present in the marketplace or such ETNs are accelerated, including at our option, which we have the discretion to do at any time. If we accelerate the ETNs of any series at our option, investors will receive a cash payment in an amount equal to the Closing Indicative Value on the final Valuation Date of the Optional Acceleration Valuation Period, which will not include any premium. Investors should consult their financial advisors before purchasing or selling the ETNs, especially ETNs trading at a premium over their Indicative Value.

Between 3:00 p.m., New York City time, and the close of trading in the ETNs on the NYSE Arca on each trading day, the published Intraday Indicative Value will not be based on fully up-to-date information (which will not be available), and the trading price of the ETNs is likely to diverge from the published Intraday Indicative Value.

The closing level of each Index on each Index Business Day is determined based on the daily settlement prices of Eurodollar futures contracts, which are determined as of 3:00 p.m., New York City time, on each Index Business Day. Although the daily settlement prices are determined as of 3:00 p.m., there is typically a time lag in the publication of the daily settlement prices, and the closing level of each Index based on the daily settlement prices is typically not published until after the close of trading for the ETNs on the NYSE Arca.

Between 3:00 p.m. and the close of trading on the NYSE Arca, the Index Calculation Agent suspends real-time updates to the calculation of the intraday level of each Index, because an accurate intraday level during this time period would require a reset of hypothetical Eurodollar futures contract exposure based on the closing level on that day, which will not yet be available. Throughout this full time period, the Intraday Indicative Value of each series of ETNs will continue to be calculated and disseminated based on the most recently published intraday level of the applicable Index. However, because real-time updates to the calculation of the intraday Index level will be suspended as of 3:00 p.m., the Intraday Indicative Value will not change, and therefore will not reflect trading in Eurodollar futures contracts that takes place, during this time period. For this reason, between 3:00 p.m. and the close of trading on the NYSE Arca, the Intraday Indicative Value is likely to differ from the value of the ETNs that would be determined if complete and fully up-to-date information were available and used in the calculation. As a result, we expect there to be uncertainty about the intrinsic value of the ETNs during this time period, and the trading price of the ETNs is likely to diverge from the Intraday Indicative Value during this time period. Investors should exercise caution in connection with any trading in this time period, particularly if there is a significant move in Eurodollar futures prices during this time period.

Although the daily settlement price of Eurodollar futures contracts (and, in turn, the closing level of each Index) is determined as of 3:00 p.m. on each Index Business Day, this value may differ from the most recent published trading price of Eurodollar futures contracts (and, in turn, each intraday Index level) at 3:00 p.m. because the daily settlement price is determined according to the procedure described in "Information About Eurodollar Futures Contracts" in this pricing supplement, which is not based simply on the last reported trade at 3:00 p.m. Accordingly, the Closing Indicative Value that is published after the close of trading on the NYSE Arca based on the closing level of the applicable Index may differ from the Intraday Indicative Value published based on the intraday level of the applicable Index at 3:00 p.m.

We and CGMI are under no obligation to issue or sell additional ETNs of any series at any time, and if we and CGMI do sell additional ETNs of any series, we or CGMI may limit or restrict such sales, and we or CGMI may stop and subsequently resume selling additional ETNs of such series at any time.

In our sole discretion, we may decide to issue and sell additional ETNs of any series from time to time to CGMI, and in CGMI's sole discretion, it may decide to sell additional ETNs of any series to investors or to dealers. However, we and CGMI are under no obligation to issue or sell additional ETNs of any series at any time, and if we and CGMI do sell additional ETNs of any series, we or CGMI may limit or restrict such sales, and we or CGMI may stop and subsequently resume selling additional ETNs of such series at any time. If we and CGMI start selling additional ETNs of any series, we or CGMI may stop selling additional ETNs of such series for any reason, which could materially and adversely affect the price and liquidity of such ETNs in the secondary market. Furthermore, the stated principal amount of each series of ETNs stated at the top of the cover page of this pricing supplement is the maximum amount of each series of ETNs that we have currently authorized for issuance. Although we have the right to increase the authorized amount of either series of ETNs at any time, it is our current intention not to issue more than the current maximum authorized amount of each series of ETNs, even if there is substantial market demand for additional ETNs of such series. We may also reduce the maximum authorized amount of each series of ETNs at any time and have no obligation to issue up to the maximum authorized amount.

Unless we indicate otherwise, if we or CGMI suspend selling additional ETNs, we and CGMI reserve the right to resume selling additional ETNs at any time, which might result in the reduction or elimination of any premium in the trading price that may have developed. Before trading in the secondary market, you should compare the Closing Indicative Value and Intraday Indicative Value with the then-prevailing trading price of the ETNs. Any premium may be reduced or eliminated at any time.

Suspension of additional issuances of the ETNs can also result in a significant reduction in the number of outstanding ETNs, if investors subsequently exercise their right to have the ETNs redeemed by us. If the total number of outstanding ETNs has fallen to a level that is close to or below the Minimum Redemption Amount, you may not be able to purchase enough ETNs to meet the minimum size requirement in order to exercise your early redemption right. The unavailability of the redemption right can result in the ETNs trading in the secondary market at discounted prices below the Intraday Indicative Value. Having to sell your ETNs at a discounted sale price below the Intraday Indicative Value of the ETNs could lead to significant losses. Prior to making an investment in the ETNs, you should take into account whether or not the trading price is tracking the Intraday Indicative Value of the ETNs.

Any limitation or suspension on the issuance or sale of the ETNs may impact the trading price of the ETNs, including by creating a premium over the Indicative Value of the ETNs that may be reduced or eliminated at any time.

Because our obligations under the ETNs are hedged through one or more of our affiliates, increases in the number of ETNs outstanding create corresponding increases in our exposure to the Eurodollar futures contracts included in the Indices. In order to manage the risk of this exposure, we may impose a limitation or suspension on the number of ETNs of any series to be issued. Any limitation or suspension on the issuance of the ETNs may materially and adversely affect the price and liquidity of the ETNs in the secondary market. Alternatively, the decrease in supply may cause an imbalance in the market supply and demand, which may cause the ETNs to trade at a premium over the Indicative Value of the ETNs. In addition, any decrease in the supply of the ETNs due to any limitation or suspension on issuance may cause the ETNs to appear on NYSE Arca's "threshold securities list," indicating repeated delivery failure (which may be a sign of supply shortage) and requiring an actual borrowing of or a bona fide arrangement to borrow the ETNs in connection with a short sale. If arbitrageurs are unable to locate ETNs to sell short, the ETNs may trade at a premium, which may be significant, in relation to their Indicative Value.

Any premium may be reduced or eliminated at any time. Paying a premium purchase price over the Indicative Value of the ETNs could lead to significant losses in the event the investor sells such ETNs at a time when such premium is no longer present in the marketplace or such ETNs are accelerated, including at our option, which we have the discretion to do at any time. If we accelerate the ETNs of any series at our option, investors will receive a cash payment in an amount equal to the Closing Indicative Value on the final Valuation Date of the Optional Acceleration Valuation Period, which will not include any premium. Investors should consult their financial advisors before purchasing or selling the ETNs, especially ETNs trading at a premium over their Indicative Value.

Trading and other transactions by our affiliates or third parties with whom we transact in Eurodollar futures contracts or other financial instruments related to the ETNs and the Indices may impair the value of the ETNs.

Our affiliates expect to hedge our obligations relating to the ETNs by purchasing or selling short the Eurodollar futures contracts included in the Indices or other derivative instruments relating to the Indices or Eurodollar futures contracts, including certain exchange traded notes issued by us, and adjust the hedge by, among other things, purchasing or selling any of the foregoing, at any time and from time to time, including on or before the applicable Valuation Date or during the applicable Valuation Period. Our affiliates or third parties with whom we transact may also enter into, adjust and unwind hedging transactions relating to other securities whose returns are linked to the Indices or Eurodollar futures contracts. Any of these hedging activities may adversely affect the levels of the Indices—by affecting the prices of the Eurodollar futures contracts included in the Indices—and therefore, the market value of the ETNs and the amount we will pay on the ETNs on the applicable Early Redemption Date, Optional Acceleration Date, Automatic Acceleration Date or the Maturity Date. It is possible that we, our affiliates or third parties with whom we transact could receive substantial returns with respect to these hedging activities while the value of the ETNs declines or becomes zero. Any profit in connection with such hedging activities will be in addition to any other compensation that our affiliates receive for the sale of the ETNs, which may create an additional incentive to sell the ETNs to you.

Our affiliates or third parties with whom we transact may also engage in trading in the Eurodollar futures contracts included in the Indices, or other derivative instruments relating to the Indices or Eurodollar futures contracts, including certain exchange traded notes issued by us, for proprietary accounts, for other accounts under management or to facilitate transactions, including block transactions, on behalf of customers. Any of these activities could adversely affect the levels of the Indices—by affecting the prices of the Eurodollar futures contracts included in the Indices—and therefore, the market value of the ETNs and the amount we will pay on the ETNs on the applicable Early Redemption Date, Optional Acceleration Date, Automatic Acceleration Date or the Maturity Date. We may also issue, and we, our affiliates or third parties with whom we transact may also issue or underwrite, other ETNs or financial or derivative instruments with returns linked to changes in the level of an Index or the Eurodollar futures contracts included in the Indices. By introducing competing products into the marketplace in this manner, we, our affiliates or third parties with whom we transact could adversely affect the market value of the ETNs and the amount we will pay on the ETNs on the applicable Early Redemption Date, Optional Acceleration Date, Automatic Acceleration Date or the Maturity Date.

Our affiliate is a participant in the process by which the spot LIBOR rate is determined.

Current spot LIBOR rates are an important factor affecting forward LIBOR rates. Our affiliate, Citibank, N.A., London Branch, participates in the process by which the spot LIBOR rate is determined. Its submissions may have an impact on the spot LIBOR rate and, in turn, affect the composite forward LIBOR rate in a way that is adverse to investors in the ETNs. Our affiliate will have no obligation to take the interests of investors into account in participating in this process. See "Information About 3-Month U.S. Dollar LIBOR" below.

Uncertainty about the future of LIBOR may adversely affect the value of the ETNs.

On July 27, 2017, the Chief Executive of the United Kingdom Financial Conduct Authority (the "**FCA**"), which regulates LIBOR, announced that it intends to stop persuading or compelling banks to submit rates for the calculation of LIBOR to the administrator of LIBOR after 2021. The announcement indicates that the continuation of LIBOR on the current basis cannot and will not be guaranteed after 2021. It is impossible to predict whether and to what extent banks will continue to provide LIBOR submissions to the administrator of LIBOR or whether any additional reforms to LIBOR may be enacted in the United Kingdom or elsewhere. Similarly, it is impossible to predict what rate or rates may become accepted alternatives to LIBOR and it is impossible to predict the effect of any such alternatives on the value of LIBOR-based securities such as the ETNs. Uncertainty as to the nature of alternative reference rates and as to potential changes or other reforms to LIBOR may adversely affect the value and/or the trading market for LIBOR-based securities such as the ETNs.

If the 3-month U.S. dollar LIBOR rate is discontinued or its status as an economic benchmark is significantly diminished, the ETNs may become based on an alternative to 3-month U.S. dollar LIBOR and/or to Eurodollar futures contracts, and in such event the ETNs may perform unpredictably and unfavorably.

In connection with the announcement by the FCA described in the preceding risk factor or otherwise, it is possible that the 3-month U.S. dollar LIBOR rate could be discontinued or its status as an economic benchmark could be significantly diminished. It is impossible to predict at this time whether such event will occur or what its consequences will be.

If the 3-month U.S. dollar LIBOR rate has been or will be discontinued or its status as an economic benchmark is significantly diminished and an alternative rate exists that is regarded by market participants as a successor or substitute for 3-month U.S. dollar LIBOR for any relevant purpose, such an event would constitute an Index Replacement Event, and the ETN Calculation Agents would have the right to substitute an alternative index tracking futures contracts referencing such alternative rate for the applicable Index under the terms of the ETNs. In such case, the ETNs would cease to be based on the 3-month U.S. dollar LIBOR rate and would cease to track an index of Eurodollar futures contracts, and instead would track an index of alternative futures contracts on an alternative rate. That alternative rate and those alternative futures contracts may differ from 3-month U.S. dollar LIBOR and from Eurodollar futures contracts in important ways. For example, the alternative rate may or may not have a tenor of 3 months and may or may not reflect bank credit risk, and the alternative futures contracts may be less liquid than Eurodollar futures contracts or may trade on a different platform or with different tenors. As a result of these differences, the alternative futures contracts may perform differently from Eurodollar futures contracts, in ways that are unanticipated and that may result in ETN performance that is unpredictable and ultimately unfavorable to investors.

The ETN Calculation Agents would have the right, but not the obligation, to make any such substitution described in the preceding paragraph. If 3-month U.S. dollar LIBOR is discontinued or its status as an economic benchmark is significantly diminished, it is possible that Eurodollar futures contracts nevertheless continue to trade with diminished liquidity or with amended terms based on an alternative rate. If the ETN Calculation Agents elect not to make any substitution of a new index as described in the previous paragraph, and if Eurodollar futures contracts trade with diminished liquidity or with amended terms based on an alternative rate, the ETNs will be subject to risks similar to those described in the previous paragraph.

There may be conflicts of interest between you and us, the Redemption Agent and the ETN Calculation Agents.

Our affiliate, CGMI, will act as one of the ETN Calculation Agents for the ETNs. As ETN Calculation Agents, CGMI and JICS will make determinations with respect to the ETNs. Among other things, JICS or its agent is responsible for computing and disseminating the Closing Indicative Value, subject to CGMI's right to dispute JICS' calculation of the Closing Indicative Value, in which case, if the ETN Calculation Agents are unable to agree, CGMI's determination of the Closing Indicative Value shall be conclusive and binding. Any determinations made by the ETN Calculation Agents may be adverse to you.

As noted above, our affiliates or third parties with whom we transact, including JICS, may engage in trading activities related to the Indices and the Eurodollar futures contracts included in the Indices or other derivative instruments relating to the Indices or Eurodollar futures contracts, including certain exchange traded notes issued by us. These trading activities may present a conflict between your interest in the ETNs and the interests our affiliates or third parties with whom we transact, including JICS, will have in proprietary accounts, in facilitating transactions, including block trades, for customers and in accounts under management. These trading activities, if they influence the levels of the Indices, could be adverse to your interests as a beneficial owner of the ETNs.

Our affiliates or third parties with whom we transact, the Redemption Agent, the ETN Calculation Agents and their affiliates may have published, and in the future may publish, research reports with respect to the Eurodollar futures contracts included in the Indices and with respect to the Indices. Any of these activities by our affiliates or third parties with whom we transact, the Redemption Agent, the ETN Calculation Agents or any of their affiliates may affect the levels of the Indices and, therefore, the market value of the ETNs and the amount we will pay on the ETNs on the applicable Early Redemption Date, Optional Acceleration Date, Automatic Acceleration Date or the Maturity Date.

If an Index Replacement Event occurs, the ETN Calculation Agents may replace either Index with a Substitute Index.

If an Index Replacement Event occurs at any time with respect to any series of the ETNs and the Index Sponsor or anyone else publishes an index that the ETN Calculation Agents determine is comparable to the applicable Index (the "**Substitute Index**"), then the ETN Calculation Agents may elect, in their sole discretion, to permanently replace the applicable original Index with the Substitute Index for all purposes under such series of ETNs, and all provisions described in this pricing supplement as applying to the applicable Index will thereafter apply to the Substitute Index instead. If the ETN Calculation Agents elect to replace the applicable original Index with a Substitute Index, then the ETN Calculation Agents will determine the Early Redemption Amount, Optional Acceleration Redemption Amount, Automatic Acceleration Redemption Amount or Maturity Redemption Amount, as applicable, for such series of ETNs by reference to the Substitute Index. In these circumstances, the ETN Calculation Agents may elect to replace the applicable Index with the Substitute Index even if the Index Sponsor continues to publish the applicable Index without modification, replacement or adjustment. Any such replacement of the applicable Index with the Substitute Index will affect the amount you will receive at maturity, upon redemption or upon acceleration and will result in the ETNs having a value different (higher or lower) from the value they would have had if there had been no such replacement.

The ETN Calculation Agents may perform their own calculation of the level of an Index if it is discontinued or if the ETN Calculation Agents determine that there has been a change in the applicable Index or the futures contracts included in the applicable Index.

The ETN Calculation Agents may perform their own calculation of the level of an Index if they determine that the publication of the applicable Index is discontinued and there is no Successor Index. In that case, the ETN Calculation Agents will determine the level of the discontinued Index, and thus the Closing Indicative Value, Intraday Indicative Value and any applicable Redemption Amount, using a computation methodology that the ETN Calculation Agents determine will as closely as reasonably possible replicate the applicable Index.

Furthermore, if the ETN Calculation Agents determine that an Index, the Eurodollar futures contracts included in the applicable Index or the method of calculating the applicable Index is changed at any time in any respect—including whether the change is made by the Index Sponsor under its existing policies or following a

modification of those policies, is due to the publication of a Successor Index, is due to events affecting the Eurodollar futures contracts included in the applicable Index, or is due to any other reason and is not otherwise reflected in the level of the applicable Index by the Index Sponsor pursuant to the methodology described herein, then the ETN Calculation Agents will be permitted (but not required) to make such adjustments in the applicable Index level or the method of its calculation as they believe are appropriate to ensure that the applicable closing level of the applicable Index used to determine the Closing Indicative Value, Intraday Indicative Value or any applicable Redemption Amount is equitable. The ETN Calculation Agents may make any such modification or adjustment even if the Index Sponsor continues to publish the applicable Index without a similar modification or adjustment.

Any modification to the applicable Index level or adjustment to its method of calculation will affect the Closing Indicative Value and any amount you will receive upon redemption, upon acceleration or at maturity and will result in the ETNs having a value different (higher or lower) from the value they would have had if there had been no such modification or adjustment.

The policies of the Index Sponsor and changes that affect the Indices could affect the applicable Redemption Amount of the ETNs and their market value.

The policies of the Index Sponsor concerning the calculation of the levels of the Indices and the manner in which changes affecting the Eurodollar futures contracts included in the Indices are reflected in the levels of the Indices could affect the applicable Redemption Amount of the ETNs on the applicable Early Redemption Date, Optional Acceleration Date, Automatic Acceleration Date or the Maturity Date and the market value of the ETNs prior to that date. The applicable Redemption Amount of the ETNs and their market value could also be affected if the Index Sponsor changes these policies, for example by changing the manner in which it calculates the levels of the Indices, by adding, deleting or substituting the Eurodollar futures contracts comprising the Indices, or if the Index Sponsor discontinues or suspends calculation or publication of the levels of the Indices, in which case it may become difficult to determine the market value of the ETNs. If events such as these occur, or if the level of the applicable Index is not available because of a Market Disruption Event or for any other reason, the ETN Calculation Agents for the ETNs may determine the levels of the Indices on the Valuation Date or during the Valuation Period, as the case may be.

You will have no rights against the entities with discretion over the Indices.

As owner of the ETNs, you will have no rights against the Index Sponsor or the Index Calculation Agent, even though the amount you receive at maturity or upon redemption or acceleration will depend on the level of the applicable Index.

The payments we owe under the ETNs may be delayed in certain circumstances.

If any Valuation Date (or, in the case of any Valuation Period other than an Automatic Acceleration Valuation Period, the last Valuation Date in such Valuation Period) is postponed, due to a Market Disruption Event or otherwise, the Maturity Date, the corresponding Early Redemption Date or the Optional Acceleration Date, as the case may be, will be postponed until the date three Business Days following such Valuation Date, as postponed. No interest or additional payment will accrue or be payable as a result of any postponement of the Maturity Date, any Early Redemption Date or the Optional Acceleration Date. See "Specific Terms of the ETNs—Market Disruption Events" in this pricing supplement.

You will not have any rights in any Eurodollar futures contracts included in the applicable Index.

As an owner of the ETNs, you will not have rights that holders of the Eurodollar futures contracts included in the applicable Index may have. The ETNs will be paid in cash, and you will have no right to receive delivery of any component of the applicable Index.

The ETNs are linked to an excess return index, and not a total return index.

Each Index is an excess return index, and not a total return index. Because each Index is an excess return index, it is calculated based solely on the changes in the settlement prices of the relevant Eurodollar futures contracts and, unlike a direct investment in Eurodollar futures contracts or a total return index based on Eurodollar futures

contracts, does not reflect interest that could be earned on funds committed to the trading of the underlying Eurodollar futures contracts.

There is concentration risk associated with the ETNs.

The ETNs reflect exposure to the applicable Index, which tracks a hypothetical position in a portfolio of Eurodollar futures contracts, and thus are much less diversified than funds, investment portfolios or indices investing in or tracking a broader range of products and, therefore, could experience greater volatility. You will not benefit, with respect to the ETNs, from any of the advantages of a diversified investment and will bear the risks of a highly concentrated investment.

The ETNs are not regulated by the Commodity Futures Trading Commission.

The proceeds to be received by us from the sale of the ETNs will not be used to purchase or sell any Eurodollar futures contracts for your benefit. An investment in the ETNs thus does not constitute either an investment in Eurodollar futures contracts or in a collective investment vehicle that trades in Eurodollar futures contracts (*i.e.*, the ETNs will not constitute a direct or indirect investment by you in Eurodollar futures contracts), and you will not benefit from the regulatory protections of the Commodity Futures Trading Commission, commonly referred to as the "CFTC." We are not registered with the CFTC as a futures commission merchant and you will not benefit from the CFTC's or any other non-U.S. regulatory authority's regulatory protections afforded to persons who trade in futures contracts on a regulated futures exchange through a registered futures commission merchant. Unlike an investment in the ETNs, an investment in a collective investment vehicle that invests in futures contracts on behalf of its participants may be subject to regulation as a commodity pool and its operator may be required to be registered with and regulated by the CFTC as a commodity pool operator, or qualify for an exemption from the registration requirement. Because the ETNs will not be interests in a commodity pool, the ETNs will not be regulated by the CFTC as a commodity pool, we will not be registered with the CFTC as a commodity pool operator, and you will not benefit from the CFTC's or any non-U.S. regulatory authority's regulatory protections afforded to persons who invest in regulated commodity pools.

The effects of any regulatory change on the value of the ETNs are impossible to predict, but could be substantial and adverse to the interests of holders of the ETNs.

The markets for futures contracts, including Eurodollar futures contracts, are subject to extensive statutes, regulations and margin requirements. The CFTC and the exchange on which such futures contracts trade are authorized to take extraordinary actions in the event of a market emergency, including, for example, the retroactive implementation of speculative position limits or higher margin requirements, the establishment of daily limits and the suspension of trading. Furthermore, CME Globex has regulations that limit the amount of fluctuations in futures contract prices which may occur. These limits could adversely affect the market prices of the relevant Eurodollar futures contracts. The regulation of derivative transactions in the U.S. and other countries is subject to ongoing modification by government and judicial action. In addition, various national governments have expressed concern regarding the disruptive effects of speculative trading in futures markets and the need to regulate the derivative markets in general. The effects of any future regulatory change on the value of the ETNs are impossible to predict, but could be substantial and adverse to the interests of securityholders.

Regulatory restrictions may have the effect of making the markets for futures contracts, including Eurodollar future contracts, less liquid and more volatile. Our affiliates may be unable, as a result of such restrictions, to effect transactions necessary to hedge our obligations under the ETNs, in which case we may, in our sole and absolute discretion, accelerate the payment on the ETNs. If the payment on the ETNs is accelerated, your investment may result in a loss and you may not be able to reinvest your money in a comparable investment. Please refer to "Specific Terms of the ETNs—Acceleration at Our Option" herein for more information.

A decision by the exchange on which Eurodollar futures contracts are traded to increase margin requirements may affect the levels of the Indices.

If CME Globex increases the amount of collateral required to be posted to hold positions in Eurodollar futures contracts (*i.e.*, the margin requirement), market participants who are unwilling or unable to post additional collateral may liquidate their positions, which may cause the level of an Index to decline significantly.

The Daily Accrual is based on the 3-month U.S. Treasury rate and therefore the value of the ETNs may be adversely impacted by decreases in this rate.

The Daily Accrual is an amount that accrues at the 3-month U.S. Treasury rate on each Index Business Day's Closing Indicative Value. This rate fluctuates and, accordingly, the lower this rate is, the lower the Daily Accrual on the ETNs will be.

The U.S. federal tax consequences of an investment in the ETNs are uncertain.

There is no direct legal authority regarding the proper U.S. federal tax treatment of the ETNs, and we do not plan to request a ruling from the Internal Revenue Service (the "**IRS**"). Consequently, significant aspects of the tax treatment of the ETNs are uncertain, and the IRS or a court might not agree with the treatment of the ETNs as prepaid forward contracts. If the IRS were successful in asserting an alternative treatment for the ETNs, the tax consequences of ownership and disposition of the ETNs might be materially and adversely affected. Even if the ETNs are treated as prepaid forward contracts, certain possible taxable events could cause a holder to recognize gain on an ETN prior to maturity or earlier disposition. In particular, if the ETN Calculation Agents replace an Index with an index of alternative futures contracts on an alternative rate to the 3-month U.S. dollar LIBOR rate as described under "Specific Terms of the ETNs—Discontinuation or Modification of an Index; Substitution of an Index", such an event could be treated as a taxable event. Moreover, the character of gain or loss recognized on an ETN might be treated as ordinary income or loss rather than capital gain or loss. As described below under "United States Federal Tax Considerations," in 2007, the U.S. Treasury Department and the IRS released a notice requesting comments on various issues regarding the U.S. federal income tax treatment of "prepaid forward contracts" and similar instruments, which may include the ETNs. Any Treasury regulations or other guidance promulgated after consideration of these issues could materially and adversely affect the tax consequences of an investment in the ETNs, possibly with retroactive effect. You should review carefully the section of this pricing supplement entitled "United States Federal Tax Considerations." You should also consult your tax adviser regarding the U.S. federal tax consequences of an investment in the ETNs, as well as tax consequences arising under the laws of any state, local or non-U.S. taxing jurisdiction.

INFORMATION ABOUT 3-MONTH U.S. DOLLAR LIBOR

The official 3-month U.S. dollar LIBOR rate on each London business day (referred to as the "**spot LIBOR rate**" on that London business day) is published by ICE Benchmark Administration. The spot LIBOR rate at any time provides an indication of the average rate at which a LIBOR contributor bank can obtain unsecured funding in the London interbank market at that time for a term of 3 months in U.S. dollars. The spot LIBOR rate is the end-product of a calculation based upon submissions from LIBOR contributor banks. ICE Benchmark Administration maintains a reference panel of 17 contributor banks, one of which is our affiliate, Citibank, N.A., London Branch.

Each contributor bank is asked to base its LIBOR submission on the following question: "At what rate could you borrow funds, were you to do so by asking for and then accepting interbank offers in a reasonable market size just prior to 11 am London time?" Therefore, submissions are based upon the lowest perceived rate at which a bank could go into the London interbank money market at that time and obtain funding in reasonable market size, for a term of 3 months in U.S. dollars.

The 3-month U.S. dollar LIBOR rate is calculated using a trimmed arithmetic mean. Once all submissions are received, they are ranked in descending order and then the highest and lowest 25% of submissions are excluded. The remaining contributions are then arithmetically averaged and the result is rounded to five decimal places.

A "**London business day**" means any day on which dealings in deposits in U.S. dollars are transacted in the London interbank market.

All information contained in this pricing supplement regarding the 3-month U.S. dollar LIBOR rate is based on publicly available information published by ICE Benchmark Administration and has not been independently verified.

INFORMATION ABOUT EURODOLLAR FUTURES CONTRACTS

General

Eurodollar futures contracts are financial instruments that allow market participants to take investment positions in future spot LIBOR rates. An investor in a Eurodollar futures contract will incur gains or losses based on changes in the future spot LIBOR rate implied in the trading price of that contract. Eurodollar futures contracts are traded on the CME Globex electronic trading platform.

Each Eurodollar futures contract provides for cash settlement upon its expiration based on the spot LIBOR rate published on its last trading day, which is the second London business day before its expiration date. The trading price of a Eurodollar futures contract at any time prior to expiration is thought to reflect a market expectation about what the spot LIBOR rate will be on its final trading day. For example, if a Eurodollar futures contract has a final trading day that is one year in the future, then the trading price of that Eurodollar futures contract today is thought to reflect current market expectations about what the spot LIBOR rate will be in one year's time.

Because trading prices of Eurodollar futures contracts are ultimately determined by supply and demand, which may in turn be affected by any number of unpredictable factors, the trading price of a Eurodollar futures contract may be driven by factors other than market expectations of future spot LIBOR rates. For example, a single investor seeking to hedge a debt obligation that is very large relative to the liquidity of a particular Eurodollar futures contract may skew the demand for, and in turn the price of, that futures contract. Nevertheless, for purposes of the Indices, the trading prices of Eurodollar futures contracts are taken as indications of market expectations of future spot LIBOR rates.

We refer to the future spot LIBOR rate that is implied in the current trading price of a Eurodollar futures contract as an "**implied forward LIBOR rate**". Whereas today's spot LIBOR rate indicates the rate at which banks can borrow U.S. dollars for a 3-month term in the London interbank market today, a forward LIBOR rate is a market indication of the rate at which banks may be able to borrow U.S. dollars for a 3-month term in the London interbank market in the future.

All information contained in this pricing supplement regarding Eurodollar futures contracts is based on publicly available information published by CME Group and has not been independently verified.

Contract Expirations

Eurodollar futures contracts are traded on CME Globex with quarterly expirations in March, June, September and December of each year in the next 10 years, and with expirations in each of the next four months that are not in that quarterly cycle. The expiration date of a Eurodollar futures contract is the third Wednesday of the applicable contract expiration month.

Trading Price

The trading price of a Eurodollar futures contract is quoted in terms of 100 *minus* the forward LIBOR rate. For example, if the December Eurodollar futures contract is trading in June at a price of 98.00, that would reflect a market expectation in June that the spot LIBOR rate on the contract's last trading day in December will be 2.00%. Put another way, a trading price of 98.00 of the December Eurodollar futures contract in June *implies* a forward LIBOR rate in December of 2.00%.

Daily Settlement Price

Trading in Eurodollar futures contracts takes place on CME Globex 23 hours a day, 6 days a week. Once each trading day, CME Globex determines an official daily settlement price for each Eurodollar futures contract as of 3:00 p.m., New York City time, on that day. The daily settlement price is determined based on the volume-weighted average price of trading on CME Globex between 2:59 and 3:00 p.m. on that day. In determining the daily settlement price, that volume-weighted average price is subject to adjustment (except in the case of a quarterly futures contract expiring within the next month) within the bid/ask range in the outright market (that is, the market for trading in Eurodollar futures contracts themselves) to take into account bids and asks in the spread market (that

is, the market for trading in calendar spread and butterfly products referencing the Eurodollar futures contracts). There is typically a time lag in the publication of the daily settlement price, so that it is typically not available until some period of time after 3:00 p.m., New York City time.

Daily Margining

Gains or losses on Eurodollar futures contracts are realized daily through a daily margining process. If an investor realizes gains on a given day, an amount of cash is deposited into the investor's account, and if an investor realizes losses on a given day, an amount of cash is withdrawn from the investor's account (or the investor is required to deposit cash into the account).

Gains or losses on a given trading day are determined based on the change in the implied forward LIBOR rate reflected in the daily settlement price on that day from the prior trading day. For each 1 basis point change in the implied forward LIBOR rate, there is a $25 gain or loss, as applicable, on one Eurodollar futures contract.

Contract Notional

Each Eurodollar futures contract references a hypothetical $1 million 3-month Eurodollar deposit made on the date of expiration of the contract. For this reason, each Eurodollar futures contract is said to have a "notional amount" of $1 million. A Eurodollar deposit is a deposit of U.S. dollars in the London interbank market.

The fact that each Eurodollar futures contract references a hypothetical $1 million 3-month Eurodollar deposit does not mean that any investor in a Eurodollar futures contract has a right to enter into, or obligation to deliver, a $1 million 3-month Eurodollar deposit upon expiration of the contract. Instead, the hypothetical $1 million 3-month Eurodollar deposit is used as a reference point to determine the payment amount upon cash settlement of a Eurodollar futures contract at expiration, and daily margining requirements before expiration. As discussed above, for each 1 basis point change in the implied forward LIBOR rate, there is a $25 change in the value of one Eurodollar futures contract. This $25 amount results from the $1 million notional amount, because one basis point (i.e., one hundredth of a percentage point) *multiplied by* $1 million, and *divided by* four (reflecting the fact that a 3-month deposit has a term equal to one-fourth of a year), is equal to $25.

Inverse Relationship Between Futures Contract Price and Implied Forward LIBOR Rate

A long position in a Eurodollar futures contract may be understood as enabling an investor to effectively lock in the interest rate it can earn on a future $1 million Eurodollar deposit with a 3-month term. The locked-in rate results from combining the interest received on that Eurodollar deposit at the future spot LIBOR rate with the gains or losses on the Eurodollar futures contract. If the future spot LIBOR rate declines from the forward LIBOR rate implied in the trading price at which the investor entered into the contract, the investor will realize gains designed to offset the reduction in the spot LIBOR rate that it will earn on the Eurodollar deposit. Conversely, if the future spot LIBOR rate increases from that rate, the investor will realize losses designed to be offset by the increase in the spot LIBOR rate.

Therefore, the value of a *long* position in a Eurodollar futures contract will vary *inversely* with the implied forward LIBOR rate. In other words, if the implied forward LIBOR rate increases, the value of a long position in a Eurodollar futures contract will decrease, and if the implied forward LIBOR rate decreases, the value of a long position in a Eurodollar futures contract will increase.

The opposite is true for a short position. A short position in a Eurodollar futures contract may be understood as enabling a borrower to effectively lock in the interest rate it will pay on a future $1 million Eurodollar deposit with a 3-month term. The locked-in rate results from combining the interest paid on that Eurodollar deposit at the future spot LIBOR rate with the gains or losses on the Eurodollar futures contract. If the future spot LIBOR rate increases from the forward LIBOR rate implied in the trading price at which the investor entered into the contract, the investor will realize gains designed to offset the increase in the spot LIBOR rate that it must pay on the Eurodollar deposit. Conversely, if the future spot LIBOR rate decreases from that rate, the investor will realize losses designed to be offset by the decrease in the spot LIBOR rate.

Therefore, the value of a *short* position in a Eurodollar futures contract will vary *directly* with the implied forward LIBOR rate. In other words, if the implied forward LIBOR rate increases, the value of a short position in a Eurodollar futures contract will increase, and if the implied forward LIBOR rate decreases, the value of a short position in a Eurodollar futures contract will decrease.

As a result, to obtain a *long* position with respect to the implied forward LIBOR rate (i.e., to realize gains if the rate increases and losses if it decreases), it is necessary to have a *short* position in Eurodollar futures contracts. Conversely, to obtain a *short* position with respect to the implied forward LIBOR rate (i.e., to realize gains if the rate decreases and losses if it increases), it is necessary to have a *long* position in Eurodollar futures contracts.

The inverse relationship between contract price and the implied forward LIBOR rate results because the price of a Eurodollar futures contract is quoted in terms of 100 *minus* the implied forward LIBOR rate. The lower the implied forward LIBOR rate, the higher the price of the contract.

For example, if the implied forward LIBOR rate is 2.00% on one day and *increases* to 2.05% on the next day, the contract price will *decrease* from 98.00 to 97.95. Because the contract price decreased by 5 basis points in this example, the holder of a long position in this contract would have $125 (5 basis points *times* $25) debited from its margin account, and the holder of a short position in this contract would have the same amount deposited into its margin account.

Conversely, if the implied forward LIBOR rate is 2.00% on one day and *decreases* to 1.95% on the next day, the contract price will *increase* from 98.00 to 98.05. Because the contract price increased by 5 basis points in this example, the holder of a long position in this contract would have $125 (5 basis points *times* $25) deposited into its margin account, and the holder of a short position in this contract would have the same amount debited from its margin account.

In each of these examples, $125 is the amount by which the interest payable on a $1 million 3-month Eurodollar deposit would change for a 5 basis point change in the interest rate on that Eurodollar deposit. In other words, $1 million *times* 5 basis points (*i.e.*, 0.0005) *divided by* 4 equals $125.

Cash Settlement Upon Expiration

Eurodollar futures contracts are cash-settled upon expiration. The cash settlement upon expiration of a Eurodollar futures contract is implemented through a final daily margining on the last trading day of the contract. Unlike the daily margining that occurs on each earlier trading day, the daily margining on the last trading day is based on the spot LIBOR rate on the last trading day, rather than on the daily settlement price of the contract. The final daily margining will be based on the difference between the future spot LIBOR rate implied in the price of the contract on the trading day immediately preceding the last trading day (at that point, the contract price implies a spot LIBOR rate only one day in the future) and the actual spot LIBOR rate as observed on that last trading day.

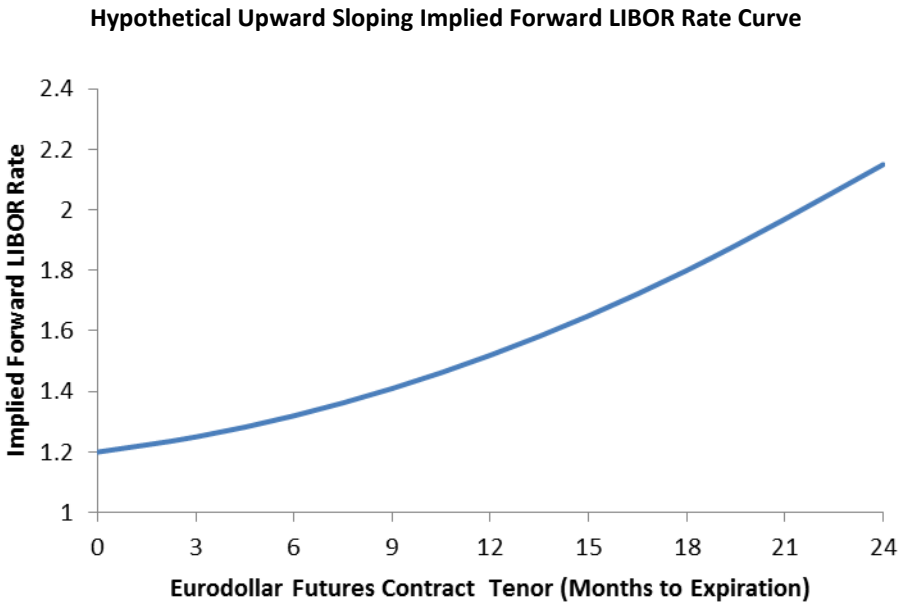
HYPOTHETICAL FORWARD LIBOR RATE CURVES
AND EURODOLLAR FUTURES TRADING PRICE CURVES

The forward LIBOR rates implied by Eurodollar futures contracts of different tenors typically vary depending on tenor. For example, the forward LIBOR rate implied by a contract with a 3-month tenor will typically be different from the rate implied by a contract with a 6-month tenor, which will typically be different from the rate implied by a contract with a 12-month tenor, and so on. In this pricing supplement, when we refer to the "tenor" of a Eurodollar futures contract, we refer to the remaining period of time (as of the relevant date of determination) to the last trading day of that contract.

Forward LIBOR rates may tend to increase with longer tenors, or may decrease with longer tenors. Or they may increase over some ranges of tenors and decrease over others. The relationship between the forward LIBOR rate and tenor results from supply and demand in the market for Eurodollar futures contracts and cannot be predicted. Historically, implied forward LIBOR rates have most often tended to increase with longer tenors. However, there have been times when the opposite relationship has been observed. It is not possible to predict what the relationship between forward LIBOR rates and tenors will be over any particular time period in the future.

The relationship between implied forward LIBOR rates and tenors can be shown on a graph, also called the "implied forward LIBOR rate curve", where the x-axis represents the tenor of the applicable Eurodollar futures contract and the y-axis represents the forward LIBOR rate implied in the price of that Eurodollar futures contract. The following graphs show examples of hypothetical forward LIBOR rate curves. For simplicity, each graph assumes that the current day is the expiration date of a quarterly Eurodollar futures contract.

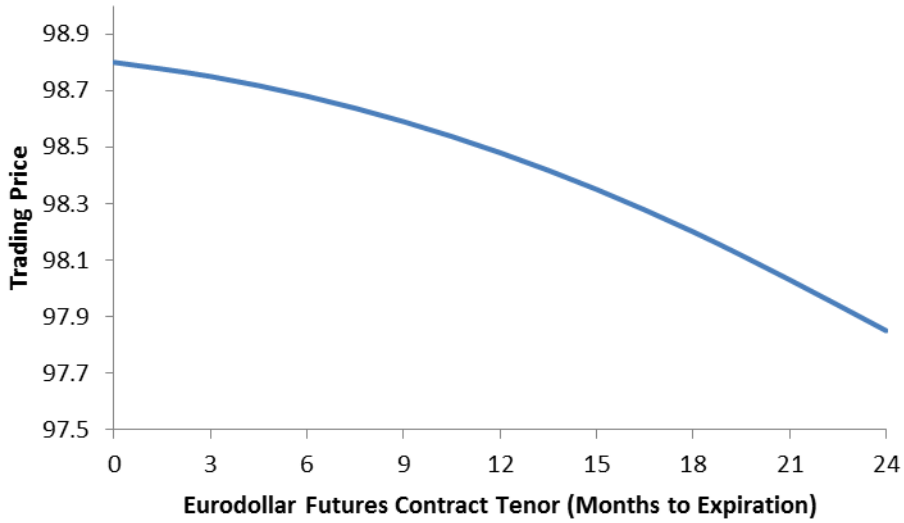
The implied forward LIBOR rate curves and the related trading price curves shown in this section are purely hypothetical. They are intended for the sole purpose of illustrating what implied forward LIBOR rate curves and the related trading price curves might look like. These curves may not be representative of what the actual implied forward LIBOR rate curve or related trading price curve actually looks like at any given time. The actual implied forward LIBOR rate curve at any given time may be upward sloping or downward sloping, concave or convex, steep or flat, and may be consistent in these respects across the curve or differ in these respects at different parts of the curve. It is impossible to predict what the implied forward LIBOR rate curve will look like at any time in the future.



This implied forward LIBOR rate curve is upward sloping, which means that in this example implied forward LIBOR rates tend to increase with longer tenors.

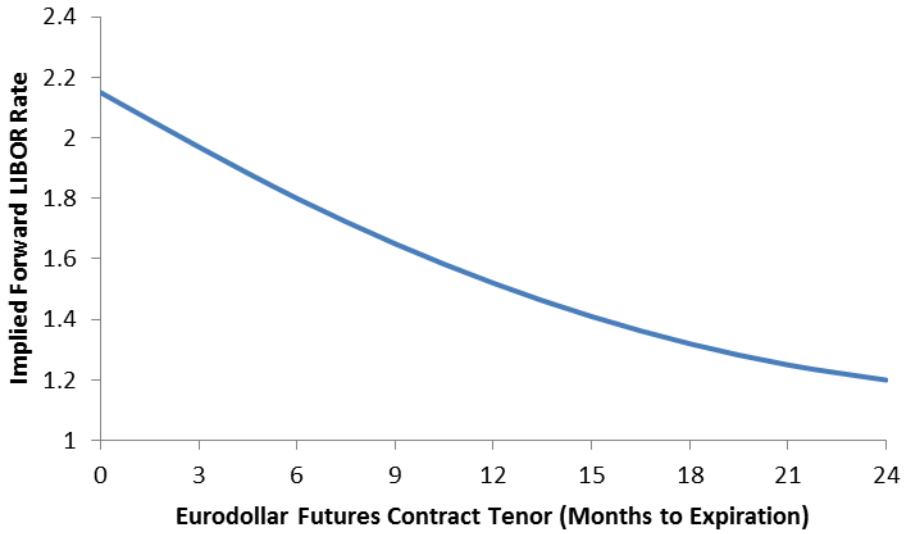
Using the same implied forward LIBOR rates as are shown in the graph above, the following graph depicts the relationship between trading prices of Eurodollar futures contracts and tenors. Because of the inverse relationship between the implied forward LIBOR rate and the trading price of a Eurodollar futures contract, the graph below shows the opposite relationship to the graph above. The Eurodollar futures contract trading price curve shown below is downward sloping, which means that in this example trading prices tend to decrease with longer tenors (because in this example implied forward LIBOR rates tend to increase with longer tenors).

Hypothetical Downward Sloping Trading Price Curve

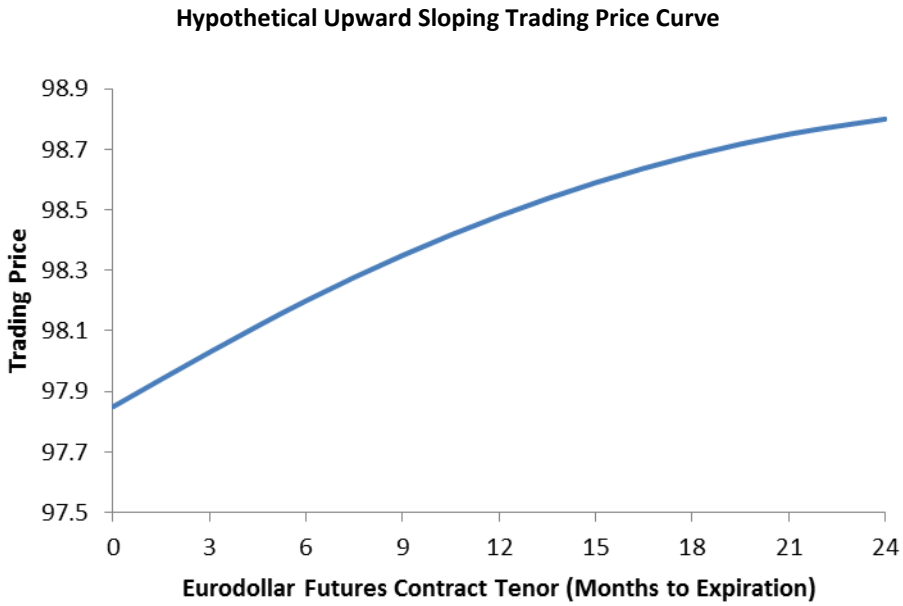


It is also possible that implied forward LIBOR rates may tend to decrease with longer tenors. The following graph illustrates a downward sloping implied forward LIBOR rate curve.

Hypothetical Downward Sloping Implied Forward LIBOR Rate Curve



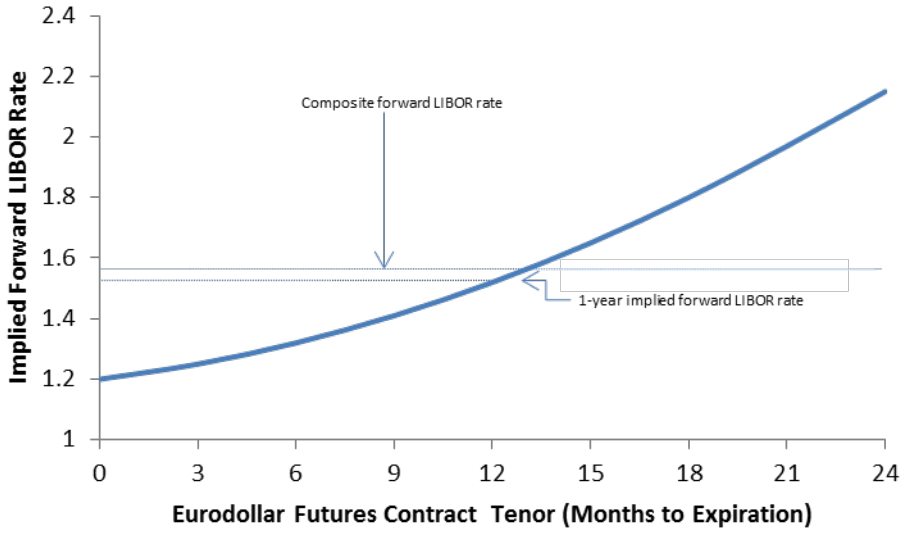
The graph below illustrates the upward sloping Eurodollar futures trading price curve that would accompany the downward sloping implied forward LIBOR rate curve shown in the previous graph.



Composite Forward LIBOR Rate Vs. 1-Year Implied Forward LIBOR Rate

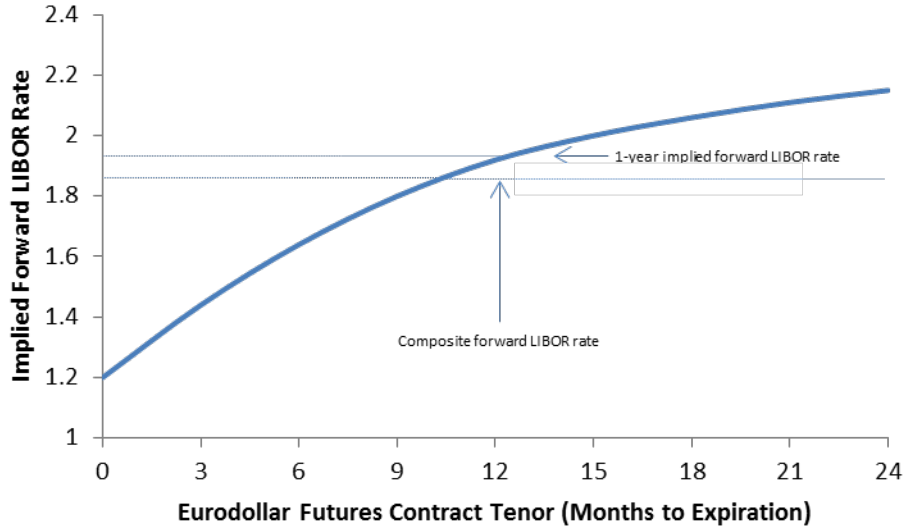
The next set of hypothetical implied forward LIBOR rate curves are intended to illustrate how the composite forward LIBOR rate may differ from the 1-year implied forward LIBOR rate and how the shape of the implied forward LIBOR rate curve affects that difference. The composite forward LIBOR rate at any time is equal to the weighted average of the forward LIBOR rates implied in the daily settlement prices of the next 8 quarterly Eurodollar futures contracts. By contrast, the 1-year implied forward LIBOR rate is the forward LIBOR rate implied by the trading price of a Eurodollar futures contract with 12 months remaining to expiration.

The following graph illustrates the difference between the composite forward LIBOR rate and the 1-year implied forward LIBOR rate based on the hypothetical upward sloping implied forward LIBOR rate curve shown above.

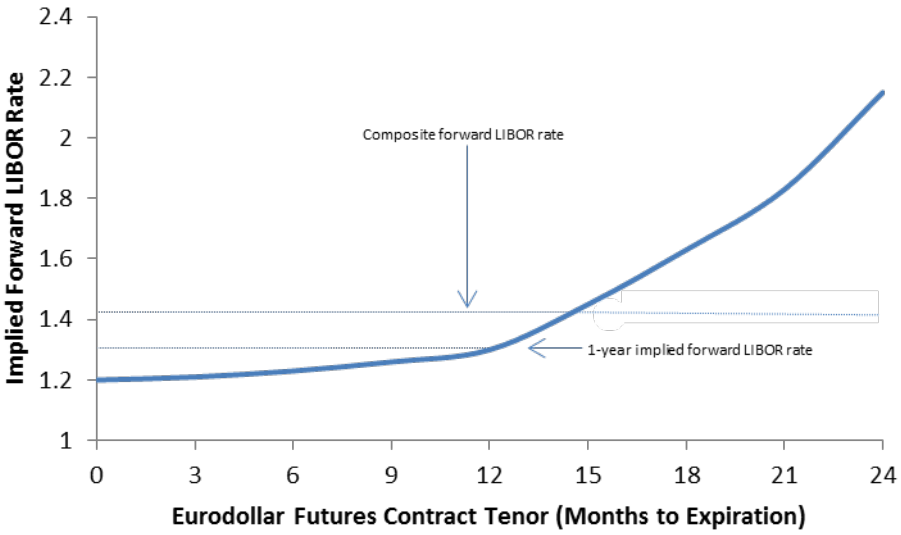


In this graph, the composite forward LIBOR rate is higher than the 1-year implied forward LIBOR rate.

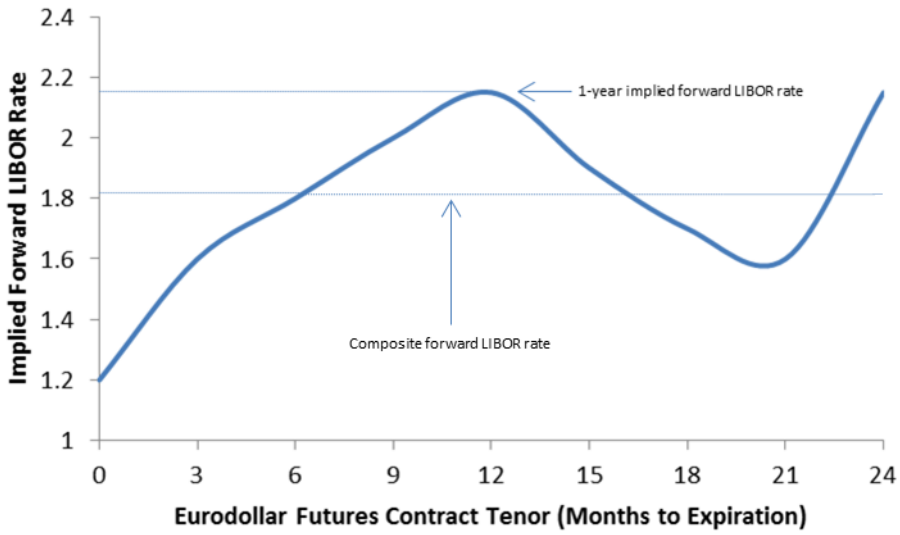
The next graph illustrates another hypothetical upward sloping implied forward LIBOR rate curve, but in this case the composite forward LIBOR rate is less than the 1-year implied forward LIBOR rate.



In the next graph, the implied forward LIBOR rate curve is more sharply upward sloping in the area after 12 months than it is in the graphs above, and as a result the difference between the composite forward LIBOR rate and the 1-year implied forward LIBOR rate is greater.



In the next graph, the implied forward LIBOR rate curve is "kinked", which means that it does not slope in a consistent direction along the entire curve. In this example, the difference between the composite forward LIBOR rate and the 1-year implied forward LIBOR rate is particularly significant.



As illustrated above, the composite forward LIBOR rate is not the same as the 1-year implied forward LIBOR rate. We cannot predict how similar or different the composite forward LIBOR rate will be from the 1-year implied forward LIBOR rate over any period of time in the future.

DESCRIPTION OF THE JANUS VELOCITY LIBOR INDICES

Overview

Janus Index & Calculation Services, LLC (the "**Index Sponsor**" or "**JICS**") publishes a family of indices called the Janus Velocity LIBOR Indices. The Janus Velocity LIBOR Indices consist of the following three indices:

- **Composite Forward LIBOR Index.** We refer to the Janus Velocity LIBOR 1Y Index as the "**Composite Forward LIBOR Index**". At any time, the level of the Composite Forward LIBOR Index is equal to the composite forward LIBOR rate (described below) at that time, expressed as a number of basis points. Neither series of ETNs is linked directly to the Composite Forward LIBOR Index. However, the Composite Forward LIBOR Index is a fundamental building block used in calculating the Long LIBOR Index and the Short LIBOR Index.

- **Long LIBOR Index.** The Long LIBOR ETNs are linked to the Janus Velocity Long LIBOR Index (the "**Long LIBOR Index**"). The Long LIBOR Index aims to approximate the daily performance of a hypothetical long investment in the composite forward LIBOR rate (as reflected in the level of the Composite Forward LIBOR Index), as if the composite forward LIBOR rate were itself an asset that could be invested in. It does so by tracking the return on a hypothetical short position in Eurodollar futures contracts, where that position is recalibrated daily to result in a return over the next Index Business Day that approximates the percentage change in the composite forward LIBOR rate over that next Index Business Day, subject to the long LIBOR floor. If at any time the composite forward LIBOR rate is below 1.00%, which we refer to as the long LIBOR floor, the Long LIBOR Index will aim to approximate less than the full daily percentage change in the composite forward LIBOR rate, resulting in a targeted participation of less than 100% in the daily percentage change. As more fully described below, the daily return of the Long LIBOR Index will not exactly replicate the targeted participation in the daily percentage change in the composite forward LIBOR rate because of the effects of carry and the contract spread described below.

- **Short LIBOR Index.** The Short LIBOR ETNs are linked to the Janus Velocity Short LIBOR Index (the "**Short LIBOR Index**"). The Short LIBOR Index aims to approximate the daily performance of a hypothetical short position in the composite forward LIBOR rate (as reflected in the level of the Composite Forward LIBOR Index), as if the composite forward LIBOR rate were itself an asset that could be shorted. It does so by tracking the return on a hypothetical long position in Eurodollar futures contracts, where that position is recalibrated daily to result in a return over the next Index Business Day that approximates the inverse of the percentage change in the composite forward LIBOR rate over that next Index Business Day, subject to the short LIBOR floor. If at any time the composite forward LIBOR rate is below 2.50%, which we refer to as the short LIBOR floor, the Short LIBOR Index will aim to approximate less than the full amount of the inverse of the daily percentage change in the composite forward LIBOR rate, resulting in a targeted participation of less than 100% in the inverse of the daily percentage change. As more fully described below, the daily return of the Short LIBOR Index will not exactly replicate its targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate because of the effects of carry and the contract spread described below.

We have obtained all information about the Janus Velocity LIBOR Indices contained in this pricing supplement from publicly available information provided by the Index Sponsor. We have not independently verified its accuracy. Each Janus Velocity LIBOR Index will be maintained and published by the Index Sponsor and the Index Calculation Agent without our involvement.

Composite Forward LIBOR Index

The level of the Composite Forward LIBOR Index at any time represents the composite forward LIBOR rate at that time, expressed as a number of basis points. A basis point is one hundredth of a percentage point.

The "**composite forward LIBOR rate**" at any time is equal to the weighted average of the forward LIBOR rates implied in the daily settlement prices of the next 8 quarterly Eurodollar futures contracts traded on CME Globex. For information about 3-month U.S. dollar LIBOR, forward LIBOR rates and Eurodollar futures contracts,

please refer to the sections "Information About 3-Month U.S. Dollar LIBOR" and "Information About Eurodollar Futures Contracts" in this pricing supplement.

The weight of each Eurodollar futures contract used to calculate the composite forward LIBOR rate is adjusted daily in an attempt to maintain a constant weighted average tenor of those contracts of approximately 1 year. This is achieved by reducing the weight of the first contract (i.e., the contract nearest to expiration) and increasing the weight of the eighth contract (i.e., the contract farthest from expiration) proportionately as each day passes. The second through seventh contracts are equally weighted. In this pricing supplement, when we refer to the "tenor" of a Eurodollar futures contract, we refer to the remaining period of time to the last trading day of that contract.

Trading in the nearest-to-expiration Eurodollar futures contract terminates on the second London business day prior to its expiration date. On that day, which we refer to as the "**roll date**," the weight of that contract will have been reduced to zero, and the weight of the eighth contract will have been increased so that it is equal to that of the second through seventh contracts. On the immediately following trading day, weights will be allocated to the second through ninth contracts, and on the trading day after that, the contract that previously was the first contract will have expired and those second through ninth contracts will now be the first through eighth contracts.

We say that the level of the Composite Forward LIBOR Index reflects a "composite" forward LIBOR rate because it is a weighted average of 8 forward LIBOR rates. Those 8 forward LIBOR rates are implied in the daily settlement prices of Eurodollar futures contracts with tenors ranging over a period of up to 2 years (depending on how much time remains until the next roll date), weighted in a manner designed to achieve a constant weighted average tenor of approximately 1 year. It is important to understand that the composite forward LIBOR rate is not equivalent to the 1-year forward LIBOR rate, even though it is based on Eurodollar futures contracts with a weighted average tenor of approximately 1 year. The composite forward LIBOR rate is a weighted average of forward LIBOR rates covering 8 different forward time periods, and this weighted average may differ from the 1-year implied forward LIBOR rate at any given time.

See "Hypothetical Forward LIBOR Rate Curves and Eurodollar Futures Trading Price Curves—Composite Forward LIBOR Rate Vs. 1-Year Implied Forward LIBOR Rate" for hypothetical forward LIBOR rate curves that illustrate the potential difference between the composite forward LIBOR rate and the 1-year implied forward LIBOR rate.

Long LIBOR Index

The Long LIBOR Index aims to approximate the daily performance of a hypothetical long investment in the composite forward LIBOR rate (as reflected in the level of the Composite Forward LIBOR Index), as if the composite forward LIBOR rate were itself an asset that could be invested in. What this means is that the percentage change in the level of the Long LIBOR Index from one Index Business Day to the next aims to approximate the targeted participation in the percentage change in the composite forward LIBOR rate over that same one-day period. The targeted participation will be 100% unless the composite forward LIBOR rate is below the long LIBOR floor, in which case the targeted participation will be less than 100%. For example, assuming a targeted participation of 100%, if the composite forward LIBOR rate increases by 5% from one day to the next, the Long LIBOR Index aims to increase by approximately 5% over that same one-day period, and if the composite forward LIBOR rate decreases by 5% from one day to the next, the Long LIBOR Index aims to decrease by approximately 5%. It is important to understand, however, that the Long LIBOR Index will not exactly replicate the targeted participation in the daily percentage change in the composite forward LIBOR rate because of the effects of carry and the contract spread, as described in more detail below.

The Long LIBOR Index aims to approximate the targeted participation in the daily *percentage change* in the composite forward LIBOR rate, which is different from the *absolute percentage* by which the composite forward LIBOR rate changes. The percentage change in the composite forward LIBOR rate from Day 1 to Day 2 is equal to (i) the rate on Day 2 *minus* the rate on Day 1 *divided by* (ii) the rate on Day 1.

For example, suppose the composite forward LIBOR rate changes from 2.00% to 2.10% from one day to the next. That change represents a 0.10% increase in *absolute percentage* terms (0.10% being the difference between 2.00% and 2.10%), but a 5% increase in *percentage change* terms. The percentage change would be

calculated as (i) 2.10% *minus* 2.00% *divided by* (ii) 2.00%, which is equal to 5%. In this example, assuming a targeted participation of 100%, the Long LIBOR Index would aim to increase by approximately 5%, matching the percentage change in the composite forward LIBOR rate.

Now suppose that the composite forward LIBOR rate changes from 2.00% to 1.90% from one day to the next. That change represents a 0.10% decrease in *absolute percentage* terms (0.10% being the difference between 2.00% and 1.90%), but a 5% decrease in *percentage change* terms. The percentage change would be calculated as (i) 1.90% *minus* 2.00% *divided by* (ii) 2.00%, which is equal to -5%. In this example, assuming a targeted participation of 100%, the Long LIBOR Index would aim to decrease by approximately 5%, matching the percentage change in the composite forward LIBOR rate.

Long LIBOR Floor

If the composite forward LIBOR rate on any Index Business Day is less than the long LIBOR floor, the Long LIBOR Index will aim to approximate less than 100% of the percentage change in the composite forward LIBOR rate over the next Index Business Day. The "**long LIBOR floor**" for the Long LIBOR Index is 1.00%.

In other words, if the composite forward LIBOR rate is less than 1.00%, the "**targeted participation**" in the percentage change in the composite forward LIBOR rate will be less than 100%. The actual targeted participation from one Index Business Day to the next will be equal to the composite forward LIBOR rate on the first Index Business Day *divided by* the long LIBOR floor. For example, if the composite forward LIBOR rate on a given Index Business Day is 0.50%, then the targeted participation would be 50%, calculated by dividing 0.50% by the long LIBOR floor of 1.00%. A targeted participation of 50% would mean that the Long LIBOR Index aims to approximate only 50% of the percentage change in the composite forward LIBOR rate from one Index Business Day to the next.

The long LIBOR floor reduces the potential of the Long LIBOR Index to benefit from increases in the composite forward LIBOR rate at any time when the composite forward LIBOR rate is less than 1.00%.

Carry

We say that the Long LIBOR Index aims to *approximate* the daily performance of a hypothetical long investment in the composite forward LIBOR rate because it does not *directly* track its targeted participation in the percentage change in the composite forward LIBOR rate. What the Long LIBOR Index directly tracks is gains or losses on a hypothetical position in Eurodollar futures contracts, where that position is recalibrated daily to result in a return over the next Index Business Day that approximates the targeted participation in the percentage change in the composite forward LIBOR rate over that next Index Business Day (subject to the contract spread described below). The return on this hypothetical position will not exactly replicate the targeted participation in the daily percentage change in the composite forward LIBOR rate because of a phenomenon we call "**carry**" (and, in addition, because of the contract spread described below).

To obtain *long* exposure (approximately) to the composite forward LIBOR rate, the Long LIBOR Index enters into a hypothetical *short* position in a portfolio of Eurodollar futures contracts on each Index Business Day. (For information about the inverse relationship between the price of a Eurodollar futures contract and its implied forward LIBOR rate, see the discussion above under "Information About Eurodollar Futures Contracts".) That portfolio is made up of Eurodollar futures contracts having the same weights as the contracts that compose the Composite Forward LIBOR Index on that day. Therefore, that portfolio represents the composite forward LIBOR rate on that day.

The Long LIBOR Index calibrates its short exposure to that portfolio so that the percentage change in the level of the Long LIBOR Index from the Index Business Day it enters into that portfolio (**Day 1**) to the next Index Business Day (**Day 2**) will be equal to the targeted participation in the percentage change in the weighted average forward LIBOR rate implied in the daily settlement prices of the contracts that make up that portfolio over that same period (subject to the contract spread described below). On Day 1, the weighted average forward LIBOR rate implied in that portfolio is equal to the composite forward LIBOR rate on Day 1. However, on Day 2, the weighted average forward LIBOR rate implied in that portfolio is not equal to the composite forward LIBOR rate on Day 2. The portfolio that represents the composite forward LIBOR rate on Day 2 will have a weighted average tenor on

Day 2 of approximately one year. By contrast, on Day 2, the portfolio then held by the Long LIBOR Index (which is the same as the portfolio it entered into on Day 1) will have a weighted average tenor of one day less than that.

Therefore, instead of tracking the targeted participation in the percentage change from the composite forward LIBOR rate on Day 1 to the composite forward LIBOR rate on Day 2, the Long LIBOR Index tracks the targeted participation in the percentage change from the composite forward LIBOR rate on Day 1 to a weighted average forward LIBOR rate on Day 2 with a tenor of *one Index Business Day less* than the composite forward LIBOR rate on Day 2. We refer to this weighted average forward LIBOR rate on Day 2 as the "***T – 1* composite forward LIBOR rate**". As a result, the daily return on the Long LIBOR Index will differ from the targeted participation in the daily percentage change in the composite forward LIBOR rate.

The difference between the daily return on the Long LIBOR Index and the targeted participation in the daily percentage change in the composite forward LIBOR rate is due to a phenomenon we call carry. Carry refers to the return (positive or negative) on a position in Eurodollar futures contracts that results solely from the passage of time. This return is independent of changes in the composite forward LIBOR rate. Even if the composite forward LIBOR rate were to remain constant over time (or even increase), the level of the Long LIBOR Index may nevertheless decline because of the effects of carry.

Carry results because the Long LIBOR Index holds a short position in hypothetical portfolios of Eurodollar futures contracts over successive one-day periods. On each Index Business Day, the Long LIBOR Index reflects gains or losses on Eurodollar futures contracts held since the prior Index Business Day that each have a one-day shorter tenor than they had on the day before. This one-day shortening of tenor may itself have an impact on the prices of those Eurodollar futures contracts that is independent of changes in the composite forward LIBOR rate. If the implied forward LIBOR curve is upward sloping, that would mean that implied forward LIBOR rates increase with longer tenors and, conversely, decrease with shorter tenors. Therefore, if the implied forward LIBOR curve is upward sloping, the implied forward LIBOR rate of a Eurodollar futures contract should become lower as each day passes (i.e., as its tenor shortens), even if a measure of forward LIBOR rates that holds tenor constant (such as the composite forward LIBOR rate) would not change.

To understand why an upward sloping implied forward LIBOR curve would result in a carry cost on the Long LIBOR Index, recall that if the implied forward LIBOR curve is upward sloping, the Eurodollar futures contract trading price curve would be downward sloping because of the inverse relationship between price and implied forward LIBOR rate. This would mean that the prices of the Eurodollar futures contracts would tend to increase as time passes. Because the Long LIBOR Index maintains a hypothetical short position in Eurodollar futures contracts, the Long LIBOR Index would incur losses from this tendency of those contracts to increase in price as time passes.

See "Hypothetical Forward LIBOR Rate Curves and Eurodollar Futures Trading Price Curves" for examples of hypothetical implied forward LIBOR rate curves and their corresponding Eurodollar futures contract trading price curves. As noted in that section, the implied forward LIBOR rate curve is typically upward sloping, and a result the Long LIBOR Index is most often expected to incur a carry cost rather than a positive carry. The impact of carry cost is cumulative and is expected to increase over time.

Hypothetical Illustrations of the Effects of Carry

The tables below illustrate the potential negative effects of carry on the level of the Long LIBOR Index over a hypothetical period of 21 Index Business Days assuming an upward sloping implied forward LIBOR rate curve. The tables below assume a starting Long LIBOR Index level of 100 and, in order to isolate the effects of carry, disregard the effects of the contract spread.

As described above, although the Long LIBOR Index aims to approximate the targeted participation in the daily percentage change in the composite forward LIBOR rate, what it actually tracks is the targeted participation in the daily percentage change from the composite forward LIBOR rate on one Index Business Day to the *T – 1* composite forward LIBOR rate on the next Index Business Day. On any given Index Business Day, the *T – 1* composite forward LIBOR rate is the weighted average forward LIBOR rate implied in the daily settlement prices of the portfolio of Eurodollar futures contracts that *was* the portfolio used to calculate the Composite Forward LIBOR Index (and therefore the composite forward LIBOR rate) on the prior Index Business Day. On the current Index

Business Day, this portfolio will have a weighted average tenor of *one Index Business Day less* than the portfolio representing the composite forward LIBOR rate on the current Index Business Day. Because the *T – 1* composite forward LIBOR rate is consistently less than the composite forward LIBOR rate in the scenarios illustrated below (as a result of the upward sloping implied forward LIBOR rate curve), the Long LIBOR Index experiences a carry cost in the scenarios illustrated below.

In the tables below, the figures in the column titled "Cumulative Carry Cost" for each day represent the difference between the level of the Long LIBOR Index on that day and the level that the Long LIBOR Index would have had if there were no carry cost (*i.e.*, if the level exactly replicated the targeted participation in the percentage change in the composite forward LIBOR rate).

The tables below illustrate the potential negative effects of carry on the level of the Long LIBOR Index over a hypothetical period of 21 Index Business Days. By illustrating these effects over 21 Index Business Days, we are not suggesting that 21 Index Business Days is an appropriate period of time to hold the ETNs. Rather, we are illustrating the potential negative effects of carry over 21 Index Business Days to illustrate how these effects increase over a number of days and to illustrate that the risks of the ETNs increase the longer they are held. As described elsewhere in this pricing supplement, the ETNs are intended to be short-term trading tools for sophisticated investors to manage short-term trading risks.

Table 1 – Constant Composite Forward LIBOR Rate

Table 1 below assumes that the composite forward LIBOR rate remains constant at 3.00% per annum over the entire 21 Index Business Day period, and that the *T – 1* composite forward LIBOR rate also remains constant at 2.98% per annum over the entire period.

As Table 1 below illustrates, if the composite forward LIBOR rate is constant and there is an upward sloping implied forward LIBOR rate curve, so that the *T – 1* composite forward LIBOR rate is consistently less than the composite forward LIBOR rate, the level of the Long LIBOR Index will steadily lose value. In Table 1 below, the *T – 1* composite forward LIBOR rate is consistently 0.02% less than the composite forward LIBOR rate in absolute terms (which is 0.67% less in percentage change terms), and the Long LIBOR Index would lose more than 13% of its value over a period of only 21 Index Business Days.

Day	Composite Forward LIBOR Rate	*T – 1* Composite Forward LIBOR Rate	Long LIBOR Index Level	Cumulative Carry Cost
0	3.00%		100.0000	
1	3.00%	2.98%	99.3333	-0.6667%
2	3.00%	2.98%	98.6711	-1.3289%
3	3.00%	2.98%	98.0133	-1.9867%
4	3.00%	2.98%	97.3599	-2.6401%
5	3.00%	2.98%	96.7108	-3.2892%
6	3.00%	2.98%	96.0661	-3.9339%
7	3.00%	2.98%	95.4256	-4.5744%
8	3.00%	2.98%	94.7895	-5.2105%
9	3.00%	2.98%	94.1575	-5.8425%
10	3.00%	2.98%	93.5298	-6.4702%
11	3.00%	2.98%	92.9063	-7.0937%
12	3.00%	2.98%	92.2869	-7.7131%
13	3.00%	2.98%	91.6717	-8.3283%
14	3.00%	2.98%	91.0605	-8.9395%
15	3.00%	2.98%	90.4535	-9.5465%
16	3.00%	2.98%	89.8504	-10.1496%
17	3.00%	2.98%	89.2514	-10.7486%
18	3.00%	2.98%	88.6564	-11.3436%
19	3.00%	2.98%	88.0654	-11.9346%
20	3.00%	2.98%	87.4783	-12.5217%
21	3.00%	2.98%	86.8951	-13.1049%

As Table 1 above illustrates, the carry cost increases with time and can quickly become quite significant. For this reason, the ETNs are intended to be short-term trading tools. Table 1 above also illustrates, however, that carry can have a negative impact over a period of just one Index Business Day.

If the implied forward LIBOR rate curve were steeper than in the scenario illustrated above, the difference between the composite forward LIBOR rate and the *T – 1* composite forward LIBOR rate would be greater, as would the carry cost. The steeper the upward sloping implied forward LIBOR rate curve, the greater the carry cost.

Table 2 – Increasing Composite Forward LIBOR Rate

Table 2 illustrates a scenario in which the composite forward LIBOR rate increases over the 21 Index Business Day period. Although the *T – 1* composite forward LIBOR rate also increases over this period, it remains consistently 0.02% less than the composite forward LIBOR rate in absolute terms. In this scenario, the resulting carry cost more than offsets the increase in the composite forward LIBOR rate, and the Long LIBOR Index loses nearly 7% of its value even though the composite forward LIBOR rate has increased by 6.67% (in percentage change terms) over this 21 Index Business Day period.

Day	Composite Forward LIBOR Rate	*T – 1* Composite Forward LIBOR Rate	Long LIBOR Index Level	Cumulative Carry Cost
0	3.00%		100.0000	
1	3.00%	2.98%	99.3333	-0.6667%
2	3.00%	2.98%	98.6711	-1.3289%
3	3.02%	3.00%	98.6711	-1.9956%
4	3.02%	3.00%	98.0177	-2.6490%
5	3.04%	3.02%	98.0177	-3.3157%
6	3.04%	3.02%	97.3728	-3.9605%
7	3.06%	3.04%	97.3728	-4.6272%
8	3.06%	3.04%	96.7364	-5.2636%
9	3.08%	3.06%	96.7364	-5.9303%
10	3.08%	3.06%	96.1082	-6.5584%
11	3.10%	3.08%	96.1082	-7.2251%
12	3.10%	3.08%	95.4882	-7.8452%
13	3.12%	3.10%	95.4882	-8.5118%
14	3.12%	3.10%	94.8761	-9.1239%
15	3.14%	3.12%	94.8761	-9.7906%
16	3.14%	3.12%	94.2718	-10.3949%
17	3.16%	3.14%	94.2718	-11.0616%
18	3.16%	3.14%	93.6751	-11.6582%
19	3.18%	3.16%	93.6751	-12.3249%
20	3.18%	3.16%	93.0860	-12.9140%
21	3.20%	3.18%	93.0860	-13.5807%

As this example illustrates, even if the composite forward LIBOR rate increases over any given time period, the Long LIBOR Index may nevertheless experience a significant decline as a result of the carry cost on the Long LIBOR Index.

Contract Spread

The performance of the Long LIBOR Index is also reduced by a hypothetical daily transaction cost that we refer to as the "**contract spread**". The contract spread is intended to reflect a hypothetical transaction cost associated with the daily adjustment to the Long LIBOR Index's exposure to Eurodollar futures contracts. As discussed above, the weights of the first and eighth quarterly Eurodollar futures contracts are adjusted daily in an attempt to maintain a weighted average tenor of approximately one year. In addition, the Long LIBOR Index's exposure to all eight Eurodollar futures contracts is adjusted daily as necessary to approximate the targeted participation in the daily percentage change in the composite forward LIBOR rate over the next day. These

adjustments to the Long LIBOR Index's exposure to the Eurodollar futures contracts result in increases or decreases in the size of the Long LIBOR Index's hypothetical position in each of those contracts. The amount of the hypothetical position in each contract that is either increased or decreased is not implemented at the daily settlement price for the relevant contract on that day, but at the daily settlement price as adjusted by a notional transaction cost equal to .0025.

For example, if the daily settlement price of a contract is 99.25 and the relevant adjustments result in a decrease in the Long LIBOR Index's hypothetical short position in that contract, then the Long LIBOR Index will unwind a portion of its hypothetical short position in that contract on that day at a price of 99.2525, and if the relevant adjustments result in an increase in the Long LIBOR Index's hypothetical short position in that contract, then the Long LIBOR Index will increase its hypothetical short position in that contract on that day at a price of 99.2475. As this example illustrates, the contract spread increases the price at which the Long LIBOR Index will unwind a portion of its hypothetical short position in a contract and decreases the price at which the Long LIBOR Index will increase its hypothetical short position in a contract. This daily process – effectively increasing each short sale price and decreasing each short purchase price – will have a negative effect on the level of the Long LIBOR Index on a daily basis.

See "Hypothetical Back-Tested and Historical Index Information" below for information about the impact of the contract spread on the hypothetical back-tested performance of the Long LIBOR Index.

Short LIBOR Index

The Short LIBOR Index aims to approximate the daily performance of a hypothetical short position in the composite forward LIBOR rate (as reflected in the level of the Composite Forward LIBOR Index), as if the composite forward LIBOR rate were itself an asset that could be shorted. What this means is that the percentage change in the level of the Short LIBOR Index from one Index Business Day to the next aims to approximate the targeted participation in the *inverse* of the percentage change in the composite forward LIBOR rate over that same one-day period. The targeted participation will be 100% unless the composite forward LIBOR rate is below the short LIBOR floor, in which case the targeted participation will be less than 100%. For example, assuming a targeted participation of 100%, if the composite forward LIBOR rate increases by 5% from one day to the next, the Short LIBOR Index aims to decrease by approximately 5% over that same one-day period, and if the composite forward LIBOR rate decreases by 5% from one day to the next, the Short LIBOR Index aims to increase by approximately 5%. It is important to understand, however, that the Short LIBOR Index will not exactly replicate the targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate because of the effects of carry and the contract spread, as described in more detail below.

The Short LIBOR Index aims to approximate the inverse of the daily *percentage change* in the composite forward LIBOR rate, which is different from the *absolute percentage* by which the composite forward LIBOR rate changes. The percentage change in the composite forward LIBOR rate from Day 1 to Day 2 is equal to (i) the rate on Day 2 *minus* the rate on Day 1 *divided by* (ii) the rate on Day 1.

For example, suppose the composite forward LIBOR rate changes from 2.00% to 2.10% from one day to the next. That change represents a 0.10% increase in *absolute percentage* terms (0.10% being the difference between 2.00% and 2.10%), but a 5% increase in *percentage change* terms. The percentage change would be calculated as (i) 2.10% *minus* 2.00% *divided by* (ii) 2.00%, which is equal to 5%. In this example, assuming a targeted participation of 100%, the Short LIBOR Index would aim to decrease by approximately 5%, matching the inverse of the percentage change in the composite forward LIBOR rate.

Now suppose that the composite forward LIBOR rate changes from 2.00% to 1.90% from one day to the next. That change represents a 0.10% decrease in *absolute percentage* terms (0.10% being the difference between 2.00% and 1.90%), but a 5% decrease in *percentage change* terms. The percentage change would be calculated as (i) 1.90% *minus* 2.00% *divided by* (ii) 2.00%, which is equal to -5%. In this example, assuming a targeted participation of 100%, the Short LIBOR Index would aim to increase by approximately 5%, matching the inverse of the percentage change in the composite forward LIBOR rate.

Short LIBOR Floor

If the composite forward LIBOR rate on any Index Business Day is less than the short LIBOR floor, the Short LIBOR Index will aim to approximate less than 100% of the inverse of the percentage change in the composite forward LIBOR rate over the next Index Business Day. The "**short LIBOR floor**" for the Short LIBOR Index is 2.50%.

In other words, if the composite forward LIBOR rate is less than 2.50%, the "**targeted participation**" in the inverse of the percentage change in the composite forward LIBOR rate will be less than 100%. The actual targeted participation from one Index Business Day to the next will be equal to the composite forward LIBOR rate on the first Index Business Day *divided by* the short LIBOR floor. For example, if the composite forward LIBOR rate on a given Index Business Day is 0.50%, then the targeted participation would be 20%, calculated by dividing 0.50% by the short LIBOR floor of 2.50%. A targeted participation of 20% would mean that the Short LIBOR Index aims to approximate only 20% of the inverse of the percentage change in the composite forward LIBOR rate from one Index Business Day to the next.

The short LIBOR floor reduces the potential of the Short LIBOR Index to benefit from decreases in the composite forward LIBOR rate at any time when the composite forward LIBOR rate is less than 2.50%.

Carry

We say that the Short LIBOR Index aims to *approximate* the daily performance of a hypothetical short position in the composite forward LIBOR rate because it does not *directly* track the targeted participation in the inverse of the percentage change in the composite forward LIBOR rate. What the Short LIBOR Index directly tracks is gains or losses on a hypothetical position in Eurodollar futures contracts, where that position is recalibrated daily to result in a return over the next Index Business Day that approximates the targeted participation in the inverse of the percentage change in the composite forward LIBOR rate over that next Index Business Day (subject to the contract spread described below). The return on this hypothetical position will not exactly replicate the targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate because of a phenomenon we call "**carry**" (and, in addition, because of the contract spread described below).

To obtain *short* exposure (approximately) to the composite forward LIBOR rate, the Short LIBOR Index enters into a hypothetical *long* position in a portfolio of Eurodollar futures contracts on each Index Business Day. (For information about the inverse relationship between the price of a Eurodollar futures contract and its implied forward LIBOR rate, see the discussion above under "Information About Eurodollar Futures Contracts".) That portfolio is made up of Eurodollar futures contracts having the same weights as the contracts that compose the Composite Forward LIBOR Index on that day. Therefore, that portfolio represents the composite forward LIBOR rate on that day.

The Short LIBOR Index calibrates its long exposure to that portfolio so that the percentage change in the level of the Short LIBOR Index from the Index Business Day it enters into that portfolio (**Day 1**) to the next Index Business Day (**Day 2**) will be equal to the targeted participation in the inverse of the percentage change in the weighted average forward LIBOR rate implied in the daily settlement prices of the contracts that make up that portfolio over that same period (subject to the contract spread described below). On Day 1, the weighted average forward LIBOR rate implied in that portfolio is equal to the composite forward LIBOR rate on Day 1. However, on Day 2, the weighted average forward LIBOR rate implied in that portfolio is not equal to the composite forward LIBOR rate on Day 2. The portfolio that represents the composite forward LIBOR rate on Day 2 will have a weighted average tenor on Day 2 of approximately one year. By contrast, on Day 2, the portfolio then held by the Short LIBOR Index (which is the same as the portfolio it entered into on Day 1) will have a weighted average tenor of one day less than that.

Therefore, instead of tracking the targeted participation in the inverse of the percentage change from the composite forward LIBOR rate on Day 1 to the composite forward LIBOR rate on Day 2, the Short LIBOR Index tracks the targeted participation in the inverse of the percentage change from the composite forward LIBOR rate on Day 1 to a weighted average forward LIBOR rate on Day 2 with a tenor of *one Index Business Day less* than the composite forward LIBOR rate on Day 2. We refer to this weighted average forward LIBOR rate on Day 2 as the

"***T – 1* composite forward LIBOR rate**". As a result, the daily return on the Short LIBOR Index will differ from the targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate.

The difference between the daily return on the Short LIBOR Index and the targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate is due to a phenomenon we call carry. Carry refers to the return (positive or negative) on a position in Eurodollar futures contracts that results solely from the passage of time. This return is independent of changes in the composite forward LIBOR rate. Even if the composite forward LIBOR rate were to remain constant over time (or even decrease), the level of the Short LIBOR Index may nevertheless decline because of the effects of carry.

Carry results because the Short LIBOR Index holds a long position in hypothetical portfolios of Eurodollar futures contracts over successive one-day periods. On each Index Business Day, the Short LIBOR Index reflects gains or losses on Eurodollar futures contracts held since the prior Index Business Day that each have a one-day shorter tenor than they had on the day before. This one-day shortening of tenor may itself have an impact on the prices of those Eurodollar futures contracts that is independent of changes in the composite forward LIBOR rate. If the implied forward LIBOR curve is downward sloping, that would mean that implied forward LIBOR rates decrease with longer tenors and, conversely, increase with shorter tenors. Therefore, if the implied forward LIBOR curve is downward sloping, the implied forward LIBOR rate of a Eurodollar futures contract should increase as each day passes (i.e., as its tenor shortens), even if a measure of forward LIBOR rates that holds tenor constant (such as the composite forward LIBOR rate) would not change.

To understand why a downward sloping implied forward LIBOR curve would result in a carry cost on the Short LIBOR Index, recall that if the implied forward LIBOR curve is downward sloping, the Eurodollar futures contract trading price curve would be upward sloping because of the inverse relationship between price and implied forward LIBOR rate. This would mean that the prices of the Eurodollar futures contracts would tend to decrease as time passes. Because the Short LIBOR Index maintains a hypothetical long position in Eurodollar futures contracts, the Short LIBOR Index would incur losses from this tendency of those contracts to decrease in price as time passes.

See "Hypothetical Forward LIBOR Rate Curves and Eurodollar Futures Trading Price Curves" for examples of hypothetical implied forward LIBOR rate curves and their corresponding Eurodollar futures contract trading price curves.

Hypothetical Illustrations of the Effects of Carry

The tables below illustrate the potential negative effects of carry on the level of the Short LIBOR Index over a hypothetical period of 21 Index Business Days assuming a downward sloping implied forward LIBOR rate curve. The tables below assume a starting Short LIBOR Index level of 100 and, in order to isolate the effects of carry, disregard the effects of the contract spread.

As described above, although the Short LIBOR Index aims to approximate the targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate, what it actually tracks is the targeted participation in the inverse of the daily percentage change from the composite forward LIBOR rate on one Index Business Day to the *T – 1* composite forward LIBOR rate on the next Index Business Day. On any given Index Business Day, the *T – 1* composite forward LIBOR rate is the weighted average forward LIBOR rate implied in the daily settlement prices of the portfolio of Eurodollar futures contracts that *was* the portfolio used to calculate the Composite Forward LIBOR Index (and therefore the composite forward LIBOR rate) on the prior Index Business Day. On the current Index Business Day, this portfolio will have a weighted average tenor of *one Index Business Day less* than the portfolio representing the composite forward LIBOR rate on the current Index Business Day. Because the *T – 1* composite forward LIBOR rate is consistently higher than the composite forward LIBOR rate in the scenarios illustrated below (as a result of the downward sloping implied forward LIBOR rate curve), the Short LIBOR Index experiences a carry cost in the scenarios illustrated below.

In the tables below, the figures in the column titled "Cumulative Carry Cost" for each day represent the difference between the level of the Short LIBOR Index on that day and the level that the Short LIBOR Index would have had if there were no carry cost (*i.e.*, if the level exactly replicated the targeted participation in the inverse of the percentage change in the composite forward LIBOR rate).

The tables below illustrate the potential negative effects of carry on the level of the Short LIBOR Index over a hypothetical period of 21 Index Business Days. By illustrating these effects over 21 Index Business Days, we are not suggesting that 21 Index Business Days is an appropriate period of time to hold the ETNs. Rather, we are illustrating the potential negative effects of carry over 21 Index Business Days to illustrate how these effects increase over a number of days and to illustrate that the risks of the ETNs increase the longer they are held. As described elsewhere in this pricing supplement, the ETNs are intended to be short-term trading tools for sophisticated investors to manage short-term trading risks.

Table 3 – Constant Composite Forward LIBOR Rate

Table 3 below assumes that the composite forward LIBOR rate remains constant at 3.00% per annum over the entire 21 Index Business Day period, and that the *T – 1* composite forward LIBOR rate also remains constant at 3.02% per annum over the entire period.

As Table 3 below illustrates, if the composite forward LIBOR rate is constant and there is a downward sloping implied forward LIBOR rate curve, so that the *T – 1* composite forward LIBOR rate is consistently greater than the composite forward LIBOR rate, the level of the Short LIBOR Index will steadily lose value. In Table 3 below, the *T – 1* composite forward LIBOR rate is consistently 0.02% higher than the composite forward LIBOR rate in absolute terms (which is 0.67% higher in percentage change terms), and the Short LIBOR Index would lose more than 13% of its value over a period of only 21 Index Business Days.

Day	Composite Forward LIBOR Rate	*T – 1* Composite Forward LIBOR Rate	Short LIBOR Index Level	Cumulative Carry Cost
0	3.00%		100.0000	
1	3.00%	3.02%	99.3333	-0.6667%
2	3.00%	3.02%	98.6711	-1.3289%
3	3.00%	3.02%	98.0133	-1.9867%
4	3.00%	3.02%	97.3599	-2.6401%
5	3.00%	3.02%	96.7108	-3.2892%
6	3.00%	3.02%	96.0661	-3.9339%
7	3.00%	3.02%	95.4256	-4.5744%
8	3.00%	3.02%	94.7895	-5.2105%
9	3.00%	3.02%	94.1575	-5.8425%
10	3.00%	3.02%	93.5298	-6.4702%
11	3.00%	3.02%	92.9063	-7.0937%
12	3.00%	3.02%	92.2869	-7.7131%
13	3.00%	3.02%	91.6717	-8.3283%
14	3.00%	3.02%	91.0605	-8.9395%
15	3.00%	3.02%	90.4535	-9.5465%
16	3.00%	3.02%	89.8504	-10.1496%
17	3.00%	3.02%	89.2514	-10.7486%
18	3.00%	3.02%	88.6564	-11.3436%
19	3.00%	3.02%	88.0654	-11.9346%
20	3.00%	3.02%	87.4783	-12.5217%
21	3.00%	3.02%	86.8951	-13.1049%

As Table 3 above illustrates, the carry cost increases with time and can quickly become quite significant. For this reason, the ETNs are intended to be short-term trading tools. Table 3 above also illustrates, however, that carry can have a negative impact over a period of just one Index Business Day.

If the implied forward LIBOR rate curve were steeper than in the scenario illustrated above, the difference between the composite forward LIBOR rate and the *T – 1* composite forward LIBOR rate would be greater, as would the carry cost. The steeper the downward sloping implied forward LIBOR rate curve, the greater the carry cost on the Short LIBOR Index.

Table 4 – Decreasing Composite Forward LIBOR Rate

Table 4 illustrates a scenario in which the composite forward LIBOR rate decreases over the 21 Index Business Day period. Although the *T – 1* composite forward LIBOR rate also decreases over this period, it remains consistently 0.02% greater than the composite forward LIBOR rate in absolute terms. In this scenario, the resulting carry cost more than offsets the decrease in the composite forward LIBOR rate, and the Short LIBOR Index loses more than 7% of its value even though the composite forward LIBOR rate has decreased by 6.67% (in percentage change terms) over this 21 Index Business Day period.

Day	Composite Forward LIBOR Rate	*T – 1* Composite Forward LIBOR Rate	Short LIBOR Index Level	Cumulative Carry Cost
0	3.00%		100.0000	
1	3.00%	3.02%	99.3333	-0.6667%
2	3.00%	3.02%	98.6711	-1.3289%
3	2.98%	3.00%	98.6711	-1.9956%
4	2.98%	3.00%	98.0089	-2.6578%
5	2.96%	2.98%	98.0089	-3.3334%
6	2.96%	2.98%	97.3467	-3.9956%
7	2.94%	2.96%	97.3467	-4.6804%
8	2.94%	2.96%	96.6844	-5.3426%
9	2.92%	2.94%	96.6844	-6.0366%
10	2.92%	2.94%	96.0222	-6.6989%
11	2.90%	2.92%	96.0222	-7.4024%
12	2.90%	2.92%	95.3600	-8.0647%
13	2.88%	2.90%	95.3600	-8.7779%
14	2.88%	2.90%	94.6978	-9.4402%
15	2.86%	2.88%	94.6978	-10.1633%
16	2.86%	2.88%	94.0356	-10.8256%
17	2.84%	2.86%	94.0356	-11.5589%
18	2.84%	2.86%	93.3733	-12.2211%
19	2.82%	2.84%	93.3733	-12.9647%
20	2.82%	2.84%	92.7111	-13.6269%
21	2.80%	2.82%	92.7111	-14.3811%

As this example illustrates, even if the composite forward LIBOR rate decreases over any given time period, the Short LIBOR Index may nevertheless experience a significant decline as a result of the carry cost.

Contract Spread

The performance of the Short LIBOR Index is also reduced by a hypothetical daily transaction cost that we refer to as the "**contract spread**". The contract spread is intended to reflect a hypothetical transaction cost associated with the daily adjustment to the Short LIBOR Index's exposure to Eurodollar futures contracts. As discussed above, the weights of the first and eighth quarterly Eurodollar futures contracts are adjusted daily in an attempt to maintain a weighted average tenor of approximately one year. In addition, the Short LIBOR Index's exposure to all eight Eurodollar futures contracts is adjusted daily as necessary to approximate the targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate over the next day. These adjustments to the Short LIBOR Index's exposure to the Eurodollar futures contracts result in increases or decreases in the size of the Short LIBOR Index's hypothetical position in each of those contracts. The amount of the hypothetical position in each contract that is either increased or decreased is not implemented at the daily settlement price for the relevant contract on that day, but at the daily settlement price as adjusted by a notional transaction cost equal to .0025.

For example, if the daily settlement price of a contract is 99.25 and the relevant adjustments result in a decrease in the Short LIBOR Index's hypothetical long position in that contract, then the Short LIBOR Index will unwind a portion of its hypothetical long position in that contract on that day at a price of 99.2475, and if the

relevant adjustments result in an increase in the Short LIBOR Index's hypothetical long position in that contract, then the Short LIBOR Index will increase its hypothetical long position in that contract on that day at a price of 99.2525. As this example illustrates, the contract spread decreases the price at which the Short LIBOR Index will unwind a portion of its hypothetical long position in a contract and increases the price at which the Short LIBOR Index will increase its hypothetical long position in a contract. This daily process – effectively decreasing each sale price and increasing each purchase price – will have a negative effect on the level of the Short LIBOR Index on a daily basis.

See "Hypothetical Back-Tested and Historical Index Information" below for information about the impact of the contract spread on the hypothetical back-tested performance of the Short LIBOR Index.

Index Calculation

The Index Sponsor has retained Solactive AG to calculate and publish the level of each Janus Velocity LIBOR Index on each Index Business Day (in that role, the "**Index Calculation Agent**"). The Index Sponsor may replace the Index Calculation Agent at any time, including with the Index Sponsor or one of its affiliates.

On each Index Business Day, the Index Calculation Agent will publish an official closing level of each Janus Velocity LIBOR Index based on the official daily settlement prices of the Eurodollar futures contracts composing that index on that Index Business Day. See "Information About Eurodollar Futures Contracts" for information about how and when the official daily settlement prices for Eurodollar futures contracts are determined. The Index Calculation Agent publishes the official closing level of each Janus Velocity LIBOR Index on each Index Business Day at approximately 6:30 p.m., New York City time.

The Index Calculation Agent will also publish an intraday level of each Janus Velocity LIBOR Index every 15 seconds during regular trading hours on the NYSE Arca, up to 3:00 p.m., New York City time, based on the most recently published trading prices of the Eurodollar futures contracts then composing those indices.

The Janus Velocity LIBOR Indices are published on Bloomberg under the following tickers:

Index	Index Ticker
Composite Forward LIBOR Index	LBRID
Long LIBOR Index	ULBRID
Short LIBOR Index	DLBRID

An "**Index Business Day**" is a weekday on which the New York Stock Exchange and Chicago Mercantile Exchange are both open for trading for their regular trading sessions.

The Index Sponsor launched the Janus Velocity LIBOR Indices on September 30, 2016. All information regarding the performance of the Janus Velocity LIBOR Indices prior to that date is hypothetical and back-tested, as the Janus Velocity LIBOR Indices did not exist prior to that date.

The Long LIBOR Index and Short LIBOR Index are described as aiming to approximate the daily performance of a hypothetical long investment or a hypothetical short position in Eurodollar futures contracts because there are no actual Eurodollar futures contracts or other assets to which any ETN investor is entitled or in which any ETN investor has any ownership or other interest. The Long LIBOR Index and Short LIBOR Index are merely mathematical calculations performed by reference to hypothetical positions in Eurodollar futures contracts, as described in this section.

The Long LIBOR Index and Short LIBOR Index are "excess return" indices, which means that they reflect gains or losses on hypothetical positions in Eurodollar futures contracts without taking into account interest that could be earned on hypothetical cash collateralizing those positions.

Force Majeure

Calculation of the Janus Velocity LIBOR Indices may not be possible or feasible under certain events or circumstances, including, without limitation, market disruptions, a systems failure, natural or man-made disaster, act of God, armed conflict, act of terrorism, riot or labor disruption or any similar intervening circumstance, that is beyond the reasonable control of the Index Sponsor and that the Index Sponsor determines affects the Janus Velocity LIBOR Indices or underlying markets. Upon the occurrence of any such force majeure event, the Index Sponsor may, in its discretion, elect one (or more) of the following options:

- Make such determinations and/or adjustments to the terms of the Janus Velocity LIBOR Indices as it considers appropriate to determine any closing level on any such appropriate Index Business Day; and/or

- Defer publication of the information relating to the Janus Velocity LIBOR Indices until the next Index Business Day on which it determines that no force majeure event exists; and/or

- Permanently cancel the publication of the information relating to the Janus Velocity LIBOR Indices. The Index Sponsor employs the methodology described above and its application of the methodology shall be conclusive and binding.

Market Disruption

In the event of a Disrupted Day, the roll (i.e., the adjustment of the weights of the Eurodollar futures contracts composing each Janus Velocity LIBOR Index and each Janus Velocity LIBOR Index's exposure thereto) for that day is carried out on the next non-disrupted Index Business Day. The rest of the scheduled roll proceeds accordingly after the completion of the next non-disrupted Index Business Day.

"Disrupted Day" shall mean any scheduled Index Business Day on which any of the events set out below occurs:

- The Chicago Mercantile Exchange or the New York Stock Exchange fails to open for trading; or

- A suspension of or limitation imposed (whether by reason of movements in price exceeding permitted limits or otherwise) on the trading on the Chicago Mercantile Exchange of Eurodollar futures contracts at any time during the one hour period which ends at 3:00 p.m., New York City time (the "**Valuation Time**"); or

- An event which disrupts or impairs the ability of market participants in general to effect transactions in or to obtain market values for Eurodollar futures contracts at any time during the one hour period which ends at the Valuation Time; or

- The closure of the Chicago Mercantile Exchange in respect of Eurodollar futures contracts prior to its scheduled closing time (unless such earlier closing time is announced by the Chicago Mercantile Exchange at least one hour prior to the earlier of (i) the actual closing time for the regular trading session; and (ii) the deadline for the submission of orders to be entered into the Chicago Mercantile Exchange system for execution at the Valuation Time).

Delisting of Eurodollar Futures Contracts

If one or more Eurodollar futures contracts included in one of the Janus Velocity LIBOR Indices is no longer listed, the Index Sponsor may choose to suspend publication of any affected index at that time.

Index Committee

The Index Committee is responsible for reviewing the design, composition, and calculation of the Janus Velocity LIBOR Indices, the development of new indices, and to determine changes, if any, to the Index

Methodology. The Index Committee is composed of senior personnel of Janus Index & Calculation Services LLC and includes an external, unaffiliated representative.

Decisions made by the Index Committee include all matters related to index policy and maintenance. The Index Committee meets periodically to review market conditions and index performance, or on an as-needed basis to address major market developments.

The Index Committee reserves the right to exercise its discretion in making decisions with respect to any index policy or action. Index Committee internal procedures and discussions are considered to be potentially market moving and are therefore kept confidential.

Index Methodology

The description of the Janus Velocity LIBOR Indices set forth in this section is only a summary of the rules by which the Janus Velocity LIBOR Indices are calculated. The level of each Janus Velocity LIBOR Index will be calculated in accordance with the rules and mathematical formulas specified in the Janus Velocity LIBOR Index Methodology (the "**Index Methodology**"), which is attached to this pricing supplement as Annex B, and not based on the summary contained in this section. In the event of any inconsistency between this section and the Index Methodology, the Index Methodology controls. We have not independently verified the Index Methodology.

Suspension and Cancellation

The Index Sponsor may suspend the calculation and/or publication of, or discontinue or cancel, any Index at any time and is under no obligation to continue, or procure the continuation of, the calculation or publication of any Index.

License Agreement

CGMI and the Index Sponsor have entered into a license agreement pursuant to which CGMI and its affiliates have been granted the right to use certain intellectual property of the Index Sponsor in connection with the Indices and the ETNs. In consideration for this license, CGMI has agreed to pay the Index Sponsor a license fee that will accrue on a daily basis and will depend on the aggregate Closing Indicative Value of the ETNs of each series that are outstanding and held by investors on each day. "VelocityShares" and the VelocityShares logo are service marks of the Index Sponsor and are used in this pricing supplement under license.

The Index Sponsor has the right to terminate the license agreement at any time upon prior notice to CGMI. If the Index Sponsor terminates the license agreement, we may be required to discontinue issuances and sales of ETNs, which could result in distortions in the market for the ETNs. See "Risk Factors—We and CGMI are under no obligation to issue or sell additional ETNs of any series at any time, and if we and CGMI do sell additional ETNs of any series, we or CGMI may limit or restrict such sales, and we or CGMI may stop and subsequently resume selling additional ETNs of such series at any time."

The Indices are the exclusive property of Janus Index & Calculation Services.

The license agreement with the Index Sponsor requires the following statements to appear in this pricing supplement:

"Neither Janus Index & Calculation Services ("**Janus**") nor any other party makes any representation or warranty, express or implied, to the owners of the ETNs or any member of the public regarding the advisability of investing in the ETNs generally or the similarities or variations between the performance of the ETNs or the applicable Index and the performance of the underlying securities or financial instruments. Neither Janus nor any other party guarantees the accuracy and/or the completeness of the Indices or any data included therein or any calculations made with respect to the ETNs. Janus disclaims all warranties of merchantability or fitness for any particular purpose with respect to the Indices or any data included therein.

ALTHOUGH JANUS SHALL OBTAIN INFORMATION FOR INCLUSION IN OR FOR USE IN CALCULATIONS RELATED TO THE INDICES FROM SOURCES WHICH JANUS CONSIDERS RELIABLE,

NEITHER JANUS NOR ANY OTHER PARTY GUARANTEES THE ACCURACY AND/OR THE COMPLETENESS OF THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS. NEITHER JANUS NOR ANY OTHER PARTY MAKES ANY WARRANTY, EXPRESS OR IMPLIED, AS TO RESULTS TO BE OBTAINED BY LICENSEE, LICENSEE'S CUSTOMERS AND COUNTERPARTIES, HOLDERS OF THE ETNS, OR ANY OTHER PERSON OR ENTITY FROM THE USE OF THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS IN CONNECTION WITH THE RIGHTS LICENSED HEREUNDER OR FOR ANY OTHER USE. JANUS MAKES NO EXPRESS OR IMPLIED WARRANTIES, AND JANUS HEREBY EXPRESSLY DISCLAIMS ALL WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE WITH RESPECT TO THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS. WITHOUT LIMITING ANY OF THE FOREGOING, IN NO EVENT SHALL JANUS HAVE ANY LIABILITY FOR ANY DIRECT, INDIRECT, SPECIAL, PUNITIVE OR CONSEQUENTIAL OR ANY OTHER DAMAGES (INCLUDING LOST PROFITS) EVEN IF NOTIFIED OF THE POSSIBILITY OF SUCH DAMAGES."

HYPOTHETICAL BACK-TESTED AND HISTORICAL INDEX INFORMATION

This section contains hypothetical back-tested performance information for the Indices. All performance information for the Indices prior to September 30, 2016 is hypothetical and back-tested, as the Indices did not exist prior to that date. There is no actual historical performance information by which to evaluate either Index prior to September 30, 2016. Hypothetical back-tested performance information is subject to significant limitations. The hypothetical back-tested performance of the Indices might look different if it covered a different historical period. The market conditions that existed during the hypothetical back-tested period may not be representative of market conditions that will exist in the future.

You should note that the hypothetical back-tested performance information below depicts only the hypothetical performance of the Indices and does not take into account the Daily Accrual or Daily Investor Fee reflected in the return on the ETNs. Accordingly, the graphs below do not purport to show how any ETN would have performed during the periods shown.

The hypothetical back-tested and historical levels of the Indices were calculated by the Index Sponsor, and we have not independently verified their accuracy. The Index Sponsor has advised us that the hypothetical back-tested information below was calculated in a manner consistent with the methodology described under "Description of the Janus Velocity LIBOR Indices" in this pricing supplement, using published historical prices for the Eurodollar futures contracts underlying each Index during the relevant period. However, the hypothetical back-tested performance information has been calculated without giving effect to any Disrupted Days that may have occurred during the hypothetical back-tested period.

It is impossible to predict whether either Index will rise or fall. By providing the hypothetical back-tested and historical performance information for the Indices below, we are not representing that either Index is likely to achieve gains or losses similar to those shown. In fact, there are frequently sharp differences between hypothetical performance results and the actual results subsequently achieved by any particular investment. One of the limitations of hypothetical performance information is that it did not involve financial risk and cannot account for all factors that would affect actual performance. The actual future performance of each Index may bear no relation to its hypothetical back-tested or historical performance.

Hypothetical Back-Tested and Historical Levels of the Composite Forward LIBOR Index

The graph below depicts the hypothetical back-tested levels of the Composite Forward LIBOR Index for the period from December 30, 2005 to September 29, 2016 and the historical levels of the Composite Forward LIBOR Index for the period from September 30, 2016 to December 18, 2017. The level of the Composite Forward LIBOR Index at any time represents the composite forward LIBOR rate at that time, expressed as a number of basis points. A basis point is one hundredth of a percentage point. For example, a Composite Forward LIBOR Index level of 200 would represent a composite forward LIBOR rate of 2.00%.

Past performance is not an indication of future performance. The future levels of the Composite Forward LIBOR Index may bear no relation to the hypothetical back-tested or historical levels shown in the graph below.

The actual level of the Composite Forward LIBOR Index as of December 18, 2017 was 206.52.

Hypothetical Back-Tested and Historical Composite Forward LIBOR Index Levels

Neither series of ETNs is linked to the Composite Forward LIBOR Index. We are providing the hypothetical back-tested and historical levels of the Composite Forward LIBOR Index above because the Composite Forward LIBOR Index is a key building block in the calculation of the Long LIBOR Index, to which the Long LIBOR ETNs are linked, and the Short LIBOR Index, to which the Short LIBOR ETNs are linked.

Hypothetical Back-Tested and Historical Performance Information for the Long LIBOR Index

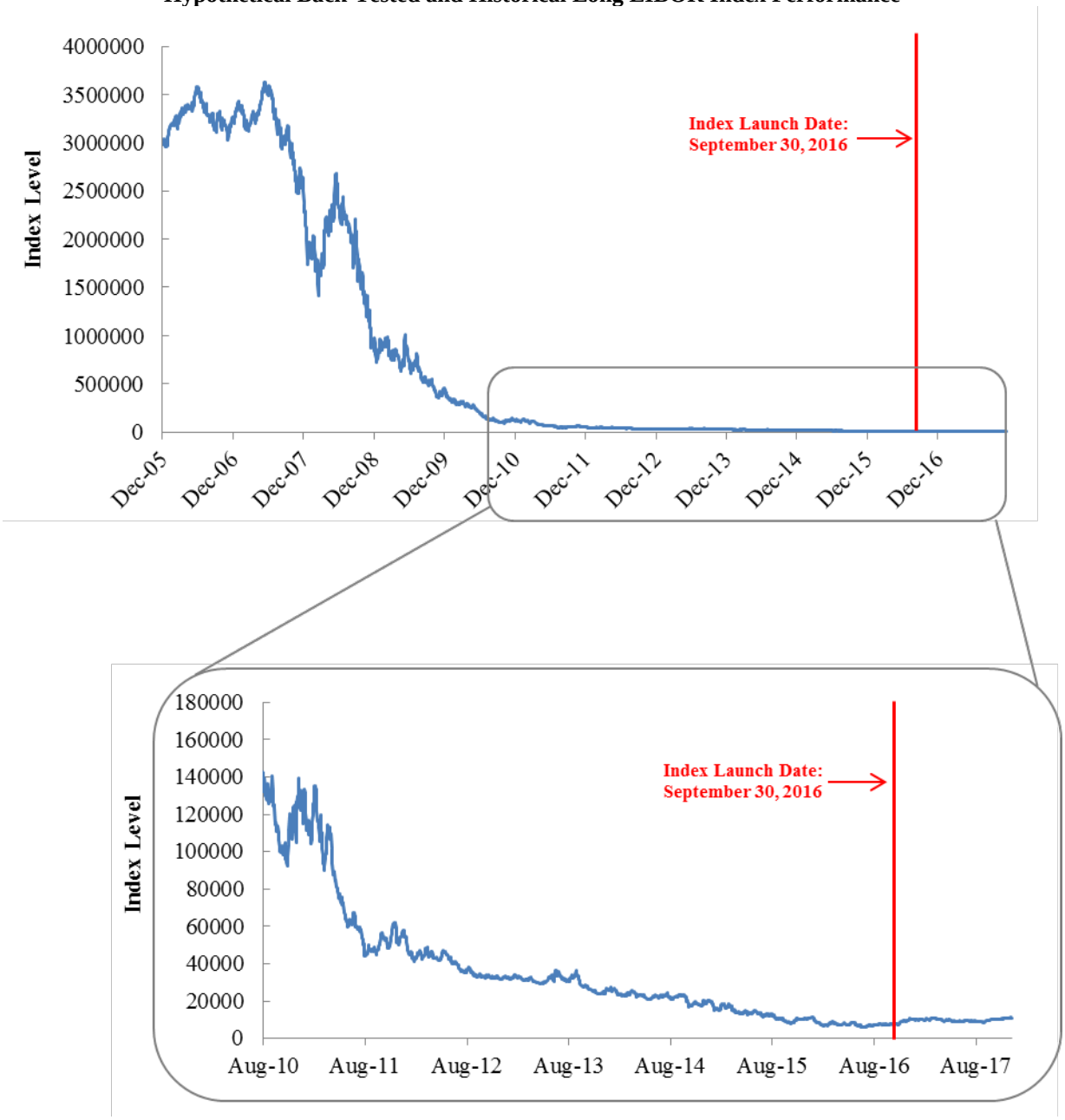
Index Performance

The first graph below depicts the hypothetical back-tested performance of the Long LIBOR Index for the period from December 30, 2005 to September 29, 2016 and the historical performance of the Long LIBOR Index for the period from September 30, 2016 to December 18, 2017. Because the scale used in the first graph makes it difficult to see the performance of the Long LIBOR Index in the most recent years, we have provided a second graph below that depicts the hypothetical back-tested and historical performance of the Long LIBOR Index from August 1, 2012 to December 18, 2017 on a different scale than that used in the first graph below.

Past performance is not an indication of future performance. The future performance of the Long LIBOR Index may bear no relation to the hypothetical back-tested or historical performance shown in the graphs below.

The actual level of the Long LIBOR Index as of December 18, 2017 was 11,053.80.

Hypothetical Back-Tested and Historical Long LIBOR Index Performance

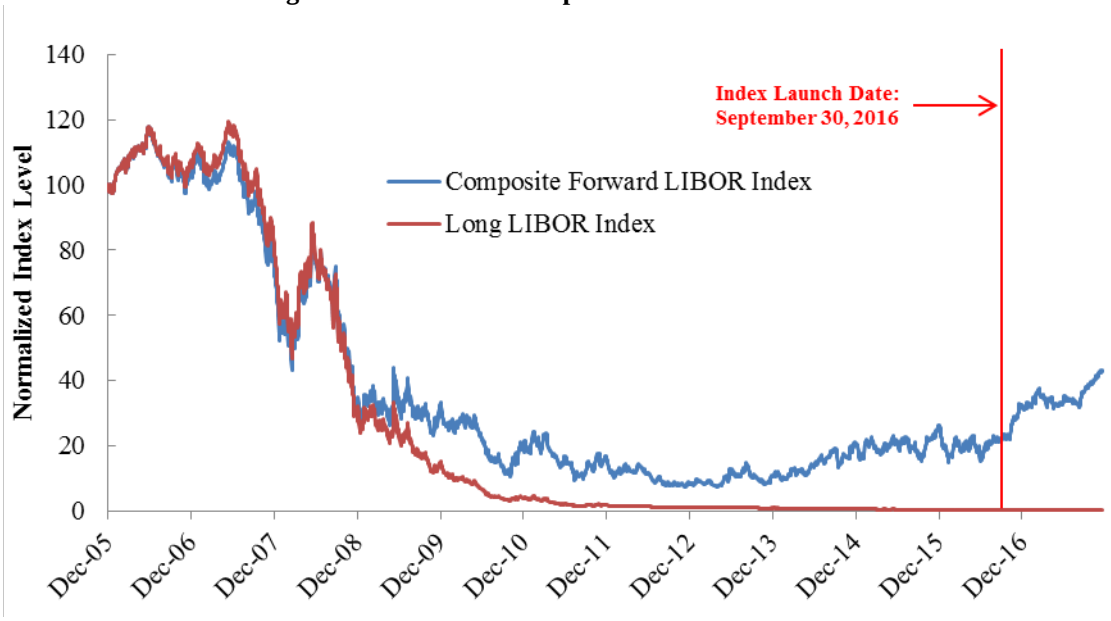


Comparison with Composite Forward LIBOR Index

The following graph depicts the hypothetical back-tested performance of the Long LIBOR Index as compared to the hypothetical back-tested performance of the Composite Forward LIBOR Index (which represents the composite forward LIBOR rate) for the period from December 30, 2005 to September 29, 2016, and the same comparison based on historical performance information for the period from September 30, 2016 to December 18, 2017. To facilitate a comparison, the levels of the Long LIBOR Index and the Composite Forward LIBOR Index depicted below have been normalized to a level of 100 on December 30, 2005. The difference between the performance of the Long LIBOR Index and the Composite Forward LIBOR Index reflected in the graph below is attributable to the effects of carry, the long LIBOR floor, the contract spread and decay.

Past performance is not an indication of future performance. The future relationship between the performance of the Long LIBOR Index and the performance of the Composite Forward LIBOR Index may bear no relation to the hypothetical back-tested or historical relationship shown in the graph below.

Hypothetical Back-Tested and Historical Normalized Long LIBOR Index vs. Composite Forward LIBOR Index



Effects of Carry, Contract Spread and Decay

The table below quantifies the effects of carry, the contract spread and decay on the Long LIBOR Index over the course of each calendar month during the period from December 30, 2005 to December 18, 2017 based on the same hypothetical back-tested and historical performance information contained in the prior graphs above. For each month in the table below, the percentage listed indicates the extent to which the performance of the Long LIBOR Index over the course of that month was less (in the case of a negative percentage) or greater (in the case of a positive percentage) than it would have been if it tracked the targeted participation in the percentage change in the Composite Forward LIBOR Index without any carry, contract spread or decay.

It is important to understand that the table below does not indicate whether the Long LIBOR Index increased or decreased during the applicable month. In any given month, the table below may indicate a positive percentage (meaning that the Long LIBOR Index experienced positive carry, after taking into account the contract spread and decay, in that month) while the Long LIBOR Index nevertheless declined significantly over the same period.

Past performance is not an indication of future performance. The effects of carry, the contract spread and decay on the Long LIBOR Index in the future may bear no relation to the hypothetical back-tested or historical effects shown in the table below.

Hypothetical Back-Tested and Historical Monthly Effects of Carry, Contract Spread and Decay on the Long LIBOR Index

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
2006	0.09%	-0.05%	0.01%	0.03%	-0.04%	0.07%	0.15%	0.36%	0.45%	0.42%	0.58%	0.65%
2007	0.41%	0.41%	0.71%	0.54%	0.50%	-0.01%	0.07%	0.41%	0.52%	0.30%	0.73%	0.88%

2008	0.25%	-0.50%	-0.98%	-1.91%	-1.92%	-2.01%	-2.01%	-1.68%	-1.19%	-1.33%	-1.07%	-1.35%
2009	-4.36%	-2.93%	-2.38%	-3.79%	-4.33%	-7.73%	-6.97%	-6.28%	-7.13%	-7.23%	-5.64%	-11.26%
2010	-5.98%	-6.88%	-9.79%	-7.32%	-4.90%	-4.24%	-4.11%	-5.26%	-5.32%	-3.94%	-7.21%	-6.96%
2011	-7.02%	-8.17%	-9.87%	-5.99%	-6.32%	-7.19%	-4.37%	-1.95%	-2.13%	-2.14%	-1.54%	-1.49%
2012	-1.09%	-2.24%	-3.55%	-2.11%	-2.24%	-1.43%	-1.14%	-1.81%	-1.57%	-2.90%	-2.17%	-2.56%
2013	-4.20%	-2.98%	-3.67%	-2.57%	-5.10%	-5.79%	-5.82%	-7.23%	-5.55%	-5.86%	-4.47%	-8.57%
2014	-7.54%	-6.46%	-10.62%	-8.65%	-7.54%	-10.00%	-11.35%	-7.28%	-9.73%	-7.29%	-6.49%	-9.89%
2015	-5.47%	-7.73%	-6.47%	-6.34%	-6.15%	-7.17%	-6.66%	-5.21%	-4.72%	-5.96%	-5.23%	-5.01%
2016	-2.22%	-2.10%	-2.67%	-2.58%	-2.70%	-1.48%	-1.64%	-1.39%	-1.13%	-1.36%	-2.49%	-3.24%
2017	-3.12%	-2.93%	-2.80%	-1.50%	-1.67%	-1.64%	-1.51%	0.75%	-14.13%	-5.17%	-8.69%	

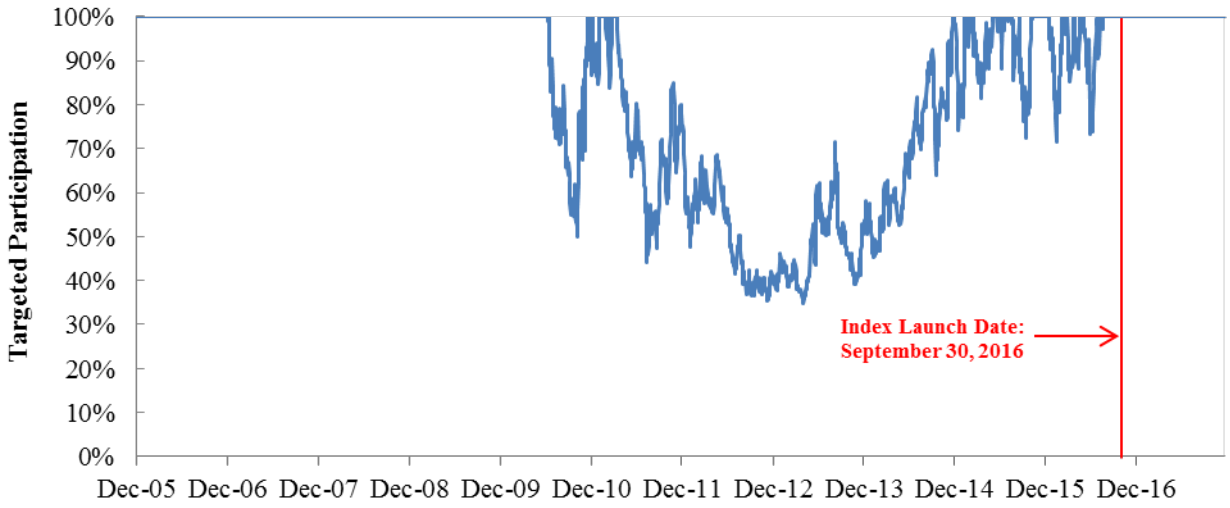
The table above shows that the effects of carry, the contract spread and decay have reduced the performance of the Long LIBOR Index by as much as ***14.13%*** over a single calendar month. The numbers in the table above represent the difference between the performance of the Long LIBOR Index over the applicable calendar month and the performance that the Long LIBOR Index would have had if it simply reflected the targeted participation in the percentage change in the composite forward LIBOR rate over that month. The numbers are not annualized. It is impossible to predict the effects of carry, the contract spread and decay on the Long LIBOR Index in the future. The effects of carry, the contract spread and decay over any calendar month in the future may equal or exceed these levels. Over longer periods of time, the effects of carry, the contract spread and decay will likely significantly exceed these levels.

Targeted Participation

The graph below depicts the effects of the long LIBOR floor on the Long LIBOR Index's targeted participation in the daily percentage change in the composite forward LIBOR rate. For each day on which the composite forward LIBOR rate was less than 1.00%, the Long LIBOR Index targeted participation of less than 100% in the daily percentage change in the composite forward LIBOR rate.

Past performance is not an indication of future performance. The Long LIBOR Index's targeted participation at any point in the future may bear no relation to the hypothetical back-tested or historical targeted participation shown in the graph below.

Hypothetical Back-Tested and Historical Targeted Participation of the Long LIBOR Index



Contract Spread

The following table quantifies the effect of the contract spread on the Long LIBOR Index over the course of each calendar month during the period from December 30, 2005 to December 18, 2017 based on the same hypothetical back-tested and historical performance information contained in the prior graphs above. For each month in the table below, the percentage listed indicates the extent to which the contract spread reduced the performance of the Long LIBOR Index over that month, expressed on an annualized basis.

Past performance is not an indication of future performance. The effect of the contract spread on the Long LIBOR Index in the future may be greater than the hypothetical back-tested or historical effects shown in the table below.

Hypothetical Back-Tested and Historical Monthly Effects of the Contract Spread on the Long LIBOR Index, Expressed on an Annualized Basis

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
2006	-0.07%	-0.07%	-0.06%	-0.05%	-0.05%	-0.05%	-0.05%	-0.06%	-0.06%	-0.06%	-0.06%	-0.06%
2007	-0.06%	-0.06%	-0.07%	-0.06%	-0.06%	-0.06%	-0.06%	-0.06%	-0.07%	-0.07%	-0.08%	-0.09%
2008	-0.11%	-0.12%	-0.14%	-0.12%	-0.10%	-0.09%	-0.10%	-0.10%	-0.10%	-0.12%	-0.15%	-0.21%
2009	-0.29%	-0.23%	-0.23%	-0.25%	-0.30%	-0.27%	-0.31%	-0.28%	-0.35%	-0.35%	-0.39%	-0.39%
2010	-0.41%	-0.40%	-0.41%	-0.38%	-0.33%	-0.37%	-1.51%	-1.92%	-1.64%	-1.51%	-2.13%	-3.18%
2011	-1.96%	-0.85%	-1.43%	-1.14%	-1.36%	-1.49%	-1.76%	-1.50%	-1.12%	-1.37%	-1.97%	-1.25%
2012	-1.39%	-1.14%	-1.38%	-0.88%	-1.00%	-1.12%	-0.86%	-1.02%	-0.88%	-0.87%	-0.79%	-0.63%
2013	-0.84%	-0.69%	-0.67%	-0.61%	-0.86%	-1.51%	-1.15%	-1.15%	-1.62%	-0.76%	-0.76%	-1.00%
2014	-1.20%	-1.00%	-1.10%	-0.97%	-0.92%	-0.96%	-1.07%	-1.02%	-1.17%	-1.96%	-1.02%	-1.85%

2015	-1.74%	-1.60%	-1.34%	-1.25%	-1.70%	-0.79%	-1.19%	-1.37%	-1.76%	-2.01%	-0.56%	-0.36%
2016	-1.16%	-1.97%	-1.60%	-1.33%	-0.97%	-1.92%	-1.58%	-0.93%	-0.30%	-0.30%	-0.28%	-0.26%
2017	-0.27%	-0.25%	-0.21%	-0.20%	-0.20%	-0.20%	-0.20%	-0.20%	-0.19%	-0.18%	-0.17%	

The table above shows that the effects of the contract spread have reduced the performance of the Long LIBOR Index by as much as ***3.18%*** (annualized) over a single calendar month. It is impossible to predict the effects of the contract spread on the Long LIBOR Index in the future. The effects of the contract spread over any calendar month in the future may equal or exceed these levels.

Hypothetical Back-Tested and Historical Performance Information for the Short LIBOR Index

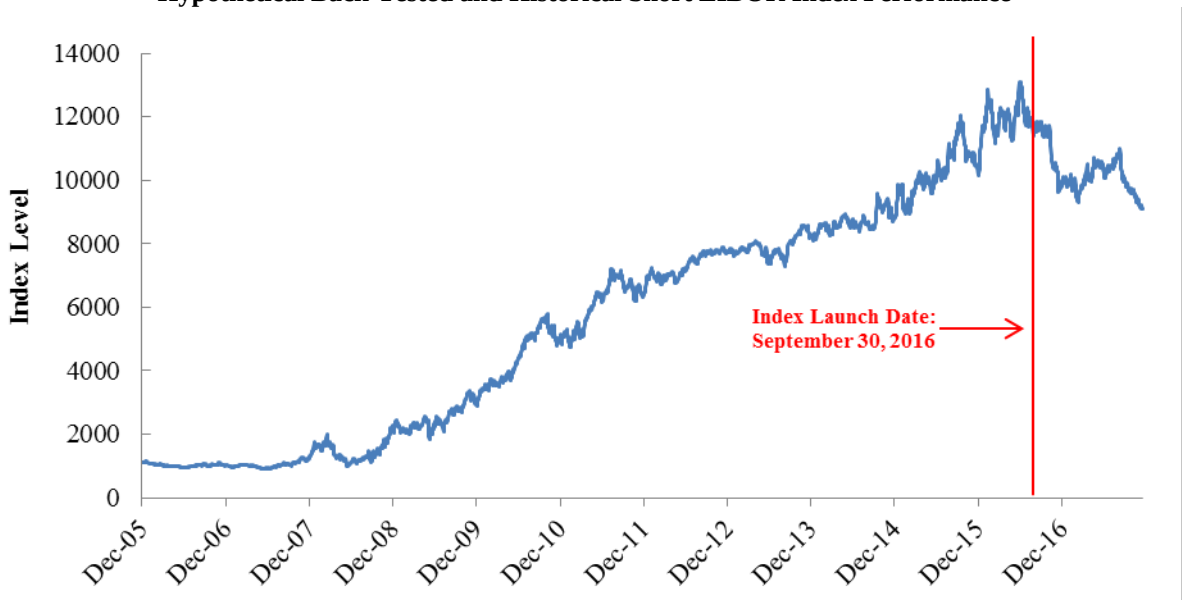
Index Performance

The graph below depicts the hypothetical back-tested performance of the Short LIBOR Index for the period from December 30, 2005 to September 29, 2016 and the historical performance of the Short LIBOR Index for the period from September 30, 2016 to December 18, 2017.

Past performance is not an indication of future performance. The future performance of the Short LIBOR Index may bear no relation to the hypothetical back-tested or historical performance shown in the graph below.

The actual level of the Short LIBOR Index as of December 18, 2017 was 9,096.56.

Hypothetical Back-Tested and Historical Short LIBOR Index Performance



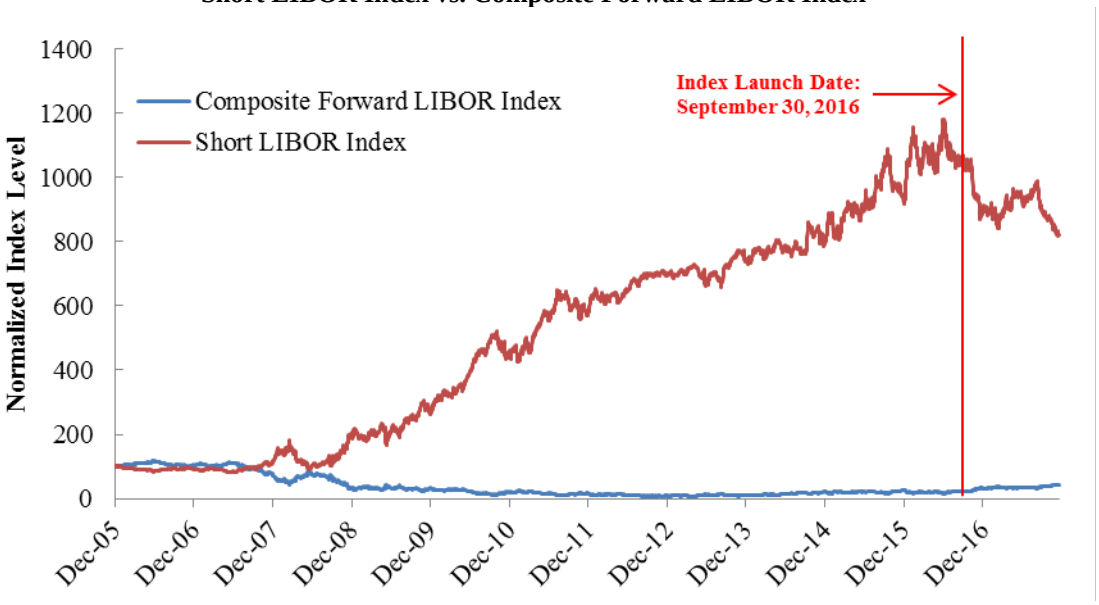
Comparison with Composite Forward LIBOR Index

The following graph depicts the hypothetical back-tested performance of the Short LIBOR Index as compared to the inverse of the hypothetical back-tested performance of the Composite Forward LIBOR Index (which represents the composite forward LIBOR rate) for the period from December 30, 2005 to September 29, 2016, and the same comparison based on historical performance information for the period from September 30, 2016 to December 18, 2017. To facilitate a comparison, the levels of the Short LIBOR Index and the Composite Forward LIBOR Index depicted below have been normalized to a level of 100 on December 30, 2005. The difference between the performance of the Short LIBOR Index and the inverse of the Composite Forward LIBOR

Index reflected in the graph below is attributable to the effects of carry, the short LIBOR floor, the contract spread and decay.

Past performance is not an indication of future performance. The future relationship between the performance of the Short LIBOR Index and the performance of the Composite Forward LIBOR Index may bear no relation to the hypothetical back-tested or historical relationship shown in the graph below.

Hypothetical Back-Tested and Historical Normalized Short LIBOR Index vs. Composite Forward LIBOR Index



Effects of Carry, Contract Spread and Decay

The table below quantifies the effects of carry, the contract spread and decay on the Short LIBOR Index over the course of each calendar month during the period from December 30, 2005 to December 18, 2017 based on the same hypothetical back-tested and historical performance information contained in the prior graphs above. For each month in the table below, the percentage listed indicates the extent to which the performance of the Short LIBOR Index over the course of that month was less (in the case of a negative percentage) or greater (in the case of a positive percentage) than it would have been if it tracked the targeted participation in the inverse of the percentage change in the Composite Forward LIBOR Index without any carry, contract spread or decay.

It is important to understand that the table below does not indicate whether the Short LIBOR Index increased or decreased during the applicable month. In any given month, the table below may indicate a positive percentage (meaning that the Short LIBOR Index experienced positive carry, after taking into account the contract spread and decay, in that month) while the Short LIBOR Index nevertheless declined significantly over the same period.

Past performance is not an indication of future performance. The effects of carry, the contract spread and decay on the Short LIBOR Index in the future may bear no relation to the hypothetical back-tested or historical effects shown in the table below.

Hypothetical Back-Tested and Historical Monthly Effects of Carry, the Contract Spread and Decay on the Short LIBOR Index

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
2006	-0.20%	0.07%	-0.10%	-0.19%	0.04%	-0.21%	-0.12%	-0.34%	-0.58%	-0.64%	-0.81%	-0.59%

2007	-0.41%	-0.33%	-0.96%	-0.68%	-0.02%	-0.15%	-0.02%	-0.77%	-0.99%	-0.79%	1.23%	-1.91%
2008	2.20%	-0.58%	-4.18%	6.04%	1.08%	-0.79%	0.70%	1.22%	-6.45%	0.10%	3.10%	6.06%
2009	-0.65%	0.09%	1.84%	1.01%	3.52%	-4.13%	2.94%	3.92%	6.00%	4.09%	12.41%	15.08%
2010	13.85%	6.12%	8.19%	5.38%	3.31%	10.91%	12.88%	1.47%	3.19%	4.43%	13.39%	-3.31%
2011	2.34%	5.25%	4.89%	10.32%	10.34%	3.64%	4.28%	-2.38%	1.58%	-1.20%	-1.71%	0.25%
2012	12.04%	0.57%	-0.08%	1.17%	1.70%	0.74%	7.75%	-1.50%	-1.47%	0.01%	-0.34%	1.23%
2013	2.00%	3.91%	2.55%	6.36%	10.76%	-0.77%	3.23%	5.39%	7.06%	6.27%	5.53%	9.34%
2014	4.65%	4.56%	9.51%	7.96%	7.53%	8.82%	12.16%	6.85%	9.14%	6.65%	6.18%	9.32%
2015	11.50%	5.83%	4.15%	5.19%	3.98%	4.74%	3.38%	1.60%	5.17%	1.27%	5.00%	4.80%
2016	13.86%	-2.83%	-1.28%	1.10%	1.88%	6.80%	2.30%	1.40%	-0.07%	1.16%	4.86%	2.83%
2017	2.33%	2.36%	2.19%	1.02%	1.41%	1.47%	1.25%	-0.86%	14.02%	5.10%	8.63%	

The table above shows that the effects of carry, the contract spread and decay have reduced the performance of the Short LIBOR Index by as much as ***6.45%*** over a single calendar month. The numbers in the table above represent the difference between the performance of the Short LIBOR Index over the applicable calendar month and the performance that the Short LIBOR Index would have had if it simply reflected the targeted participation in the inverse of the percentage change in the composite forward LIBOR rate over that month. The numbers are not annualized. It is impossible to predict the effects of carry, the contract spread and decay on the Short LIBOR Index in the future. The negative effects of carry, the contract spread and decay over any calendar month in the future may equal or exceed these levels.

Targeted Participation

The graph below depicts the effects of the short LIBOR floor on the Short LIBOR Index's targeted participation in the inverse of the daily percentage change in the composite forward LIBOR rate. For each day on which the composite forward LIBOR rate was less than 2.50%, the Short LIBOR Index targeted participation of less than 100% in the inverse of the daily percentage change in the composite forward LIBOR rate.

Past performance is not an indication of future performance. The daily targeted participation of the Short LIBOR Index at any point in the future may bear no relation to the hypothetical back-tested or historical targeted participation shown in the graph below.

Hypothetical Back-Tested and Historical Targeted Participation of the Short LIBOR Index

Contract Spread

The following table quantifies the effect of the contract spread on the Short LIBOR Index over the course of each calendar month during the period from December 30, 2005 to December 18, 2017 based on the same hypothetical back-tested and historical performance information contained in the prior graphs above. For each month in the table below, the percentage listed indicates the extent to which the contract spread reduced the performance of the Short LIBOR Index over that month, expressed on an annualized basis.

Past performance is not an indication of future performance. The effect of the contract spread on the Short LIBOR Index in the future may be greater than the hypothetical back-tested or historical effects shown in the table below.

Hypothetical Back-Tested and Historical Monthly Effects of the Contract Spread on the Short LIBOR Index, Expressed on an Annualized Basis

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
2006	-0.21%	-0.15%	-0.22%	-0.21%	-0.17%	-0.19%	-0.18%	-0.17%	-0.19%	-0.23%	-0.24%	-0.25%
2007	-0.20%	-0.23%	-0.24%	-0.21%	-0.17%	-0.19%	-0.23%	-0.36%	-0.40%	-0.35%	-0.55%	-0.68%
2008	-1.18%	-1.25%	-1.28%	-1.44%	-1.04%	-0.97%	-0.78%	-0.58%	-1.77%	-1.60%	-1.14%	-0.72%
2009	-0.74%	-0.56%	-0.61%	-0.53%	-0.46%	-1.08%	-0.64%	-0.64%	-0.49%	-0.57%	-0.37%	-0.61%
2010	-0.44%	-0.46%	-0.34%	-0.40%	-0.37%	-0.33%	-0.33%	-0.37%	-0.30%	-0.30%	-0.42%	-0.57%
2011	-0.41%	-0.41%	-0.44%	-0.42%	-0.29%	-0.30%	-0.33%	-0.28%	-0.25%	-0.29%	-0.37%	-0.26%
2012	-0.27%	-0.25%	-0.28%	-0.21%	-0.23%	-0.24%	-0.20%	-0.23%	-0.21%	-0.21%	-0.20%	-0.18%
2013	-0.21%	-0.18%	-0.18%	-0.16%	-0.20%	-0.30%	-0.25%	-0.25%	-0.30%	-0.19%	-0.20%	-0.23%
2014	-0.26%	-0.23%	-0.25%	-0.22%	-0.22%	-0.22%	-0.25%	-0.23%	-0.25%	-0.35%	-0.24%	-0.37%

2015	-0.33%	-0.40%	-0.37%	-0.27%	-0.34%	-0.34%	-0.39%	-0.42%	-0.33%	-0.38%	-0.27%	-0.30%
2016	-0.35%	-0.38%	-0.41%	-0.30%	-0.30%	-0.40%	-0.34%	-0.32%	-0.28%	-0.24%	-0.32%	-0.30%
2017	-0.33%	-0.33%	-0.27%	-0.32%	-0.27%	-0.25%	-0.24%	-0.27%	-0.32%	-0.24%	-0.25%	

The table above shows that the effects of the contract spread have reduced the performance of the Short LIBOR Index by as much as ***1.77%*** (annualized) over a single calendar month. It is impossible to predict the effects of the contract spread on the Short LIBOR Index in the future. The effects of the contract spread over any calendar month in the future may equal or exceed these levels.

SPECIFIC TERMS OF THE ETNs

You should read this pricing supplement together with the accompanying prospectus supplement and prospectus before making your decision to invest in the ETNs. The description in this pricing supplement of the particular terms of the ETNs supplements, and to the extent inconsistent therewith replaces, the descriptions of the general terms and provisions of the debt securities set forth in the accompanying prospectus supplement and prospectus.

You may access the prospectus supplement and prospectus on the SEC Web site at www.sec.gov as follows (or if such address has changed, by reviewing our filings for April 7, 2017 on the SEC Web site):

- *Prospectus Supplement and Prospectus each dated April 7, 2017: https://www.sec.gov/Archives/edgar/data/831001/000119312517116348/d370918d424b2.htm*

General

Each series of ETNs is part of a series of unsecured senior debt securities issued by Citigroup Global Markets Holdings Inc. and designated as its Medium-Term Senior Notes, Series N. We refer to each series of ETNs as a separate "series" to distinguish the Long LIBOR ETNs from the Short LIBOR ETNs, but all of the ETNs are part of Citigroup Global Markets Holdings Inc.'s Medium-Term Senior Notes, Series N. Any payments due on the ETNs are fully and unconditionally guaranteed by Citigroup Inc. Each series of ETNs will constitute part of the senior debt of Citigroup Global Markets Holdings Inc. and will rank equally with all other unsecured and unsubordinated debt of Citigroup Global Markets Holdings Inc. The guarantee of payments due on each series of ETNs will constitute part of the senior debt of Citigroup Inc. and will rank equally with all other unsecured and unsubordinated debt of Citigroup Inc.

Unlike ordinary debt securities, the ETNs do not offer interest payments and do not guarantee any return of principal at maturity or upon earlier redemption or acceleration. Instead, each series of ETNs is designed for investors who seek exposure to the performance of the applicable Index on a daily basis *plus* the Daily Accrual and *minus* the Daily Investor Fee, as described below. At maturity or upon early redemption or acceleration, holders of each ETN will receive an amount in cash that will vary depending on the level of the applicable Index as described below, which can be significantly less than the stated principal amount of the applicable ETNs and could be zero.

You will not have the right to receive physical certificates evidencing your ownership except under limited circumstances. Instead, we will issue each series of ETNs in the form of a global certificate, which will be held by or on behalf of The Depository Trust Company ("**DTC**") or its nominee. Direct and indirect participants in DTC will record beneficial ownership of the ETNs by individual investors. Accountholders in the Euroclear or Clearstream Banking clearance systems may hold beneficial interests in the ETNs through the accounts those systems maintain with DTC. You should refer to the section "Description of Debt Securities—Book-Entry Procedures and Settlement" in the accompanying prospectus.

Reference is made to the accompanying prospectus supplement and prospectus for a detailed summary of additional provisions of the ETNs and of the senior debt indenture under which the ETNs will be issued.

The "**Inception Date**" for each series of ETNs was August 15, 2017.

Coupon

We will not make any coupon or interest payment on the ETNs during the term of the ETNs.

Denomination

The denomination and stated principal amount per ETN is $25.00.

Closing Indicative Value

Any payment on the ETNs, whether upon early redemption, acceleration or at maturity, will be based on the Closing Indicative Value of the applicable series of ETNs on one or more Valuation Dates. The Closing

Indicative Value, in turn, will depend on the performance of the applicable Index, *plus* the Daily Accrual and *minus* the Daily Investor Fee.

The "**Closing Indicative Value**" for any series of ETNs on any given calendar day will be calculated in the following manner: The Closing Indicative Value on the Inception Date was $25.00. The Closing Indicative Value on each calendar day following the Inception Date for each series of ETNs will equal:

- For each calendar day prior to the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, (1)(a) the Closing Indicative Value for such series of ETNs on the immediately preceding calendar day *times* (b) the Daily ETN Performance for such series of ETNs on such calendar day *minus* (2) the Daily Investor Fee for such series of ETNs on such calendar day.

- For each calendar day during the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, the sum of (1) the Index Exposure and (2) the Notional Cash Amount on such calendar day.

The Closing Indicative Value will never be less than zero. If any series of ETNs undergoes a split or reverse split, the Closing Indicative Value for such series of ETNs will be adjusted accordingly (see "—Split or Reverse Split of the ETNs" below). Janus Index & Calculation Services LLC ("**JICS**") or its agent is responsible for computing and disseminating the Closing Indicative Value, subject to CGMI's right to dispute JICS' calculation of the Closing Indicative Value, in which case, if the ETN Calculation Agents are unable to agree, CGMI's determination of the Closing Indicative Value shall be conclusive and binding. In addition, CGMI has the sole right to determine the Closing Indicative Value in connection with an Automatic Acceleration. The Closing Indicative Value for each series of ETNs will be calculated and published each Index Business Day under the following tickers:

ETNs	**Indicative Value Ticker**
Long LIBOR ETNs	ULBRIV
Short LIBOR ETNs	DLBRIV

The Closing Indicative Value of each series of ETNs on each Index Business Day is based on the closing level of the applicable Index on that Index Business Day. The closing level of the applicable Index on each Index Business Day is determined based on the daily settlement prices of Eurodollar futures contracts, which are determined as of 3:00 p.m., New York City time, on each Index Business Day. Although the daily settlement prices are determined as of 3:00 p.m., there is typically a time lag in the publication of the daily settlement prices, and the closing level of each Index based on the daily settlement prices is typically not published until after the close of trading for the ETNs on the NYSE Arca. Accordingly, the Closing Indicative Value of each series of ETNs will also not be published until after the close of trading for the ETNs on the NYSE Arca, but will be based on the daily settlement prices of the applicable Eurodollar futures contracts as of 3:00 p.m.

The "**Daily ETN Performance**" for any series of ETNs on any Index Business Day will equal (1) one *plus* (2) the Daily Accrual for such series of ETNs on such Index Business Day *plus* (3) the Daily Index Performance for such series of ETNs on such Index Business Day. The Daily ETN Performance for any series of ETNs is deemed to equal one on any day that is not an Index Business Day.

An "**Index Business Day**" is a weekday on which the New York Stock Exchange and Chicago Mercantile Exchange are both open for trading for their regular trading sessions.

The "**Daily Accrual**" represents the rate of interest that could be earned on a notional capital reinvestment at the three month U.S. Treasury rate as reported on Bloomberg under ticker USB3MTA (or any successor ticker on Bloomberg or any successor service). The Daily Accrual for any series of ETNs on any Index Business Day will equal:

$$\left(\frac{1}{1 - Tbills_{t-1} * \frac{91}{360}}\right)^{\frac{d}{91}} - 1$$

where $Tbills_{t-1}$ is the three month U.S. Treasury rate reported on Bloomberg on the prior Index Business Day and *d* is the number of calendar days from and including the immediately prior Index Business Day to but excluding the date of determination. The Daily Accrual for any series of ETNs is deemed to equal zero on any day that is not an Index Business Day.

The "**Daily Index Performance**" for any series of ETNs on any Index Business Day will equal (1)(a) the closing level of the applicable Index on such Index Business Day *divided by* (b) the closing level of the applicable Index on the immediately preceding Index Business Day *minus* (2) one, subject to the provisions set forth below under "—Payment at Maturity", "—Acceleration at Our Option", "—Automatic Acceleration" and "—Market Disruption Events". The Daily Index Performance for any series of ETNs is deemed to equal zero on any day that is not an Index Business Day.

"**Valuation Period**" means the Final Valuation Period, an Optional Acceleration Valuation Period or an Automatic Acceleration Valuation Period, as applicable.

"**Valuation Date**" means each Index Business Day in the Final Valuation Period or any Optional Acceleration Valuation Period and any Early Redemption Valuation Date.

On any Index Business Day, the "**Daily Investor Fee**" for any series of ETNs will equal the product of (1) the Closing Indicative Value for such series of ETNs on the immediately preceding Index Business Day *times* (2)(a) the Investor Fee Factor for such series of ETNs *times* (b) 1/365 *times* (c) *d*, where *d* is the number of calendar days from and including the immediately prior Index Business Day to but excluding the date of determination. The Daily Investor Fee for any series of ETNs is deemed to equal zero on any day that is not an Index Business Day.

The "**Investor Fee Factor**" for each series of ETNs is as follows:

Long LIBOR ETNs: 1.50%

Short LIBOR ETNs: 1.50%

The Daily Investor Fee reduces the daily return of each series of ETNs. Over the time you hold the ETNs, if the level of the applicable Index decreases or does not increase sufficiently, in addition to the Daily Accrual, to offset the effect of the Daily Investor Fee (and, if applicable, the Early Redemption Charge and the creation fee), you will receive less than the amount you paid for them upon sale, at maturity or upon early redemption or acceleration.

The "**closing level**" of the applicable Index on any Index Business Day will be the official closing level reported by the Index Calculation Agent on the Bloomberg page as set forth in the table below or any successor page on Bloomberg or any successor service, as applicable, as determined by the ETN Calculation Agents.

Index	**Bloomberg Page Ticker**
Long LIBOR Index	ULBRID
Short LIBOR Index	DLBRID

"**Index Exposure**" means, for each Valuation Date during the Final Valuation Period or any Optional Acceleration Valuation Period, as applicable, the product of (i) (a) the Index Exposure on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, the Closing Indicative Value on the immediately preceding Index Business Day) *multiplied by* the Daily ETN Performance on the current Valuation Date *minus* (b) the Daily Investor Fee on the current Valuation Date and (ii) a fraction equal to (a) the number of scheduled Valuation Dates left in the applicable Valuation Period, excluding the current Valuation Date, *divided by*

(b) the number of scheduled Valuation Dates left in the applicable Valuation Period, including the current Valuation Date. The Index Exposure on any day that is not a Valuation Date will be deemed to be the same as on the immediately preceding Valuation Date.

"**Notional Cash Amount**" means, for each Valuation Date during the Final Valuation Period or any Optional Acceleration Valuation Period, as applicable, the sum of (i) the Notional Cash Amount on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, $0.00) and (ii) (a) (1) the Index Exposure on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, the Closing Indicative Value on the immediately preceding Valuation Date) *multiplied by* the Daily ETN Performance on the current Valuation Date *minus* (2) the Daily Investor Fee on the current Valuation Date *multiplied by* (b) 1 *divided by* the number of scheduled Valuation Dates left in the applicable Valuation Period, including the current Valuation Date. The Notional Cash Amount on any day that is not a Valuation Date will be deemed to be the same as on the immediately preceding Valuation Date.

During the Final Valuation Period or any Optional Acceleration Valuation Period, the Closing Indicative Value is calculated in a manner that results in a proportional reduction of exposure to the applicable Index on each Valuation Date in that Valuation Period. In other words, on each Valuation Date over the course of the applicable Valuation Period, a portion of each ETN's value will be converted into notional cash exposure (and thereby crystallized) based on the level of the applicable Index on that day, and on each subsequent Valuation Date a progressively smaller portion of the ETNs' value will be exposed to changes in the applicable Index on that day and a progressively greater amount will be converted into notional cash exposure, until at the end of the Valuation Period the full amount of the ETNs' exposure has been converted into notional cash exposure. The cumulative amount of that notional cash exposure is the Closing Indicative Value on the last Valuation Date of the applicable Valuation Period. On each Valuation Date after the first Valuation Date of the Final Valuation Period or an Optional Acceleration Valuation Period, the Daily Index Performance (and, in turn, the Daily ETN Performance and the Closing Indicative Value) will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Valuation Period begins.

Any payment you will be entitled to receive is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

Payment at Maturity

The maturity date of each series of ETNs is August 16, 2032 (the "**Maturity Date**"). Persons who hold the ETNs of any series on the Maturity Date will receive a payment on that date equal to the Closing Indicative Value of such series of ETNs on the final Valuation Date of the Final Valuation Period, as calculated by the ETN Calculation Agents. On each Valuation Date after the first Valuation Date of the Final Valuation Period, the Daily Index Performance will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Final Valuation Period begins (and the Intraday Index Performance will be calculated in a similar manner). We refer to the amount of such payment as the "**Maturity Redemption Amount**." The ETNs are intended to be short-term trading tools and are not intended to be held to maturity.

The "**Final Valuation Period**" shall be the period of five consecutive Index Business Days commencing on August 3, 2032, each such day subject to postponement as described in the next paragraph.

If the scheduled Maturity Date is not a Business Day, the Maturity Date will be postponed to the first Business Day following the scheduled Maturity Date. If any scheduled Valuation Date in the Final Valuation Period for any series of ETNs is not an Index Business Day, such Valuation Date and each subsequent Valuation Date in the Final Valuation Period for such series of ETNs will be postponed to the next following Index Business Day, in which case the Maturity Date will be postponed to the third Business Day following the last Valuation Date in the Final Valuation Period as so postponed. In addition, if a Market Disruption Event with respect to any series of ETNs occurs or is continuing on any Valuation Date during the Final Valuation Period for such series of ETNs, such Valuation Date and each subsequent Valuation Date in the Final Valuation Period for such ETNs will be postponed

(up to five Index Business Days, as described under "—Market Disruption Events" below) and the Maturity Date for such series of ETNs will be postponed until the date three Business Days following the last Valuation Date of the Final Valuation Period for such series of ETNs, as postponed. No interest or additional payment will accrue or be payable as a result of any postponement of the Maturity Date. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

Payment Upon Early Redemption

Prior to maturity or earlier acceleration, you may, subject to certain restrictions described below, offer at least the applicable Minimum Redemption Amount or more of the ETNs to us for redemption on an Early Redemption Date during the term of the ETNs. If you elect to offer the ETNs for redemption, and the requirements for acceptance by us are met, you will receive a cash payment per ETN on the Early Redemption Date equal to the Early Redemption Amount. Any payment on the ETNs is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

You may exercise your early redemption right by causing your broker or other person with whom you hold the ETNs to deliver a Redemption Notice to the Redemption Agent. If your Redemption Notice is delivered prior to 4:00 p.m., New York City time, on any Business Day, the immediately following Index Business Day will be the applicable "**Early Redemption Valuation Date**". Otherwise, the second following Index Business Day will be the applicable Early Redemption Valuation Date. For an exercise of the early redemption right to be effective, the applicable Early Redemption Valuation Date must be on or before the first day of any Valuation Period. In addition, if a Trigger Event occurs or an Automatic Acceleration Valuation Period is continuing on any date that would otherwise be an Early Redemption Valuation Date, you will not be entitled to receive the Early Redemption Amount and instead will receive the Automatic Acceleration Redemption Amount. See "—Redemption Procedures."

You must offer for redemption at least 50,000 ETNs of any one series, or an integral multiple of 50,000 ETNs of such series in excess thereof, at one time in order to exercise your right to cause us to redeem the ETNs on any Early Redemption Date (the "**Minimum Redemption Amount**"), except that we or CGMI as one of the ETN Calculation Agents may from time to time reduce, in part or in whole, the Minimum Redemption Amount. Any such reduction will be applied on a consistent basis for all holders of the relevant series of ETNs at the time the reduction becomes effective. If the ETNs undergo a split or reverse split, the minimum number of ETNs needed to exercise your right to redeem will remain the same.

The "**Early Redemption Date**" is the third Business Day following an Early Redemption Valuation Date. An Early Redemption Date will be postponed if a Market Disruption Event occurs or is continuing on the applicable Early Redemption Valuation Date. No interest or additional payment will accrue or be payable as a result of any postponement of any Early Redemption Date. See "—Market Disruption Events" below.

The "**Early Redemption Charge**" for any series of ETNs is equal to 0.20% *times* the Closing Indicative Value for such series of ETNs on the Early Redemption Valuation Date.

The "**Early Redemption Amount**" is a cash payment per ETN equal to the greater of (A) zero and (B)(1) the Closing Indicative Value for such series of ETNs on the Early Redemption Valuation Date *minus* (2) the Early Redemption Charge and will be calculated by the ETN Calculation Agents.

Redemption Procedures

If you wish to offer the ETNs to us for redemption, your broker must follow the following procedures:

- Deliver a notice of redemption, in substantially the form of Annex A (the "**Redemption Notice**"), to Janus Henderson Distributors ("**JHD**") (the "**Redemption Agent**") via email or other electronic delivery as requested by the Redemption Agent. If your Redemption Notice is delivered prior to 4:00 p.m., New York City time, on any Business Day, the immediately following Index Business Day will be the applicable "**Early Redemption Valuation Date**". Otherwise, the second following Index Business Day will be the applicable Early Redemption Valuation Date. If the Redemption Agent receives your Redemption Notice no later than 4:00 p.m., New York City time, on any Business Day, the Redemption Agent will respond by sending your broker an

acknowledgment of the Redemption Notice accepting your redemption request by 7:30 p.m., New York City time, on the Business Day prior to the applicable Early Redemption Valuation Date. The Redemption Agent or its affiliate must acknowledge to your broker acceptance of the Redemption Notice (the "**Confirmation**") in order for your redemption request to be effective;

- Cause your DTC custodian to book a delivery vs. payment trade with respect to the ETNs on the applicable Early Redemption Valuation Date, facing Citigroup Global Markets Inc., DTC #0418, or such other DTC account as specified in the Confirmation; and

- Cause your DTC custodian to deliver the trade as booked for settlement via DTC at or prior to 10:00 a.m. New York City time, on the applicable Early Redemption Date (the third Business Day following the Early Redemption Valuation Date).

You are responsible for (i) instructing or otherwise causing your broker to provide the Redemption Notice and (ii) your broker satisfying the additional requirements as set forth in the second and third bullets above in order for the redemption to be effected. Different brokerage firms may have different deadlines for accepting instructions from their customers. Accordingly, you should consult the brokerage firm through which you own your interest in the ETNs in respect of such deadlines. If the Redemption Agent does not (i) receive the Redemption Notice from your broker by 4:00 p.m. and (ii) deliver an acknowledgment of such Redemption Notice to your broker accepting your redemption request by 7:30 p.m., on the Business Day prior to the applicable Early Redemption Valuation Date, such notice will not be effective for such Business Day and the Redemption Agent will treat such Redemption Notice as if it was received on the next Business Day. Any redemption instructions for which the Redemption Agent receives a valid Redemption Notice in accordance with the procedures described above will be irrevocable.

If the Redemption Agent ceases to perform its role described in this pricing supplement, we will either, at our sole discretion, perform such role or appoint another party to do so.

When you submit your ETNs for redemption in accordance with the redemption procedures described above, CGMI may repurchase the ETNs from you at the Early Redemption Amount instead of our redeeming the ETNs, and if CGMI does not repurchase the ETNs, then we will redeem them. Any ETNs repurchased by CGMI may remain outstanding (and be resold by CGMI) or may be submitted to us for cancellation.

Because the Early Redemption Amount you will receive for each ETN will not be calculated until the Index Business Day (or the second following Index Business Day) immediately following the Business Day you offer your ETNs for redemption, you will not know the applicable Early Redemption Amount at the time you exercise your early redemption right and will bear the risk that your ETNs will decline in value between the time of your exercise and the time at which the Early Redemption Amount is determined.

Acceleration at Our Option

We will have the right to accelerate the ETNs of any series in whole but not in part on any Business Day occurring on or after the Inception Date (an "**Optional Acceleration**"). Upon an Optional Acceleration, the holders of such ETNs will receive a cash payment per ETN in an amount (the "**Optional Acceleration Redemption Amount**") equal to the Closing Indicative Value of such series of ETNs on the final Valuation Date of the Optional Acceleration Valuation Period. On each Valuation Date after the first Valuation Date of the Optional Acceleration Valuation Period, the Daily Index Performance will be calculated using an alternative closing level of the applicable Index calculated by the ETN Calculation Agents that does not give effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology after the Optional Acceleration Valuation Period begins (and the Intraday Index Performance will be calculated in a similar manner).

In the case of an Optional Acceleration of the ETNs of any series, the "**Optional Acceleration Valuation Period**" shall be a period of five consecutive Index Business Days specified in our notice of Optional Acceleration, the first Index Business Day of which shall be at least two Business Days after the date on which we give you notice of such Optional Acceleration. The Optional Acceleration Redemption Amount will be payable on the third Business Day following the last such Index Business Day in the Optional Acceleration Valuation Period (such third Business Day the "**Optional Acceleration Date**"). The Optional Acceleration Date will be postponed if the last

scheduled Valuation Date in the Optional Acceleration Valuation Period is postponed. No interest or additional payment will accrue or be payable as a result of any postponement of the Optional Acceleration Date. See "—Market Disruption Events" below. We will give you notice of any Optional Acceleration of the ETNs through customary channels used to deliver notices to holders of exchange traded notes.

Any payment you will be entitled to receive is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

Any ETNs accelerated in an Optional Acceleration will be cancelled on the Optional Acceleration Date. Consequently, as of such Optional Acceleration Date, the ETNs will no longer be considered outstanding.

Automatic Acceleration

If the Intraday Indicative Value of any series of ETNs at any time on any scheduled Index Business Day is less than 50% of the Closing Indicative Value of such series of ETNs on the immediately preceding Index Business Day (meaning that the Intraday Indicative Value has declined by more than 50% from the prior Index Business Day's Closing Indicative Value) (such event, a "**Trigger Event**"), such series of ETNs will be automatically accelerated (an "**Automatic Acceleration**") and the holders of such ETNs will receive a cash payment per ETN on the Automatic Acceleration Date equal to the Automatic Acceleration Redemption Amount. We refer to the date on which the relevant Trigger Event occurs as the "**Trigger Date**" and to the scheduled Index Business Day immediately following the Trigger Date as the "**Automatic Acceleration Valuation Date**".

In the event of Automatic Acceleration of any series of ETNs, the "**Automatic Acceleration Redemption Amount**" of such series of ETNs will be a value equal to the Closing Indicative Value of such series of ETNs on the Automatic Acceleration Valuation Date, calculated as though the closing level of the applicable Index on both the Trigger Date and the Automatic Acceleration Valuation Date were equal to the Automatic Acceleration Index Level of the applicable Index.

The "**Automatic Acceleration Index Level**" of the applicable Index will be an alternative closing level of the applicable Index calculated by the ETN Calculation Agents and will be the closing level that would be calculated on the Trigger Date if the official daily settlement price on the Trigger Date of each Eurodollar futures contract included in the applicable Index on the Trigger Date were equal to the volume-weighted average trading price of such contract during the Automatic Acceleration Valuation Period, subject to "—Market Disruption Events" below.

If a Trigger Event occurs on any scheduled Index Business Day, the "**Automatic Acceleration Valuation Period**" is the period commencing immediately upon the occurrence of the Trigger Event and continuing during Eurodollar Trading Hours until the end of Eurodollar Trading Hours on the Automatic Acceleration Valuation Date.

"**Eurodollar Trading Hours**" are the period from the open of trading on the NYSE Arca (which is currently 9:30 a.m., New York City time) until the time as of which CME Group is scheduled to determine the daily settlement price of Eurodollar futures contracts on each scheduled Index Business Day (which is currently 3:00 p.m., New York City time).

The Automatic Acceleration Redemption Amount will be payable on the third Business Day following the Automatic Acceleration Valuation Date (such third Business Day, the "**Automatic Acceleration Date**").

If a Trigger Event occurs, the holders of the applicable series of ETNs will receive the Automatic Acceleration Redemption Amount as described in this section and not any other amount. For example, if a Trigger Event occurs or an Automatic Acceleration Valuation Period is continuing on any date that would otherwise be an Early Redemption Valuation Date, the applicable holder will not be entitled to receive the Early Redemption Amount and instead will receive the Automatic Acceleration Redemption Amount. In addition, if an Automatic Acceleration occurs following the delivery of a notice of Optional Acceleration or during a Valuation Period, holders will not be entitled to receive the Optional Acceleration Redemption Amount or the Maturity Redemption Amount and instead will receive the Automatic Acceleration Redemption Amount.

We will not give you notice of any Automatic Acceleration of the ETNs.

Any payment you will be entitled to receive is subject to the credit risk of Citigroup Global Markets Holdings Inc. and Citigroup Inc.

Any ETNs accelerated in an Automatic Acceleration will be cancelled on the Automatic Acceleration Date. Consequently, as of such Automatic Acceleration Date, the ETNs will no longer be considered outstanding.

Market Disruption Events

A "**Market Disruption Event**" means, with respect to any series of ETNs, any event that, in the determination of the ETN Calculation Agents, could materially interfere with our affiliates', third parties with whom we transact or similarly situated third parties' ability to establish, maintain or unwind all or a material portion of a hedge that could be effected with respect to such series of ETNs, including, but not limited to, the following (to the extent determined material by the ETN Calculation Agents):

- a termination or suspension of, or a material limitation or disruption in trading in, any Eurodollar futures contract included in the applicable Index (an "**index contract**");
- the published trading price or settlement price for any index contract being at or about any then effective limit price established by the exchange on which such index contract is traded;
- failure by the applicable exchange or other price source to publish the trading price of any index contract during normal trading hours in accordance with normal practice or to announce or publish the settlement price for any index contract in accordance with normal practice; or
- failure of the Index Sponsor to publish the level of the applicable Index, subject to certain adjustments described below under "—Discontinuation or Modification of an Index; Substitution of an Index".

Because we expect that a significant portion of this hedging activity will be carried out at or around 3:00 p.m., New York City time, we expect that events that do not occur or continue at or around that time will likely not be determined to be Market Disruption Events, except in connection with an Automatic Acceleration, in which case we expect this hedging activity to occur during the Automatic Acceleration Valuation Period.

With respect to each series of ETNs, if a Market Disruption Event occurs or is continuing on any Index Business Day or occurred or was continuing on the prior Index Business Day, the ETN Calculation Agents will calculate an appropriate alternative closing level of the applicable Index for each such Index Business Day (and will use such alternative closing level for purposes of the applicable ETNs, including for purposes of determining the Daily Index Performance) taking into account the nature and duration of such Market Disruption Event. The ETN Calculation Agents will calculate such alternative closing level without giving effect to any change to the weights of or the applicable Index's hypothetical exposure to the underlying Eurodollar futures contracts that may take place under the Index Methodology during the continuance of the Market Disruption Event. In addition, (x) if a Market Disruption Event occurred or was continuing on the Index Business Day immediately preceding the date of determination, the ETN Calculation Agents will determine the Intraday Index Performance on such date of determination using such alternative closing level and (y) if a Market Disruption Event occurs or is continuing on the date of determination, the ETN Calculation Agents will determine the Intraday Index Performance during the Market Disruption Event on such date of determination using an appropriate intraday level of the applicable Index taking into account the nature and duration of such Market Disruption Event.

If a Market Disruption Event occurs or is continuing on any Valuation Date, that Valuation Date will be postponed until the first Index Business Day on which no Market Disruption Event occurs or is continuing, unless a Market Disruption Event occurs or is continuing for each of the five Index Business Days following the applicable scheduled Valuation Date. In that case, the fifth Index Business Day following the applicable scheduled Valuation Date shall be deemed to be the applicable Valuation Date, notwithstanding the fact that a Market Disruption Event occurred or was continuing on such Index Business Day, and the ETN Calculation Agents will determine the applicable Closing Indicative Value using an appropriate alternative closing level of the applicable Index on that deemed Valuation Date taking into account the nature and duration of such Market Disruption Event. If any Valuation Date in any Valuation Period is postponed as described above, each subsequent Valuation Date in such

Valuation Period will be postponed by the same number of Index Business Days. In addition, if a Valuation Date corresponding to an Early Redemption Date or the last scheduled Valuation Date in any Valuation Period is postponed, the corresponding Early Redemption Date, the Optional Acceleration Date or the Maturity Date, as the case may be, will be postponed until the date three Business Days following such Valuation Date, as postponed.

For the avoidance of doubt, the days occurring during an Automatic Acceleration Valuation Period are not considered Valuation Dates and are not subject to postponement in the event of a Market Disruption Event.

Intraday Indicative Value

The "**Intraday Indicative Value**" for each series of the ETNs will be calculated every 15 seconds on each Index Business Day during NYSE Arca trading hours and will be disseminated over the Consolidated Tape, or other major market data vendor, and will equal:

- For each Index Business Day prior to the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, (1)(a) the Closing Indicative Value for such series of ETNs on the immediately preceding calendar day *times* (b) the Intraday ETN Performance at such time on such Index Business Day *minus* (2) the Daily Investor Fee for such series of ETNs on such Index Business Day.

- For each Index Business Day during the Final Valuation Period or any Optional Acceleration Valuation Period for such series of ETNs, (1) the sum of (a) the Intraday Index Exposure and (b) the Intraday Notional Cash Amount *minus* (2) the Daily Investor Fee for such series of ETNs on such Index Business Day.

At any time at which a Market Disruption Event with respect to any series of ETNs has occurred and is continuing, there shall be no Intraday Indicative Value for such series of ETNs, except for purposes of determining whether a Trigger Event has occurred. For purposes of determining whether a Trigger Event has occurred, the Intraday Indicative Value will be calculated on each scheduled Index Business Day as if such day were an Index Business Day.

As discussed above under "—Closing Indicative Value", the daily settlement prices of Eurodollar futures contracts are determined as of 3:00 p.m., New York City time, on each Index Business Day. However, because of a time lag in the publication of the daily settlement prices, the closing level of each Index, which is based on the daily settlement prices, is typically not published until after the close of trading on the NYSE Arca. Between 3:00 p.m. and the close of trading on the NYSE Arca, the Index Calculation Agent suspends real-time updates to the calculation of the intraday level of each Index, because an accurate intraday level during this time period would require a reset of hypothetical Eurodollar futures contract exposure based on the closing level on that day, which will not yet be available. Throughout this full time period, the Intraday Indicative Value of each series of ETNs will continue to be calculated and disseminated based on the most recently published intraday level of the applicable Index. However, because real-time updates to the calculation of the intraday Index level will be suspended as of 3:00 p.m., the Intraday Indicative Value will not change, and therefore will not reflect trading in Eurodollar futures contracts that takes place, during this time period. **For this reason, between 3:00 p.m. and the close of trading on the NYSE Arca, the Intraday Indicative Value is likely to differ from the value of the ETNs that would be determined if complete and fully up-to-date information were available and used in the calculation. As a result, we expect there to be uncertainty about the intrinsic value of the ETNs during this time period, and the trading price of the ETNs is likely to diverge from the Intraday Indicative Value during this time period. Investors should exercise caution in connection with any trading in this time period, particularly if there is a significant move in Eurodollar futures prices during this time period.**

Although the daily settlement price of Eurodollar futures contracts (and, in turn, the closing level of each Index) is determined as of 3:00 p.m. on each Index Business Day, this value may differ from the most recent published trading price of Eurodollar futures contracts (and, in turn, each intraday Index level) at 3:00 p.m. because the daily settlement price is determined according to the procedure described in "Information About Eurodollar Futures Contracts" in this pricing supplement, which is not based simply on the last reported trade at 3:00 p.m. Accordingly, the Closing Indicative Value that is published after the close of trading on the NYSE Arca based on

the closing level of the applicable Index may differ from the Intraday Indicative Value published based on the intraday level of the applicable Index at 3:00 p.m.

The "**Intraday ETN Performance**" for any series of ETNs at any time on any Index Business Day will equal (1) one *plus* (2) the Daily Accrual for such series of ETNs on such Index Business Day *plus* (3) the Intraday Index Performance for such series of ETNs at such time on such Index Business Day.

The "**Intraday Index Performance**" for any series of ETNs at any time on any Index Business Day will equal (1)(a) the most recent published intraday level of the applicable Index at such time on such Index Business Day *divided by* (b) the closing level of the applicable Index on the immediately preceding Index Business Day *minus* (2) one, subject to the provisions set forth above under "—Payment at Maturity", "—Acceleration at Our Option" , "—Automatic Acceleration" and "—Market Disruption Events".

"**Intraday Index Exposure**" means, at any time on any Valuation Date during the Final Valuation Period or any Optional Acceleration Valuation Period, as applicable, the product of the Index Exposure on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, the Closing Indicative Value on the immediately preceding Index Business Day) *multiplied by* the Intraday ETN Performance at such time on the current Valuation Date.

"**Intraday Notional Cash Amount**" means, at any time on any Valuation Date during the Final Valuation Period or any Optional Acceleration Valuation Period, as applicable (or any day during an Automatic Acceleration Valuation Period), the Notional Cash Amount on the immediately preceding Valuation Date (or, in the case of the first day of such Valuation Period, $0.00).

The Intraday Indicative Value calculation is not intended as a price or quotation, or as an offer or solicitation for the purchase, sale, redemption, acceleration or termination of the ETNs, nor will it reflect hedging or transaction costs, credit considerations, market liquidity or bid-offer spreads. Published levels of the applicable Index from the Index Calculation Agent may occasionally be subject to delay or postponement. Any such delays or postponements will affect the current level of the applicable Index for such series of ETNs and therefore the Intraday Indicative Value for such series of ETNs. The actual trading price of the ETNs of any series may be different from their Intraday Indicative Value. JICS or its agent is responsible for computing and disseminating the Intraday Indicative Value, except that CGMI has the sole right to determine the Intraday Indicative Value in connection with an Automatic Acceleration.

The actual trading prices of the ETNs at any time may vary significantly from their Intraday Indicative Values at such time. The trading price of the ETNs at any time is the price at which you may be able to sell your ETNs in the secondary market at such time, if one exists.

Split or Reverse Split of the ETNs

The ETN Calculation Agents may initiate a split or reverse split of the ETNs at any time. If the ETN Calculation Agents decide to initiate a split or reverse split, the ETN Calculation Agents will issue a notice to holders of the ETNs and a press release announcing the split or reverse split, specifying the effective date of the split or reverse split. The ETN Calculation Agents will determine the ratio of such split or reverse split, as the case may be, using relevant market indicia, and will adjust the terms of the ETNs accordingly. Any adjustment of the Closing Indicative Value will be rounded to 8 decimal places.

In the case of a reverse split, we reserve the right to address odd numbers of ETNs (commonly referred to as "partials") in a manner determined by the ETN Calculation Agents in their sole discretion. For example, if the ETNs undergo a 1-for-4 reverse split, holders who own a number of ETNs on the record date that is not evenly divisible by 4 will receive the same treatment as all other holders for the maximum number of ETNs they hold that is evenly divisible by 4, and we will have the right to compensate holders for their remaining or "partial" ETNs in a manner determined by the ETN Calculation Agents in their sole discretion. Our current intention is to provide holders with a cash payment for their partials in an amount equal to the appropriate percentage of the Closing Indicative Value for the ETNs on a specified Index Business Day following the announcement date.

A split or reverse split of the ETNs will not affect the aggregate stated principal amount of ETNs held by an investor, other than to the extent of any "partial" ETNs, but it will affect the stated principal amount per unit of ETNs, the number of ETNs an investor holds and the denominations used for trading purposes on the exchange.

Events of Default

In case an event of default (as defined in the accompanying prospectus) with respect to any series of ETNs shall have occurred and be continuing, the amount declared due and payable for each ETN of that series upon acceleration of those ETNs will be equal to the Maturity Redemption Amount for that series of ETNs, calculated as though the Final Valuation Period began as of the Index Business Day immediately following the date of acceleration.

If the maturity of the ETNs is accelerated because of an event of default as described above, we shall, or shall cause the ETN Calculation Agents to, provide written notice to the trustee at its New York office, on which notice the trustee may conclusively rely, and to DTC of the amount due with respect to each ETN and the aggregate cash amount due with respect to the ETNs of the applicable series as promptly as possible and in no event later than two Business Days after the end of the period referred to in the immediately preceding paragraph.

Default interest will not accrue either before or after maturity or acceleration of any series of ETNs.

Further Issuances

We may, from time to time, without notice to or the consent of the holders of the ETNs, create and issue additional securities having the same terms and conditions as the ETNs offered by this pricing supplement, and ranking on an equal basis with the ETNs in all respects. If there is substantial demand for the ETNs, we may issue additional ETNs frequently. We may sell additional ETNs of any series at different prices but we are under no obligation to issue or sell additional ETNs of any series at any time, and if we do sell additional ETNs of any series, we may limit or restrict such sales, and we may stop and subsequently resume selling additional ETNs of such series at any time. Furthermore, the stated principal amount of each series of ETNs stated at the top of the cover page of this pricing supplement is the maximum amount of each series of ETNs that we have currently authorized for issuance. Although we have the right to increase the authorized amount of either series of ETNs at any time, it is our current intention not to issue more than the current maximum authorized amount of each series of ETNs, even if there is substantial market demand for additional ETNs of such series. We may also reduce the maximum authorized amount of each series of ETNs at any time and have no obligation to issue up to the maximum authorized amount.

Any limitation or suspension on the issuance of the ETNs may materially and adversely affect the price and liquidity of the ETNs in the secondary market. Alternatively, the decrease in supply may cause an imbalance in the market supply and demand, which may cause the ETNs to trade at a premium over the Intraday Indicative Value of the ETNs. Unless we indicate otherwise, if we suspend selling additional ETNs, we reserve the right to resume selling additional ETNs at any time, which might result in the reduction or elimination of any premium in the trading price. Any premium may be reduced or eliminated at any time. We have no obligation to take your interests into account when deciding to issue or not to issue additional ETNs.

Any further issuances of the ETNs of any series will have the same CUSIP number and will trade interchangeably with the offered ETNs of such series. Any additional ETNs will be consolidated and form a single series with the ETNs of the applicable series.

CGMI may condition its acceptance of a market maker's, other market participant's or investor's offer to purchase the ETNs on its agreeing to purchase certain exchange traded notes issued by us or enter into certain transactions consistent with our hedging strategy, including but not limited to swaps. Any limitation or suspension on the issuance of the ETNs may materially and adversely affect the price and liquidity of the ETNs in the secondary market.

Discontinuation or Modification of an Index; Substitution of an Index

If the Index Sponsor discontinues publication of the applicable Index and the Index Sponsor or anyone else publishes a substitute index that the ETN Calculation Agents determine is comparable to the applicable Index, then the ETN Calculation Agents will permanently replace the applicable original Index with that substitute index (the "**Successor Index**") for all purposes under the applicable series of ETNs, and all provisions described in this pricing supplement as applying to the applicable Index will thereafter apply to the Successor Index instead. In such event, the ETN Calculation Agents will make such adjustments, if any, to any level of the applicable Index or Successor Index that is used for purposes of the ETNs as they determine are appropriate in the circumstances. If the ETN Calculation Agents replace the applicable original Index for any series of ETNs with a Successor Index, then the ETN Calculation Agents will determine the Early Redemption Amount, Optional Acceleration Redemption Amount, Automatic Acceleration Redemption Amount or Maturity Redemption Amount (each, a "**Redemption Amount**"), as applicable, for the applicable series of ETNs by reference to the Successor Index.

If the ETN Calculation Agents determine that the publication of the applicable Index is discontinued and there is no Successor Index, the ETN Calculation Agents will determine the applicable level of the applicable Index, and thus the applicable Redemption Amount, by a computation methodology that the ETN Calculation Agents determine will as closely as reasonably possible replicate the applicable Index.

In addition, if an Index Replacement Event (as defined below) occurs at any time and the Index Sponsor or anyone else publishes an index that the ETN Calculation Agents determine is comparable to the applicable Index (the "**Substitute Index**"), then the ETN Calculation Agents may elect, in their sole discretion, to permanently replace the applicable original Index with the Substitute Index for all purposes under the applicable series of ETNs, and all provisions described in this pricing supplement as applying to the applicable Index will thereafter apply to the Substitute Index instead. In such event, the ETN Calculation Agents will make such adjustments, if any, to any level of the applicable Index or Substitute Index that is used for purposes of the ETNs as they determine are appropriate in the circumstances. If the ETN Calculation Agents elect to replace the applicable original Index with a Substitute Index, then the ETN Calculation Agents will determine the applicable Redemption Amount for the applicable series of ETNs by reference to the Substitute Index. If the ETN Calculation Agents so elect to replace the applicable original Index with a Substitute Index, the ETN Calculation Agents will, within 10 Index Business Days after the ETN Calculation Agents determine that an Index Replacement Event has occurred, notify you of the Substitute Index through customary channels used to deliver notices to the holders of exchange traded notes.

For purposes of determining whether an index is comparable to the applicable Index in accordance with this section, if the ETN Calculation Agents determine that the 3-month U.S. dollar LIBOR rate has been or will be discontinued or its status as an economic benchmark has significantly diminished and that an alternative rate exists that is regarded by market participants as a successor or substitute for 3-month U.S. dollar LIBOR for any relevant purpose, such determination shall be a sufficient basis for the ETN Calculation Agents to determine that such alternative rate is comparable to 3-month U.S. dollar LIBOR and that any futures contract referencing such alternative rate is comparable to Eurodollar futures contracts, regardless of whether such alternative rate has a tenor of 3 months or reflects bank credit risk. Furthermore, the ETN Calculation Agents may deem such index to be comparable to the applicable Index even if the number or tenors of futures contracts referencing such alternative rate included in such index differ from those of the Eurodollar futures contracts included in the applicable Index.

If the ETN Calculation Agents determine that the applicable Index, the Eurodollar futures contracts included in the applicable Index or the method of calculating the applicable Index is changed at any time in any respect, including whether the change is made by the Index Sponsor under its existing policies or following a modification of those policies, is due to the publication of a Successor Index, is due to events affecting the Eurodollar futures contracts included in the applicable Index or is due to any other reason and is not otherwise reflected in the level of the applicable Index by the Index Sponsor pursuant to the methodology described herein, then the ETN Calculation Agents will be permitted (but not required) to make such adjustments in the applicable Index or the method of its calculation as they believe are appropriate to ensure that the applicable closing level of the applicable Index used to determine the applicable Redemption Amount is equitable.

An "**Index Replacement Event**" means:

(a) an amendment to or change (including any officially announced proposed change) in the laws, regulations or rules of the United States (or any political subdivision thereof), or any jurisdiction in which a Primary Exchange or Related Exchange (each as defined herein) is located that (i) makes it illegal for CGMI or its affiliates to hold, acquire or dispose of the Eurodollar futures contracts included in the applicable Index or options, futures, swaps or other derivatives on the applicable Index or the Eurodollar futures contracts included in the applicable Index (including but not limited to exchange-imposed position limits), (ii) materially increases the cost to us, our affiliates, third parties with whom we transact or similarly situated third parties in performing our or their obligations in connection with the ETNs, (iii) has a material adverse effect on any of these parties' ability to perform their obligations in connection with the ETNs or (iv) materially affects our ability to issue or transact in exchange traded notes similar to the ETNs, each as determined the ETN Calculation Agents;

(b) any official administrative decision, judicial decision, administrative action, regulatory interpretation or other official pronouncement interpreting or applying those laws, regulations or rules that is announced on or after the Inception Date that (i) makes it illegal for CGMI or its affiliates to hold, acquire or dispose of the Eurodollar futures contracts included in the applicable Index or options, futures, swaps or other derivatives on the applicable Index or the Eurodollar futures contracts included in the applicable Index (including but not limited to exchange-imposed position limits), (ii) materially increases the cost to us, our affiliates, third parties with whom we transact or similarly situated third parties in performing our or their obligations in connection with the ETNs, (iii) has a material adverse effect on the ability of us, our affiliates, third parties with whom we transact or a similarly situated third party to perform our or their obligations in connection with the ETNs or (iv) materially affects our ability to issue or transact in exchange traded notes similar to the ETNs, each as determined by the ETN Calculation Agents;

(c) any event that occurs on or after the Inception Date that makes it a violation of any law, regulation or rule of the United States (or any political subdivision thereof), or any jurisdiction in which a Primary Exchange or Related Exchange (each as defined herein) is located, or of any official administrative decision, judicial decision, administrative action, regulatory interpretation or other official pronouncement interpreting or applying those laws, regulations or rules, (i) for CGMI to hold, acquire or dispose of the Eurodollar futures contracts included in the applicable Index or options, futures, swaps or other derivatives on the applicable Index or the Eurodollar futures contracts included in the applicable Index (including but not limited to exchange-imposed position limits), (ii) for us, our affiliates, third parties with whom we transact or similarly situated third parties to perform our or their obligations in connection with the ETNs or (iii) for us to issue or transact in exchange traded notes similar to the ETNs, each as determined by the ETN Calculation Agents;

(d) any event, as determined by the ETN Calculation Agents, as a result of which we or any of our affiliates or a similarly situated party would, after using commercially reasonable efforts, be unable to, or would incur a materially increased amount of tax, duty, expense or fee (other than brokerage commissions) to, acquire, establish, re-establish, substitute, maintain, unwind or dispose of any transaction or asset it deems necessary to hedge the risk of the ETNs, or realize, recover or remit the proceeds of any such transaction or asset;

(e) any event or series of events, as determined by the ETN Calculation Agents, as a result of which the 3-month U.S. dollar LIBOR rate has been or will be discontinued or its status as an economic benchmark is significantly diminished; or

(f) as determined by the ETN Calculation Agents, the primary exchange or market for trading for the ETNs, if any, announces that pursuant to the rules of such exchange or market, as applicable, the ETNs cease (or will cease) to be listed, traded or publicly quoted on such exchange or market, as applicable, for any reason and are not immediately re-listed, re-traded or re-quoted on an exchange or quotation system located in the same country as such exchange or market, as applicable.

"**Primary Exchange**" means the primary exchange on which Eurodollar futures contracts included in the applicable Index are traded, as determined by the ETN Calculation Agents, which is initially CME Globex.

"**Related Exchange**" means each exchange or quotation system where trading has a material effect (as determined by the ETN Calculation Agents) for the overall market for futures or options contracts relating to (i) the applicable Index or (ii) the Eurodollar futures contracts included in the applicable Index.

Role of ETN Calculation Agents

CGMI, an affiliate of ours, and JICS will serve as the ETN Calculation Agents. The ETN Calculation Agents will, in their good faith and commercially reasonable judgment, make all calculations and determinations regarding the value of the ETNs, including at maturity or upon early redemption or acceleration, Market Disruption Events (see "—Market Disruption Events"), Business Days and Index Business Days, the Daily Investor Fee amount, the Daily Accrual, the closing level of each Index on any Index Business Day, the Maturity Date, any Early Redemption Dates, any Optional Acceleration Date, any Automatic Acceleration Date, the amount payable in respect of the ETNs at maturity, upon redemption or upon acceleration and any other calculations or determinations to be made by the ETN Calculation Agents as specified herein. CGMI will have the sole ability to make determinations with respect to reduction of the Minimum Redemption Amount, calculation of default amounts, calculations of the Intraday Indicative Value in connection with determining whether a Trigger Event occurs, calculating the Automatic Acceleration Index Level and calculating the Closing Indicative Value in the event of an Automatic Acceleration. JICS will have the sole ability to calculate and disseminate the number of ETNs outstanding, the Closing Indicative Value and the Intraday Indicative Value (other than as described in the preceding sentence), subject to CGMI's right to dispute JICS' calculation of the Closing Indicative Value, in which case, if the ETN Calculation Agents are unable to agree, CGMI's determination of the Closing Indicative Value shall be conclusive and binding. All other determinations will be made by the ETN Calculation Agents jointly, except that, if the ETN Calculation Agents are unable to agree following a dispute resolution procedure, CGMI's calculation shall be conclusive and binding. Absent manifest error, all determinations of the ETN Calculation Agents will be final and binding on you and us, without any liability on the part of the ETN Calculation Agents. You will not be entitled to any compensation from us for any loss suffered as a result of any of the above determinations by the ETN Calculation Agents.

If any of the ETN Calculation Agents cease to perform their respective roles described in this pricing supplement, we will either, at our sole discretion, perform such roles, appoint another party to do so or accelerate the relevant series of ETNs.

CGMI's agreement with JICS requires the following statement to appear in this pricing supplement:

ALTHOUGH JANUS INDEX & CALCULATION SERVICES LLC SHALL OBTAIN INFORMATION FOR INCLUSION IN OR FOR USE IN CALCULATIONS RELATED TO THE ETNS AND/OR THE INDICES FROM SOURCES WHICH JANUS INDEX & CALCULATION SERVICES LLC CONSIDERS RELIABLE, NEITHER JANUS INDEX & CALCULATION SERVICES LLC NOR ANY OTHER PARTY GUARANTEES THE ACCURACY AND/OR THE COMPLETENESS OF THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS. NEITHER JANUS INDEX & CALCULATION SERVICES LLC NOR ANY OTHER PARTY MAKES ANY WARRANTY, EXPRESS OR IMPLIED, AS TO RESULTS TO BE OBTAINED BY CITIGROUP GLOBAL MARKETS HOLDINGS INC., ITS CUSTOMERS AND COUNTERPARTIES, HOLDERS OF THE ETNS, OR ANY OTHER PERSON OR ENTITY FROM THE USE OF THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS. NEITHER JANUS INDEX & CALCULATION SERVICES LLC NOR ANY OTHER PARTY MAKES ANY EXPRESS OR IMPLIED WARRANTIES, AND JANUS INDEX & CALCULATION SERVICES LLC HEREBY EXPRESSLY DISCLAIMS ALL WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE WITH RESPECT TO THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS. WITHOUT LIMITING ANY OF THE FOREGOING, IN NO EVENT SHALL JANUS INDEX & CALCULATION SERVICES LLC OR ANY OTHER PARTY HAVE ANY LIABILITY FOR ANY DIRECT, INDIRECT, SPECIAL, PUNITIVE, CONSEQUENTIAL OR ANY OTHER DAMAGES (INCLUDING LOST PROFITS) EVEN IF NOTIFIED OF THE POSSIBILITY OF SUCH DAMAGES.

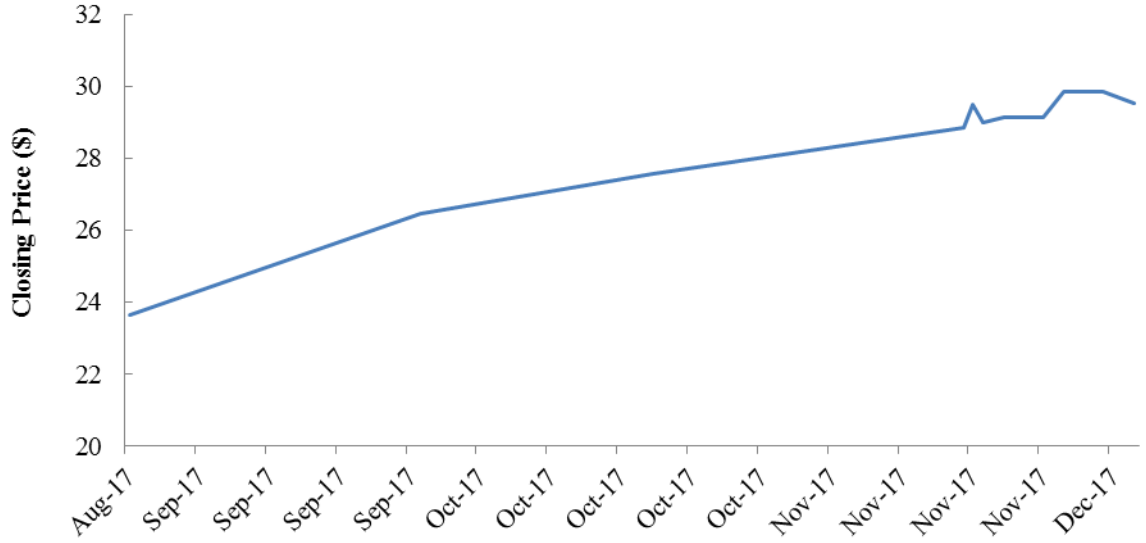
The ETNs are not sponsored, endorsed or sold by Janus Index & Calculation Services LLC, nor does Janus Index & Calculation Services LLC make any representation regarding the advisability of investing in any of the ETNs.

Historical Data on the ETNs

The following graphs show the closing prices of the ETNs on each day such prices were available for the limited period from August 15, 2017 to December 18, 2017. The related tables show the high, low and end-of quarter closing prices of the ETNs for each quarter during that same period. We have provided this historical information to help you evaluate the behavior of the ETNs. However, past performance is not indicative of how the ETNs will perform in the future.

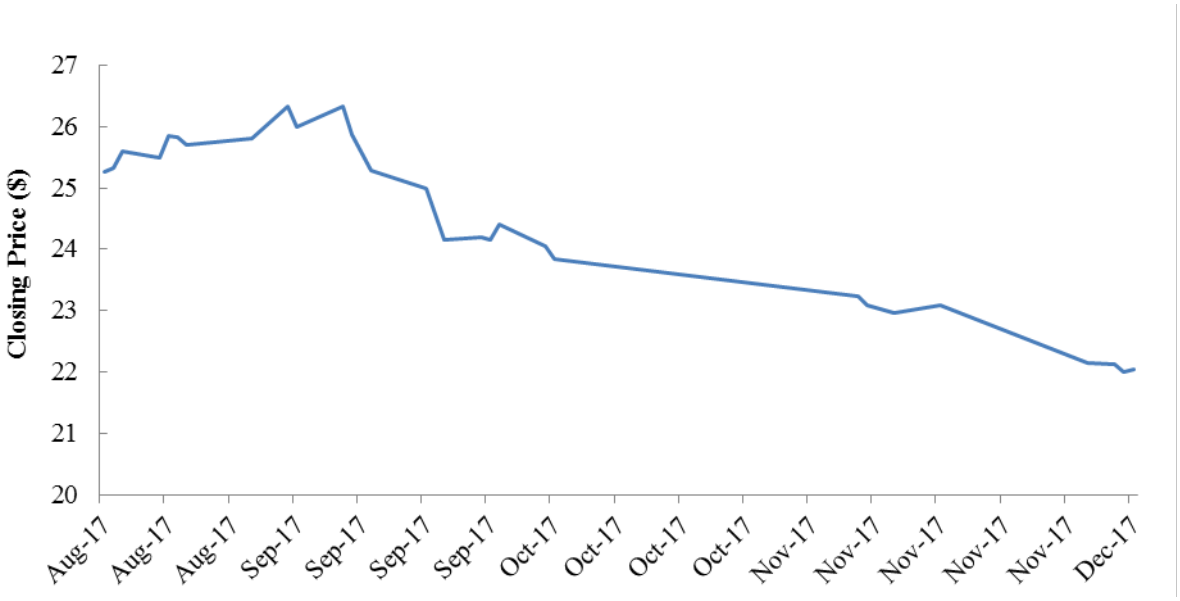
The closing price of the Long LIBOR ETNs on December 7, 2017 was $29.54 per $25.00 stated principal amount. The closing price of the Short LIBOR ETNs on December 6, 2017 was $22.05 per $25.00 stated principal amount.

Historical Daily Closing Prices for the Long LIBOR ETNs
August 15, 2017 to December 7, 2017



	High ($)	Low ($)	Period End ($)
2017			
Quarter			
Third	26.47	23.66	26.47
Fourth (through December 7, 2017)	29.84	27.57	29.54

Historical Daily Closing Prices for the Short LIBOR ETNs
August 15, 2017 to December 6, 2017



	High ($)	Low ($)	Period End ($)
2017			
Quarter			
Third	26.34	24.15	24.40
Fourth (through December 6, 2017)	24.05	21.99	22.05

UNITED STATES FEDERAL TAX CONSIDERATIONS

Prospective investors should note that the discussion under the section called "United States Federal Tax Considerations" in the accompanying prospectus supplement does not apply to the ETNs issued under this pricing supplement and is superseded by the following discussion. However, the discussion below is subject to the discussion in "United States Federal Tax Considerations—Assumption by Citigroup" in the accompanying prospectus supplement, and you should read it in conjunction with that discussion.

The following is a discussion of the material U.S. federal income and certain estate tax consequences of ownership and disposition of the ETNs. It applies to you only if you purchase an ETN for cash and hold it as a capital asset within the meaning of Section 1221 of the Internal Revenue Code of 1986, as amended (the "**Code**"). It does not address all of the tax consequences that may be relevant to you in light of your particular circumstances or if you are a holder subject to special rules, such as:

- a financial institution;
- a "regulated investment company";
- a tax-exempt entity, including an "individual retirement account" or "Roth IRA";
- a dealer or trader subject to a mark-to-market method of tax accounting with respect to the ETNs;
- a person holding the ETNs as part of a "straddle" or conversion transaction or one who enters into a "constructive sale" with respect to an ETN;
- a person subject to the alternative minimum tax;
- a U.S. Holder (as defined below) whose functional currency is not the U.S. dollar; or
- an entity classified as a partnership for U.S. federal income tax purposes.

If an entity that is classified as a partnership for U.S. federal income tax purposes holds ETNs, the U.S. federal income tax treatment of a partner will generally depend on the status of the partner and the activities of the partnership. If you are a partnership holding ETNs or a partner in such a partnership, you should consult your tax adviser as to the particular U.S. federal income tax consequences of holding and disposing of ETNs to you.

This discussion is based on the Code, administrative pronouncements, judicial decisions and final, temporary and proposed Treasury regulations, all as of the date hereof, changes to any of which subsequent to the date of this pricing supplement may affect the tax consequences described herein, possibly with retroactive effect. This discussion does not address the effects of any applicable state, local or non-U.S. tax laws or the potential application of the Medicare contribution tax. You should consult your tax adviser about the application of the U.S. federal income and estate tax laws to your particular situation (including the possibility of alternative treatments of the ETNs), as well as any tax consequences arising under the laws of any state, local or non-U.S. jurisdiction.

Tax Treatment of the ETNs

In the opinion of our counsel, Davis Polk & Wardwell LLP, which is based on current market conditions, it is more likely than not that the ETNs will be treated as prepaid forward contracts for U.S. federal income tax purposes. By purchasing the ETNs, you agree (in the absence of an administrative determination or judicial ruling to the contrary) to this treatment.

Due to the absence of statutory, judicial or administrative authorities that directly address the U.S. federal tax treatment of the ETNs or similar instruments, significant aspects of the treatment of an investment in the ETNs are uncertain. We do not plan to request a ruling from the IRS, and the IRS or a court might not agree with the treatment described below. Accordingly, you should consult your tax adviser regarding all aspects of the U.S. federal income and estate tax consequences of an investment in the ETNs and with respect to any tax consequences arising under the laws of any state, local or non-U.S. taxing jurisdiction. Unless otherwise indicated, the following discussion is based on the treatment of the ETNs as prepaid forward contracts.

Tax Consequences to U.S. Holders

This section applies only to U.S. Holders. You are a "U.S. Holder" if for U.S. federal income tax purposes you are a beneficial owner of an ETN that is:

- a citizen or individual resident of the United States;
- a corporation, or other entity taxable as a corporation, created or organized in or under the laws of the United States, any state therein or the District of Columbia; or
- an estate or trust the income of which is subject to U.S. federal income taxation regardless of its source.

The term "U.S. Holder" also includes certain former citizens and residents of the United States.

Tax Treatment Prior to Maturity. Subject to the discussion under "Possible Taxable Event" below, you should not be required to recognize taxable income over the term of the ETNs prior to maturity, other than pursuant to a sale, exchange or retirement of the ETNs as described below.

Taxable Disposition of the ETNs. Upon a taxable disposition (including a sale, exchange or retirement) of an ETN, you should recognize gain or loss equal to the difference between the amount realized and your tax basis in the relevant ETN. Subject to the discussion under "Possible Taxable Event" below, (i) your tax basis in an ETN should equal the amount you paid to acquire it, and (ii) this gain or loss should be long-term capital gain or loss if at the time of the taxable disposition you have held the ETN for more than one year, and short-term capital gain or loss otherwise. Long-term capital gains recognized by non-corporate U.S. Holders are generally subject to taxation at reduced rates. The deductibility of capital losses is subject to limitations.

Possible Taxable Event

In the event of a rebalancing of an Index or other change in its composition, a change in the methodology by which an Index is calculated, a substitution of an Index or a similar event resulting in a change in the manner in which the amount due on an ETN is determined, it is possible that the ETNs could be treated, in whole or part, as terminated and reissued for U.S. federal income tax purposes. In particular, if the ETN Calculation Agents replace an Index with an index of alternative futures contracts on an alternative rate to the 3-month U.S. dollar LIBOR rate as described under "Specific Terms of the ETNs—Discontinuation or Modification of an Index; Substitution of an Index," such an event could be treated as a taxable event. In such a case, you might be required to recognize gain or loss (subject to the possible application of the wash sale rules) with respect to the ETNs. In addition, your tax basis and holding period for your ETNs would be affected.

Possible Alternative Tax Treatments of an Investment in the ETNs

Alternative U.S. federal income tax treatments of the ETNs are possible that, if applied, could materially and adversely affect the timing and/or character of income, gain or loss with respect to the ETNs. It is possible, for example, that the ETNs could be treated as debt instruments issued by us. Under this treatment, the ETNs would be subject to Treasury regulations relating to the taxation of contingent payment debt instruments. In this case, regardless of your method of tax accounting for U.S. federal income tax purposes, you would be required to accrue income based on our comparable yield for similar non-contingent debt, determined as of the time of issuance of the ETNs, in each year that you held the ETNs, even though we are not required to make any payment with respect to the ETNs until retirement. In addition, any gain on the sale, exchange or retirement of the ETNs would be treated as ordinary income.

It is also possible that an ETN could be treated in whole or in part as subject to the mark-to-market rules of Section 1256 of the Code. Section 1256 applies to, among others, "regulated futures contracts" as well as certain options listed on or subject to the rules of a qualified board or exchange. If Section 1256 were to apply to an ETN, a U.S. Holder would be required (i) to recognize gain or loss on all, or a portion, of the ETN as if it were sold at its

fair market value on the last business day of each year it is held, and (ii) to treat such gain or loss as 40% short-term capital gain or loss and 60% long-term capital gain or loss. You should consult your tax adviser regarding the potential application of Section 1256 to the ETNs.

Even if the treatment of the ETNs as prepaid forward contracts is respected, the IRS could treat gain or loss recognized upon the retirement of an ETN as ordinary income or loss instead of capital gain or loss. Among other things, if you are an individual, an ordinary loss that you recognize may be a "miscellaneous itemized deduction" that is wholly or partly nondeductible.

Other possible U.S. federal income tax treatments of the ETNs could also affect the timing and character of income or loss with respect to the ETNs. In 2007, the U.S. Treasury Department and the IRS released a notice requesting comments on the U.S. federal income tax treatment of "prepaid forward contracts" and similar instruments. The notice focuses in particular on whether to require holders of these instruments to accrue income over the term of their investment. It also asks for comments on a number of related topics, including the character of income or loss with respect to these instruments; the relevance of factors such as the exchange-traded status of the instruments and the nature of the underlying property to which the instruments are linked; and whether these instruments are or should be subject to the "constructive ownership" regime, which very generally can operate to recharacterize certain long-term capital gain as ordinary income and impose an interest charge. While the notice requests comments on appropriate transition rules and effective dates, any Treasury regulations or other guidance promulgated after consideration of these issues could materially and adversely affect the tax consequences of an investment in the ETNs, possibly with retroactive effect. Members of Congress have also introduced legislation that would change the tax treatment of derivatives. You should consult your tax adviser regarding the U.S. federal income tax consequences of an investment in the ETNs, including possible alternative treatments and potential changes to applicable law.

Tax Consequences to Non-U.S. Holders

This section applies only to Non-U.S. Holders. You are a "Non-U.S. Holder" if for U.S. federal income tax purposes you are a beneficial owner of an ETN that is:

- an individual who is classified as a nonresident alien;
- a foreign corporation; or
- a foreign estate or trust.

You are not a Non-U.S. Holder for the purposes of this discussion if you are (i) an individual who is present in the United States for 183 days or more in the taxable year of disposition and who is not otherwise a resident of the United States for U.S. federal income tax purposes or (ii) a former citizen or resident of the United States and certain conditions apply. If you are or may become such a person during the period in which you hold an ETN, you should consult your tax adviser regarding the U.S. federal tax consequences of an investment in the ETNs.

Taxable Disposition of the ETNs. Subject to the discussion below under "FATCA," you generally should not be subject to U.S. federal withholding or income tax in respect of the ETNs, provided that (i) income in respect of the ETNs is not effectively connected with your conduct of a trade or business in the United States, and (ii) you comply with the applicable certification requirements.

If you are engaged in a U.S. trade or business, and if income from the ETNs is effectively connected with the conduct of that trade or business, you generally will be subject to regular U.S. federal income tax with respect to that income in the same manner as if you were a U.S. Holder, unless an applicable income tax treaty provides otherwise. If you are such a holder and you are a corporation, you should also consider the potential application of a 30% (or lower treaty rate) branch profits tax.

Tax Consequences Under Possible Alternative Treatments. Subject to the discussion below under "FATCA," if all or any portion of an ETN were recharacterized as a debt instrument, any payment made to you with

respect to the ETN generally would not be subject to U.S. federal withholding or income tax, provided that (i) income or gain in respect of the ETN is not effectively connected with your conduct of a trade or business in the United States, and (ii) you provide an appropriate IRS Form W-8 certifying under penalties of perjury that you are not a United States person.

Other U.S. federal income tax treatments of the ETNs are also possible. In 2007, the U.S. Treasury Department and the IRS released a notice requesting comments on the U.S. federal income tax treatment of "prepaid forward contracts" and similar instruments. Among the issues addressed in the notice is the degree, if any, to which any income with respect to instruments such as the ETNs should be subject to U.S. withholding tax. While the notice requests comments on appropriate transition rules and effective dates, it is possible that any Treasury regulations or other guidance promulgated after consideration of these issues might materially and adversely affect the withholding tax consequences of an investment in the ETNs, possibly with retroactive effect. If withholding applies to the ETNs, we will not be required to pay any additional amounts with respect to amounts withheld.

U.S. Federal Estate Tax

If you are an individual Non-U.S. Holder or an entity the property of which is potentially includible in such an individual's gross estate for U.S. federal estate tax purposes (for example, a trust funded by such an individual and with respect to which the individual has retained certain interests or powers), you should note that, absent an applicable treaty exemption, the ETNs may be treated as U.S. situs property subject to U.S. federal estate tax. If you are such an individual or entity, you should consult your tax adviser regarding the U.S. federal estate tax consequences of an investment in the ETNs.

Information Reporting and Backup Withholding

The payment of the proceeds of a taxable disposition of the ETNs may be subject to information reporting and, if you fail to provide certain identifying information (such as an accurate taxpayer identification number if you are a U.S. Holder) or meet certain other conditions, may also be subject to backup withholding at the rate specified in the Code. If you are a Non-U.S. Holder that provides an appropriate IRS Form W-8, you will generally establish an exemption from backup withholding. Amounts withheld under the backup withholding rules are not additional taxes and may be refunded or credited against your U.S. federal income tax liability, provided the relevant information is timely furnished to the IRS.

FATCA

Legislation commonly referred to as "FATCA" generally imposes a withholding tax of 30% on payments to certain non-U.S. entities (including financial intermediaries) with respect to certain financial instruments, unless various U.S. information reporting and due diligence requirements have been satisfied. An intergovernmental agreement between the United States and the non-U.S. entity's jurisdiction may modify these requirements. This legislation generally applies to certain financial instruments that are treated as paying U.S.-source interest or other U.S.-source "fixed or determinable annual or periodical" income ("**FDAP income**"). Withholding (if applicable) applies to payments of U.S.-source FDAP income and, for dispositions that occur after December 31, 2018, to payments of gross proceeds of the disposition (including retirement) of certain financial instruments treated as providing for U.S.-source interest or dividends. If the ETNs were recharacterized as debt instruments, this legislation would apply to the ETNs. If withholding applies to the ETNs, we will not be required to pay any additional amounts with respect to amounts withheld. You should consult your tax adviser regarding the potential application of FATCA to the ETNs.

The preceding discussion, when read in conjunction with "United States Federal Tax Considerations—Assumption by Citigroup" in the accompanying prospectus supplement, constitutes the full opinion of Davis Polk & Wardwell LLP regarding the material U.S. federal tax consequences of owning and disposing of the ETNs.

Prospective investors in the ETNs should consult their tax advisers regarding all aspects of the U.S. federal income and estate tax consequences of an investment in the ETNs and any tax consequences arising

under the laws of any state, local or non-U.S. taxing jurisdiction.

SUPPLEMENTAL PLAN OF DISTRIBUTION (CONFLICTS OF INTEREST)

The terms and conditions set forth in the Amended and Restated Global Selling Agency Agreement dated April 7, 2017 among Citigroup Global Markets Holdings Inc., Citigroup Inc. and the Agents listed on Schedule I thereto, including Citigroup Global Markets Inc. ("**CGMI**"), govern the sale and purchase of the ETNs.

CGMI, an affiliate of ours, is the agent for this offering. We issued and sold a portion of the ETNs to CGMI on the Initial Settlement Date and received proceeds equal to 100% of their Closing Indicative Value as of the Inception Date. After the Initial Settlement Date, we may issue and sell additional ETNs of each series to CGMI based on their Indicative Value at that time. For any ETNs we issue and sell after the Initial Settlement Date, we expect to receive proceeds equal to 100% of their Indicative Value at the time we price the sale of the ETNs to CGMI. CGMI may offer and sell ETNs from time to time as principal to investors and to dealers at a price based on the Indicative Value at the time of sale. Dealers may in turn offer and sell ETNs to investors at market prices prevailing at the time of sale, at prices related to market prices or at negotiated prices. CGMI may lend the ETNs to broker-dealers and other market participants who may have made short sales of such ETNs and who may cover such short positions by purchasing such ETNs from CGMI.

We are not obligated to issue and sell additional ETNs at any time to CGMI, and CGMI is not obligated to sell additional ETNs to investors or dealers at any time. The stated principal amount of each series of ETNs stated at the top of the cover page of this pricing supplement is the maximum amount of each series of ETNs that we have currently authorized for issuance. Although we have the right to increase the authorized amount of either series of ETNs at any time, it is our current intention not to issue more than the current maximum authorized amount of each series of ETNs, even if there is substantial market demand for additional ETNs of such series. We may also reduce the maximum authorized amount of each series of ETNs at any time and have no obligation to issue up to the maximum authorized amount. If we discontinue issuances and sales of the ETNs of any series, or if CGMI discontinues sales of the ETNs of any series, the price and liquidity of those ETNs may be subject to significant distortions. See "Risk Factors—We and CGMI are under no obligation to issue or sell additional ETNs of any series at any time, and if we and CGMI do sell additional ETNs of any series, we or CGMI may limit or restrict such sales, and we or CGMI may stop and subsequently resume selling additional ETNs of such series at any time" and "—Any limitation or suspension on the issuance or sale of the ETNs may impact the trading price of the ETNs, including by creating a premium over the Indicative Value of the ETNs that may be reduced or eliminated at any time."

We will not pay any commissions or underwriting fees to CGMI or any other dealer. For any ETNs it sells, CGMI is expected to charge to purchasers a creation fee of up to approximately 0.15% *times* the Indicative Value at which CGMI prices the sale of such ETNs, *provided however* that CGMI may from time to time increase or decrease the creation fee. In exchange for providing certain services relating to the distribution of the ETNs, CGMI, a member of the Financial Industry Regulatory Authority ("**FINRA**"), or another FINRA member may receive all or a portion of the Daily Investor Fee. In addition, CGMI will charge investors a redemption charge of 0.20% *times* the Closing Indicative Value on the Early Redemption Valuation Date of any ETN that is redeemed at the investor's option. CGMI and its affiliates may also profit from expected hedging activity related to these offerings, even if the value of the ETNs declines.

CGMI may from time to time purchase outstanding ETNs of any series in the open market, in connection with early redemptions or in other transactions, and CGMI may use this pricing supplement together with the accompanying prospectus supplement and prospectus in connection with resales of some or all of the purchased ETNs in the secondary market. Broker-dealers, including CGMI, may make a market in the ETNs of any series, although none of them are obligated to do so and any of them may stop doing so at any time without notice. This pricing supplement (including the accompanying prospectus supplement and prospectus) may be used by CGMI or any other dealer in connection with market-making transactions. In these transactions, CGMI or such dealers may resell an ETN covered by this pricing supplement that they acquire from us, CGMI or other holders after the original offering and sale of the ETNs, or they may sell an ETN covered by this pricing supplement in short sale transactions. This pricing supplement (including the accompanying prospectus supplement and prospectus) will be deemed to cover any short sales of the ETNs by market participants who borrow ETNs from us or our affiliates or who cover their short positions with ETNs acquired from us or our affiliates.

In order to hedge our obligations under the ETNs, we have entered into and will enter into one or more swaps or other derivatives transactions with one or more of our affiliates. You should refer to the section "Risk Factors—Trading and other transactions by our affiliates or third parties with whom we transact in securities or financial instruments related to the ETNs and the Indices may impair the value of the ETNs" in this pricing supplement and the section "Use of Proceeds and Hedging" in the accompanying prospectus. CGMI may condition its acceptance of an offer to purchase any series of the ETNs on such purchaser's agreement to purchase certain exchange traded notes issued by us or enter into certain transactions consistent with our affiliates' hedging strategy.

Broker-dealers and other market participants are cautioned that some of their activities, including borrowing ETNs from one of our affiliates for purposes of short sales or covering short sales with ETNs acquired from one of our affiliates, may result in their being deemed participants in the distribution of the ETNs of any series in a manner that would render them statutory underwriters and subject them to the prospectus delivery and liability provisions of the Securities Act of 1933. A determination of whether a particular market participant is an underwriter must take into account all the facts and circumstances pertaining to the activities of the participant in the particular case, and the example mentioned above should not be considered a complete description of all the activities that would lead to designation as an underwriter and subject a market participant to the prospectus-delivery and liability provisions of the Securities Act. This pricing supplement (including the accompanying prospectus supplement and prospectus) will be deemed to cover any short sales of the ETNs by market participants who borrow ETNs from us or our affiliates or who cover their short positions with ETNs acquired from us or our affiliates.

We have retained Janus Distributors LLC, doing business as Janus Henderson Distributors ("**JHD**"), a member of FINRA, to provide certain services relating to the placement and marketing of the ETNs of each series. JHD will receive a portion of the Daily Investor Fee in consideration for its role in marketing and placing the ETNs. The actual amount received by JHD in a given year will accrue on a daily basis based on the number of then outstanding ETNs of any series held by investors. CGMI will also pay the Index Sponsor a portion of the Daily Investor Fee in consideration for the license of certain intellectual property of the Index Sponsor, as described under "Description of the Janus Velocity LIBOR Indices—License Agreement" above. CGMI has agreed to indemnify JHD against liabilities relating to material misstatements and omissions. From time to time, JHD and its affiliates have, and in the future may, engage in transactions with and perform services for us for which they have been, and may be, paid customary fees. JICS or its agent is responsible for computing and disseminating the Closing Indicative Value and Intraday Indicative Value, except as otherwise described herein.

CGMI may deliver ETNs against payment therefor on a date that is greater than two Business Days following the date of sale of such ETNs. Under Rule 15c6-1 of the Securities Exchange Act of 1934, trades in the secondary market generally are required to settle in two Business Days, unless parties to any such trade expressly agree otherwise. Purchasers who wish to trade ETNs that are to be issued more than two Business Days after the related pricing date will be required to specify alternative settlement arrangements to prevent a failed settlement.

No action has been or will be taken by us or our affiliates or any underwriter, dealer or agent that would permit a public offering of the ETNs or possession or distribution of this pricing supplement (including the prospectus supplement and prospectus) or any free writing prospectus in any jurisdiction, other than the United States, where action for that purpose is required. No offers, sales or deliveries of the ETNs, or distribution of this pricing supplement (including the prospectus supplement and prospectus) or any other offering material relating to the ETNs may be made in or from any jurisdiction outside the United States, except in circumstances that will result in compliance with any applicable laws and regulations and will not impose any obligations on us or our affiliates, any underwriter, dealer or agent. You should refer to the section "Plan of Distribution—Certain Selling Restrictions" in the accompanying prospectus supplement.

CGMI is an affiliate of ours. Accordingly, these offerings will conform to the requirements addressing conflicts of interest when distributing the securities of an affiliate set forth in Rule 5121 of the Conduct Rules adopted by FINRA. Client accounts over which Citigroup Inc., its subsidiaries or affiliates of its subsidiaries have investment discretion are not permitted to purchase the ETNs, either directly or indirectly, without the prior written consent of the client.

Prohibition of Sales to EEA Retail Investors

The ETNs may not be offered, sold or otherwise made available to any retail investor in the European Economic Area. For the purposes of this provision:

(a) the expression "retail investor" means a person who is one (or more) of the following:

(i) a retail client as defined in point (11) of Article 4(1) of Directive 2014/65/EU (as amended, "MiFID II"); or

(ii) a customer within the meaning of Directive 2002/92/EC, where that customer would not qualify as a professional client as defined in point (10) of Article 4(1) of MiFID II; or

(iii) not a qualified investor as defined in Directive 2003/71/EC; and

(b) the expression "offer" includes the communication in any form and by any means of sufficient information on the terms of the offer and the ETNs offered so as to enable an investor to decide to purchase or subscribe the ETNs.

Janus Index & Calculation Services LLC

CGMI has entered into a non-exclusive license agreement with Janus Index & Calculation Services LLC ("**JICS**") to license to us and our affiliates, in exchange for a fee, the right to use certain trade names, trademarks and servicemarks, which are owned by JICS and its affiliates, in connection with certain securities, including the ETNs.

The license agreement between JICS and CGMI provides that the following language must be set forth in this pricing supplement:

"VelocityShares", the "V Logo" and the "V VelocityShares Logo" are service marks of Janus Index & Calculation Services LLC and have been licensed for use by us. The ETNs are not sponsored, endorsed or sold by Janus Index & Calculation Services LLC, nor does Janus Index & Calculation Services LLC make any representation regarding the advisability of investing in any of the ETNs.

NEITHER JANUS INDEX & CALCULATION SERVICES LLC AND ITS AFFILIATES (TOGETHER, "**JANUS**") NOR ANY OTHER PARTY MAKES ANY REPRESENTATION OR WARRANTY, EXPRESS OR IMPLIED, TO THE OWNERS OF THE ETNS OR ANY MEMBER OF THE PUBLIC REGARDING THE ADVISABILITY OF INVESTING IN THE ETNS GENERALLY OR THE SIMILARITIES OR VARIATIONS BETWEEN THE PERFORMANCE OF THE ETNS OR THE INDICES AND THE PERFORMANCE OF THE UNDERLYING SECURITIES OR FINANCIAL INSTRUMENTS. JANUS IS THE LICENSOR OF CERTAIN TRADEMARKS, SERVICE MARKS AND TRADE NAMES OF JANUS. NEITHER JANUS NOR ANY OTHER PARTY GUARANTEES THE ACCURACY AND/OR THE COMPLETENESS OF THE INDICES OR ANY DATA INCLUDED THEREIN OR ANY CALCULATIONS MADE WITH RESPECT TO THE ETNS."

BENEFIT PLAN INVESTOR CONSIDERATIONS

A fiduciary of a pension, profit-sharing or other employee benefit plan subject to the Employee Retirement Income Security Act of 1974, as amended ("**ERISA**"), including entities such as collective investment funds, partnerships and separate accounts whose underlying assets include the assets of such plans (collectively, "**ERISA Plans"),** should consider the fiduciary standards of ERISA in the context of the ERISA Plan's particular circumstances before authorizing an investment in the ETNs. Among other factors, the fiduciary should consider whether the investment would satisfy the prudence and diversification requirements of ERISA and would be consistent with the documents and instruments governing the ERISA Plan.

Section 406 of ERISA and Section 4975 of the Internal Revenue Code of 1986, as amended, (the "**Code**") prohibit ERISA Plans, as well as plans (including individual retirement accounts and Keogh plans) subject to Section 4975 of the Code (together with ERISA Plans, "**Plans**"), from engaging in certain transactions involving the "plan assets" with persons who are "parties in interest" under ERISA or "disqualified persons" under Section 4975 of the Code (in either case, "**Parties in Interest**") with respect to such Plans. As a result of our business, we, and our current and future affiliates, may be Parties in Interest with respect to many Plans. Where we (or our affiliate) are a Party in Interest with respect to a Plan (either directly or by reason of our ownership interests in our directly or indirectly owned subsidiaries), the purchase and holding of the ETNs by or on behalf of the Plan could be a prohibited transaction under Section 406 of ERISA and/or Section 4975 of the Code, unless exemptive relief were available under an applicable exemption (as described below).

Certain prohibited transaction class exemptions ("**PTCEs**") issued by the U.S. Department of Labor may provide exemptive relief for direct or indirect prohibited transactions resulting from the purchase or holding of the ETNs. Those class exemptions are PTCE 96-23 (for certain transactions determined by in-house asset managers), PTCE 95-60 (for certain transactions involving insurance company general accounts), PTCE 91-38 (for certain transactions involving bank collective investment funds), PTCE 90-1 (for certain transactions involving insurance company separate accounts) and PTCE 84-14 (for certain transactions determined by independent qualified asset managers). In addition, ERISA Section 408(b)(17) and Section 4975(d)(20) of the Code may provide a limited exemption for the purchase and sale of the ETNs and related lending transactions, *provided* that neither the issuer of the ETNs nor any of its affiliates have or exercise any discretionary authority or control or render any investment advice with respect to the assets of the Plan involved in the transaction and *provided further* that the Plan pays no more, and receives no less, than adequate consideration in connection with the transaction (the so-called "service provider exemption"). There can be no assurance that any of these statutory or class exemptions will be available with respect to transactions involving the ETNs.

Accordingly, the ETNs may not be purchased or held by any Plan, any entity whose underlying assets include "plan assets" by reason of any Plan's investment in the entity (a "**Plan Asset Entity**") or any person investing "plan assets" of any Plan, unless such purchaser or holder is eligible for the exemptive relief available under PTCE 96-23, 95-60, 91-38, 90-1 or 84-14 or the service provider exemption or there is some other basis on which the purchase and holding of the ETNs will not constitute a non-exempt prohibited transaction under ERISA or Section 4975 of the Code. Each purchaser or holder of the ETNs or any interest therein will be deemed to have represented by its purchase or holding of the ETNs that (a) it is not a Plan and its purchase and holding of the ETNs is not made on behalf of or with "plan assets" of any Plan or (b) its purchase and holding of the ETNs will not result in a non-exempt prohibited transaction under Section 406 of ERISA or Section 4975 of the Code.

Certain governmental plans (as defined in Section 3(32) of ERISA), church plans (as defined in Section 3(33) of ERISA) and non-U.S. plans (as described in Section 4(b)(4) of ERISA) ("**Non-ERISA Arrangements**") are not subject to these "prohibited transaction" rules of ERISA or Section 4975 of the Code, but may be subject to similar rules under other applicable laws or regulations ("**Similar Laws**"). Accordingly, each such purchaser or holder of the ETNs shall be required to represent (and deemed to have represented by its purchase of the ETNs) that such purchase and holding is not prohibited under applicable Similar Laws.

Due to the complexity of these rules, it is particularly important that fiduciaries or other persons considering purchasing the ETNs on behalf of or with "plan assets" of any Plan consult with their counsel regarding the relevant provisions of ERISA, the Code or any Similar Laws and the availability of exemptive relief under PTCE 96-23, 95-60, 91-38, 90-1, 84-14, the service provider exemption or some other basis on which the acquisition and holding will

not constitute a non-exempt prohibited transaction under ERISA or Section 4975 of the Code or a violation of any applicable Similar Laws.

The ETNs are contractual financial instruments. The financial exposure provided by the ETNs is not a substitute or proxy for, and is not intended as a substitute or proxy for, individualized investment management or advice for the benefit of any purchaser or holder of the ETNs. The ETNs have not been designed and will not be administered in a manner intended to reflect the individualized needs and objectives of any purchaser or holder of the ETNs.

Each purchaser or holder of any ETNs acknowledges and agrees that:

(i) the purchaser or holder or its fiduciary has made and shall make all investment decisions for the purchaser or holder and the purchaser or holder has not relied and shall not rely in any way upon us or our affiliates to act as a fiduciary or adviser of the purchaser or holder with respect to (A) the design and terms of the ETNs, (B) the purchaser or holder's investment in the ETNs, or (C) the exercise of or failure to exercise any rights we have under or with respect to the ETNs;

(ii) we and our affiliates have acted and will act solely for our own account in connection with (A) all transactions relating to the ETNs and (B) all hedging transactions in connection with our obligations under the ETNs;

(iii) any and all assets and positions relating to hedging transactions by us or our affiliates are assets and positions of those entities and are not assets and positions held for the benefit of the purchaser or holder;

(iv) our interests are adverse to the interests of the purchaser or holder; and

(v) neither we nor any of our affiliates is a fiduciary or adviser of the purchaser or holder in connection with any such assets, positions or transactions, and any information that we or any of our affiliates may provide is not intended to be impartial investment advice.

Each purchaser and holder of the ETNs has exclusive responsibility for ensuring that its purchase, holding and subsequent disposition of the ETNs does not violate the fiduciary or prohibited transaction rules of ERISA, the Code or any applicable Similar Laws. The sale of any ETNs to any Plan is in no respect a representation by us or any of our affiliates or representatives that such an investment meets all relevant legal requirements with respect to investments by Plans or Non-ERISA Arrangements generally or any particular Plan or Non-ERISA Arrangement, or that such an investment is appropriate for Plans or Non-ERISA Arrangements generally or any particular Plan or Non-ERISA Arrangement.

However, individual retirement accounts, individual retirement annuities and Keogh plans, as well as employee benefit plans that permit participants to direct the investment of their accounts, will not be permitted to purchase or hold the ETNs if the account, plan or annuity is for the benefit of an employee of Citigroup Global Markets or a family member and the employee receives any compensation (such as, for example, an addition to bonus) based on the purchase of ETNs by the account, plan or annuity.

VALIDITY OF THE ETNS

Restated below are the opinions of Davis Polk & Wardwell LLP, as our special products counsel, Scott L. Flood, General Counsel and Secretary of Citigroup Global Markets Holdings Inc. and Barbara Politi, Assistant General Counsel—Capital Markets of Citigroup Inc., included in Pricing Supplement No.2017-USNCH0609 and in Pricing Supplement No. 2017-USNCH0610 both dated August 15, 2017:

"In the opinion of Davis Polk & Wardwell LLP, as special products counsel to Citigroup Global Markets Holdings Inc., when the ETNs offered by this pricing supplement have been executed and issued by Citigroup Global Markets Holdings Inc. and authenticated by the trustee pursuant to the indenture, and delivered against payment therefor, such ETNs and the related guarantee of Citigroup Inc. will be valid and binding obligations of Citigroup Global Markets Holdings Inc. and Citigroup Inc., respectively, enforceable in accordance with their respective terms, subject to applicable bankruptcy, insolvency and similar laws affecting creditors' rights generally, concepts of reasonableness and equitable principles of general applicability (including, without limitation, concepts of good faith, fair dealing and the lack of bad faith), provided that such counsel expresses no opinion as to the effect of fraudulent conveyance, fraudulent transfer or similar provision of applicable law on the conclusions expressed above. This opinion is given as of the date of this pricing supplement and is limited to the laws of the State of New York, except that such counsel expresses no opinion as to the application of state securities or Blue Sky laws to the ETNs.

In giving this opinion, Davis Polk & Wardwell LLP has assumed the legal conclusions expressed in the opinions set forth below of Scott L. Flood, General Counsel and Secretary of Citigroup Global Markets Holdings Inc., and Barbara Politi, Assistant General Counsel—Capital Markets of Citigroup Inc. In addition, this opinion is subject to the assumptions set forth in the letter of Davis Polk & Wardwell LLP dated April 7, 2017, which has been filed as an exhibit to a Current Report on Form 8-K filed by Citigroup Inc. on April 7, 2017, that the indenture has been duly authorized, executed and delivered by, and is a valid, binding and enforceable agreement of, the trustee and that none of the terms of the ETNs nor the issuance and delivery of the ETNs and the related guarantee, nor the compliance by Citigroup Global Markets Holdings Inc. and Citigroup Inc. with the terms of the ETNs and the related guarantee respectively, will result in a violation of any provision of any instrument or agreement then binding upon Citigroup Global Markets Holdings Inc. or Citigroup Inc., as applicable, or any restriction imposed by any court or governmental body having jurisdiction over Citigroup Global Markets Holdings Inc. or Citigroup Inc., as applicable.

In the opinion of Scott L. Flood, Secretary and General Counsel of Citigroup Global Markets Holdings Inc., (i) the terms of the ETNs offered by this pricing supplement have been duly established under the indenture and the Board of Directors (or a duly authorized committee thereof) of Citigroup Global Markets Holdings Inc. has duly authorized the issuance and sale of such ETNs and such authorization has not been modified or rescinded; (ii) Citigroup Global Markets Holdings Inc. is validly existing and in good standing under the laws of the State of New York; (iii) the indenture has been duly authorized, executed and delivered by Citigroup Global Markets Holdings Inc.; and (iv) the execution and delivery of such indenture and of the ETNs offered by this pricing supplement by Citigroup Global Markets Holdings Inc., and the performance by Citigroup Global Markets Holdings Inc. of its obligations thereunder, are within its corporate powers and do not contravene its certificate of incorporation or bylaws or other constitutive documents. This opinion is given as of the date of this pricing supplement and is limited to the laws of the State of New York.

Scott L. Flood, or other internal attorneys with whom he has consulted, has examined and is familiar with originals, or copies certified or otherwise identified to his satisfaction, of such corporate records of Citigroup Global Markets Holdings Inc., certificates or documents as he has deemed appropriate as a basis for the opinions expressed above. In such examination, he or such persons has assumed the legal capacity of all natural persons, the genuineness of all signatures (other than those of officers of Citigroup Global Markets Holdings Inc.), the authenticity of all documents submitted to him or such persons as originals, the conformity to original documents of all documents submitted to him or such persons as certified or photostatic copies and the authenticity of the originals of such copies.

In the opinion of Barbara Politi, Assistant General Counsel—Capital Markets of Citigroup Inc., (i) the Board of Directors (or a duly authorized committee thereof) of Citigroup Inc. has duly authorized the guarantee of

such ETNs by Citigroup Inc. and such authorization has not been modified or rescinded; (ii) Citigroup Inc. is validly existing and in good standing under the laws of the State of Delaware; (iii) the indenture has been duly authorized, executed and delivered by Citigroup Inc.; and (iv) the execution and delivery of such indenture, and the performance by Citigroup Inc. of its obligations thereunder, are within its corporate powers and do not contravene its certificate of incorporation or bylaws or other constitutive documents. This opinion is given as of the date of this pricing supplement and is limited to the General Corporation Law of the State of Delaware.

Barbara Politi, or other internal attorneys with whom she has consulted, has examined and is familiar with originals, or copies certified or otherwise identified to her satisfaction, of such corporate records of Citigroup Inc., certificates or documents as she has deemed appropriate as a basis for the opinions expressed above. In such examination, she or such persons has assumed the legal capacity of all natural persons, the genuineness of all signatures (other than those of officers of Citigroup Inc.), the authenticity of all documents submitted to her or such persons as originals, the conformity to original documents of all documents submitted to her or such persons as certified or photostatic copies and the authenticity of the originals of such copies."

ANNEX A

FORM OF OFFER FOR REDEMPTION

Email: ETNOrders@velocityshares.com

The undersigned holder of VelocityShares® [Long]/[Short] LIBOR ETNs due August 16, 2032 issued by Citigroup Global Markets Holdings Inc. and guaranteed by Citigroup Inc., CUSIP No. (the "**VelocityShares® ETNs**") hereby irrevocably offers to Citigroup Global Markets Holdings Inc. for redemption the VelocityShares® ETNs in the amounts and on the date set forth below as described in the pricing supplement relating to the VelocityShares® ETNs (the "**Pricing Supplement**"). Terms not defined herein have the meanings given to such terms in the Pricing Supplement.

Name:

DTC Account Number:

Ticker:

Number of VelocityShares® ETNs offered for redemption:

Desired Valuation Date:

In addition to any other requirements specified in the Pricing Supplement being satisfied, the undersigned acknowledges that the VelocityShares® ETNs specified above will not be redeemed unless (i) this offer for redemption is delivered to Janus Henderson Distributors on a Business Day, (ii) the Redemption Agent has responded by sending an acknowledgment of the Redemption Notice accepting the redemption request, (iii) the DTC Participant has booked a "delivery vs. payment" ("**DVP**") trade on the applicable Early Redemption Valuation Date facing Citigroup Global Markets Inc., DTC #0418, and (iv) the DTC Participant instructs DTC to deliver the DVP trade for settlement via DTC at or prior to 10:00 a.m. New York City time on the applicable Early Redemption Date (the third Business Day following the Early Redemption Valuation Date, subject to postponement if such Early Redemption Valuation Date is not an Index Business Day or if a Market Disruption Event occurs or is continuing on such date).

The undersigned acknowledges that the redemption obligation is solely an obligation of Citigroup Global Markets Holdings Inc. (guaranteed by Citigroup Inc.) and Janus Henderson Distributors is acting only to facilitate the redemption.

ANNEX B

INDEX METHODOLOGY

Janus Indices

The Janus Velocity LIBOR Indices Methodology

July 2017

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Introduction

This document describes in detail the Janus Velocity LIBOR Index Family Methodology. The Family consists of three Indices:

- The Janus Velocity LIBOR 1Y Index
- The Janus Velocity Long LIBOR Index
- The Janus Velocity Short LIBOR Index

The Janus Velocity LIBOR 1Y Index reflects a weighted average of the first eight[1] quarterly reference Eurodollar Futures implied yields, where each implied yield is tied to the London Interbank Offered Rate (LIBOR).

The Janus Velocity Long LIBOR Index is designed to provide a long exposure to a weighted average of the first eight quarterly reference Eurodollar Futures implied yields, where each implied yield is tied to the London Interbank Offered Rate (LIBOR). The Index is replicable; an investor holding the reference futures associated with the index at the same weights adjusted daily should realize returns similar to that of the Janus Velocity Long LIBOR Index.

The Janus Velocity Short LIBOR Index is designed to provide an inverse exposure to a weighted average of the first eight[2] quarterly reference Eurodollar Futures implied yields and is replicable as well; an investor holding the reference futures associated with the index at the same weights adjusted daily should realize returns similar to that of the Janus Velocity Short LIBOR Index.

The indices have been designed to approximate performance of investments in the *yield* itself, as if the yield was an asset.

The reference securities are US listed Eurodollar Futures contracts expiring in March, June, September and December, which trade on the Chicago Mercantile Exchange (CME). The Indices' Inception Date was September 30th, 2016. All data prior to this date is a backtest.

Index Sponsor and Index Calculation Agent

The Index Sponsor is Janus Index & Calculation Services LLC (JICS). As at the date of this Index Methodology, the Index Sponsor has appointed Solactive as Index Calculation Agent to calculate and publish the Indices in accordance with the Index Methodology contained in this document. The Index Sponsor may, in its sole discretion and without notice, appoint an alternative Index Calculation Agent at any time which may be the Index Sponsor or one of its Affiliates.

The Index Sponsor's determinations in respect of the Indices shall be final.

[1] The first contract rolls off two days prior to expiry, so for a brief period of time the ninth listed quarterly contract is included.
[2] The first contract rolls off two days prior to expiry, so for a brief period of time the ninth listed quarterly contract is included.

Index Overview

The Indices are notional rules-based proprietary indices sponsored by Janus Index & Calculation Services (the "Index Sponsor"). The Janus Velocity LIBOR Index family consists of three Indices:

- The Janus Velocity LIBOR 1Y Index
- The Janus Velocity Long LIBOR Index
- The Janus Velocity Short LIBOR Index

The Janus Velocity Long LIBOR and Short LIBOR Indices are excess return indices. The Indices are described as replicating notional positions in Eurodollar Futures because there is no actual portfolio of assets to which any person is entitled or in which any person has any ownership interest. The Indices simply references certain investment positions the performance of which is used as a reference point for the purpose of calculating Index Levels.

The Indices are calculated on Index Business Days. An Index Business Day is a weekday (1) on which the New York Stock Exchange and Chicago Mercantile Exchange are both open for trading for their regular trading sessions.[3]

Eurodollar Futures Prices
The closing price for each quarterly Eurodollar Futures contract on an Index Business Day is the price of the contract at the regular close of the principal trading session on the Chicago Mercantile Exchange (3:00pm ET) for that Index Business Day.[4] Eurodollar futures prices are expressed at 100 minus (the implied 3-month (USD) LIBOR interest rate x 100).

Reference Index Calculations

Calculation of the indices begins with the calculation of the Janus Velocity LIBOR 1Y Index ("the Reference Index.") The Reference Index Level on each Scheduled Index Business Day t shall be an amount determined by the Index Calculation Agent in accordance with the formula set out below. The Reference Index Level for each Index Business Day is defined as follows:

$$L_t = Max[1{,}100 \times \sum_{i=1}^{M+1} w_{it}(100 - P_{i,t})]$$

where $P_{i,t}$ is the settlement price[5] of the i^{th} quarterly Eurodollar Futures contract on Index Business Day *t*, *M*=8, and w_{it} is the weight of each contract *i* on Index Business Day *t*, as defined below, with

$$\sum_{i=1}^{M+1} w_{it} = 1$$

[3] Prior to June 16th, 2017, the Janus Velocity LIBOR Indices also considered London bank holidays to be index holidays.
[4] Eurodollar Futures are "based on a $1 million face-value, 3-month maturity Eurodollar Time Deposit. They are settled in cash on the 2nd London bank business day prior to the 3rd Wednesday of the contract month by reference to the ICE Benchmark Administration Limited (ICE) Interest Settlement Rate for three-month Eurodollar Interbank Time Deposits." (Source: CME)
[5] For more on Settlement Prices, please see http://www.cmegroup.com/confluence/display/EPICSANDBOX/Eurodollar.

Calculating the Weights

At any point in time, the Reference Index Level will seek to provide an indicator of 3-month LIBOR interest rate levels through a set of Eurodollar Futures contracts. Let each quarterly Eurodollar Futures contract be denoted by the subscript *i*, where

$$i = 1 \dots M + 1$$

and *M*=8.

The Reference Index targets constant maturity: its weights are chosen to target a constant average maturity of the contracts. Though the Reference Index effectively considers the first eight contracts, two days prior to a Eurodollar Futures contract expiry, the Reference Index also utilizes what is, at that point, the (M+1)th contract. In order to target constant maturity, this requires that the weight in the front contract rolls off into the back of the curve. This is achieved by the use of three successive quarterly contracts whereby:

F_{-1} = the prior (expired) quarterly Eurodollar Futures contract
F_0 = the current (expiring) quarterly Eurodollar Futures contract
F_1 = the next quarterly Eurodollar Futures contract (immediately successive to F_0)

The weights are calculated as follows.

- Define T as the tenor (in days) of F_0. This is calculated as the number of Scheduled Index Business Days between the F_{-1} and F_0 contract expiries (including the day of expiry).
- Define T_2 as the tenor (in days) of F_1. This is calculated as the number of Scheduled Index Business Days between the F_0 and F_1 contract expiries (including the day of expiry).
- Define τ as the number of Scheduled Index Business Days remaining in the F_0 contract until (and including) expiry.
- Define τ_2 number of Scheduled Index Business Days until the next roll date. This is calculated as $\tau - 2$. If $\tau < 2$, $\tau_2 = \tau - 2 + T_2$.

Scheduled Index Business Days are weekdays for which there are no holidays (as defined below) or no (1) pre-announced closings of the New York Stock Exchange or (2) pre-announced closings of the Chicago Mercantile Exchange.[6] T_2 is determined two Scheduled Index Business Days prior to F_0 expiry and is fixed at that point, regardless of future announcements of closures. Upon the immediate quarterly Eurodollar Futures contract expiry, T_2 becomes T.

If $\tau \geq 2$, the contracts from i=2 to M-1 hold the weight

$$w_{it} = \frac{1}{(M-1)}$$

The remaining weight of w_{it} is distributed between the first and Mth contracts whereby the weight on the front-quarterly contract is

$$w_{1t} = w_{2t}\frac{\tau_2}{T}$$

[6] Prior to June 16th, 2017, the Janus Velocity LIBOR Indices also considered London bank holidays to be index holidays.

Note that this weight will go to zero two days prior to expiry.

The weight on M[th] contract is

$$w_{Mt} = w_{2t}\frac{T - \tau_2}{T}$$

For completeness, note that when $\tau \geq 2$, $w_{M+1,t} = 0$.

If $\tau < 2$, the weights on contracts i=3 to *M* are

$$w_{it} = \frac{1}{(M-1)}$$

Here the second contract rolls to the 9[th] contract until those contracts roll and become the 1[st] and 8[th] contracts, respectively. The remaining weight of w_{it} is thus distributed between the second and the $(M+1)^{th}$ contracts.

The weight on the front-quarter contract is zero,

$$w_{1t} = 0$$

the second-quarter contract is

$$w_{2t} = w_{3t}\frac{\tau_2}{T_2}$$

and the $(M+1)^{th}$ weight is

$$w_{M+1,t} = w_{3t}\frac{T_2 - \tau_2}{T_2}$$

The Janus Velocity Long LIBOR Index Calculations

The Janus Velocity LIBOR 1Y Index is not investable, meaning that there is no sustainable strategy to invest in Eurodollar Futures contracts that will replicate the Index. This is because each day contracts are replaced in the front quarter with contracts from the back quarter. The Janus Velocity Long LIBOR Index addresses this issue, by holding a position in Eurodollar Futures contracts on each Index Business Day and then rolling the contracts the following day to maintain constant maturity.

The Janus Velocity Long LIBOR Index Level on each Index Business Day t (following the Index Start Date) shall be an amount determined by the Index Calculation Agent in accordance with the formula set out below.

Let

$$w_t = [w_{1t}\ w_{2t}\ \ldots w_{Mt}\ w_{M+1,t}]$$

be the weight vector on any Index Business Day *t*. These weights are the same weights as those defined above. Define

$$P_{it} = \text{Settlement Price on Day } t \text{ of the } i^{th} \text{ Quarterly Contract}$$

and the implied yields are defined as follows:

$$Y_{it} = 100 \times (100 - P_{it})$$

Let

$$dY_{it} = Y_{it} - Y_{it-1}$$

and

$$dY_t = [dY_{1t}\ dY_{2t} \ldots dY_{M+1,t}]$$

For clarity, the term subscript reflects the term as of day t. For example, if t-1 is a Eurodollar futures expiry date, then contract i on day t was contract i+1 on day t-1. In this case, Y_{it-1} should be read as the yield on today's i[th] contract observed on day t-1. The Index Level is denoted I_t and starts at I_0.[7] Further, we define an additional value, I_t^*, that reflects the value of the Index prior to transactions.

The Janus Velocity Long LIBOR Index value is updated as a function of the changes in implied yields and the number of contracts held in each quarterly expiry.

Let N_{t-1} be the total number of contracts held on day t-1. Recall that holding long positions in a Eurodollar Futures contract will have negative P&L if the change in implied yield on that contract is positive.

By establishing a short position in Eurodollar futures contracts (i.e., $-N_{t-1}$), the dollar profit on the day's positions will be:

$$\pi_t = -N_{t-1} \times 25 \times \sum_{i=1}^{M+1} w_{it-1} dY_{it}$$

$$\pi_t = -N_{t-1} \times 25 \times \left[\sum_{i=1}^{M+1} w_{it} Y_{it} - \sum_{i=1}^{M+1} w_{it-1} Y_{it-1} - \sum_{i=1}^{M+1} dw_{it} Y_{it}\right]$$

$$\pi_t = -N_{t-1} \times 25 \times [L_t - L_{t-1} - \varepsilon_t]$$

where $dw_{it} = w_{it} - w_{it-1}$.[8]

The term ε_t represents a roll return. By choosing the right number of contracts, we can approximate the return in the Janus Velocity LIBOR 1Y Index with the return in the Janus Velocity Long LIBOR Index, subject to the roll.

We set N_{t-1} to:

$$N_{t-1} = -\frac{I_{t-1}^*}{25 \times \hat{L}_{t-1}}$$

[7] The Index starting value is chosen such that the Index Level is 10,000 on December 30[th], 2016.

[8] Note that a 1 point basis point change in yields is a $25 change in the value of a contract.

where

$$\hat{L}_{t-1} = \max(100, L_{t-1})$$

and the adjusted weight vector is

$$\hat{w}_t = -N_t w_t.$$ [9]

The Long LIBOR Index is updated according to the following formula:

$$I_t^* = I_{t-1} + 25 \cdot \sum_{i=1}^{M+1} \hat{w}_{i,t-1} dY_{i,t}$$

To account for Eurodollar Futures spreads, this level is adjusted as follows. Define the spread on contract i on day t as

$$Spr = .005$$

Then

$$I_t = I_t^* - 2500 \times \sum_{i=1}^{M+1} 0.5 \times \left|\hat{w}_{i,t} - \hat{w}_{i,t-1}\right| \times Spr$$

The Index Return is defined as

$$R_t = \frac{I_t}{I_{t-1}} - 1$$

The Janus Velocity Short LIBOR Index Calculations

Let I_t^{Sh} be the Short LIBOR Index Level on date t.

Dollar profit on the positions held is as follows:

[9] The return to the Janus Velocity Long LIBOR Index is approximately

$$\frac{\pi_t}{I_{t-1}^*} = \frac{-N_{t-1} \times 25 \times [L_t - L_{t-1} - \varepsilon_t]}{I_{t-1}^*}$$

Assuming no roll, we have an approximation:

$$\frac{\pi_t}{I_{t-1}^*} \cong \frac{-N_{t-1} \times 25 \times [L_t - L_{t-1}]}{I_{t-1}^*}$$

We wish to find N so that this return equals the return on spot:

$$\frac{\pi_t}{I_{t-1}^*} \cong \frac{-N_{t-1} \times 25 \times [L_t - L_{t-1}]}{I_{t-1}^*} = \frac{[L_t - L_{t-1}]}{L_{t-1}^*}$$

Therefore:

$$\frac{-N_{t-1} \times 25}{I_{t-1}^*} = \frac{1}{L_{t-1}}$$

And hence:

$$N_{t-1} = -\frac{I_{t-1}^*}{25 \times L_{t-1}}$$

$$\pi_t^{Sh} = -N_{t-1}^{Sh} \times 25 \times \sum_{i=1}^{M+1} w_{it-1} dY_{it}$$

$$\pi_t^{Sh} = -N_{t-1}^{Sh} \times 25 \times \left[\sum_{i=1}^{M+1} w_{it} Y_{it} - \sum_{i=1}^{M+1} w_{it-1} Y_{it-1} - \sum_{i=1}^{M+1} dw_{it} Y_{it}\right]$$

$$\pi_t^{Sh} = -N_{t-1}^{Sh} \times 25 \times [L_t - L_{t-1} - \varepsilon_t]$$

By choosing the right number of contracts, we can approximate the negative of the return in the Janus Velocity LIBOR 1Y Index with the return in the Short LIBOR Index, subject to the roll.

Using a similar methodology to solve for N_{t-1}, We set N_{t-1}^{Sh} to:

$$N_{t-1}^{Sh} = \frac{I_{t-1}^{Sh*}}{25 \times \tilde{L}_{t-1}}$$

where

$$\tilde{L}_{t-1} = \max(250, L_{t-1})$$

and the adjusted weight vector is

$$\widehat{w}_t^{Sh} = -N_t^{Sh} w_t$$

The Inverse Index is updated according to the following formula:

$$I_t^{Sh*} = I_{t-1}^{Sh} + 25 \cdot \sum_{i=1}^{M+1} \widehat{w}_{i,t-1}^{Sh} dY_{i,t}$$

As defined above, the spread on contract i on day t as

$$Spr = .005$$

Then

$$I_t^{Sh} = I_t^{Sh*} - 2500 \times \sum_{i=1}^{M+1} 0.5 \times \left|\widehat{w}_{i,t}^{Inv} - \widehat{w}_{i,t-1}^{Inv}\right| \times Spr$$

The Short LIBOR Index Return is defined as

$$R_t^{Sh} = \frac{I_t^{Sh}}{I_{t-1}^{Sh}} - 1$$

Subject to the occurrence or existence of a Disrupted Day (as defined below), the Index Levels are calculated by the Index Calculation Agent at approximately 6:30PM Eastern Time on each Index Business Day. The Index Levels are the closing levels of the Indices for the relevant Index Business Day. The Index Calculation Agent may also, but is not obliged to, calculate the level of the Index at another time on any Index Business Day or any other day with the consent of the Index Sponsor.

Intra-day Index Calculation

The value of the indices will be calculated intra-day by applying the then current market prices of the reference securities as if they were the end of day prices and following the end-of-day calculations described above.

Index Maintenance

Base Date
Both the Janus Velocity Long LIBOR and Short LIBOR Indices have been computed such that the Index Levels of both are 10,000 on December 30th, 2016.

Index Policy

Announcements
Announcements regarding changes to the indices will be made publicly available prior to the effective date of the change. All announcements will be published on the index website: indices.janushenderson.com

Holiday Schedule
The Janus Velocity LIBOR Indices will not be calculated on days when (a) the New York Stock Exchange is closed[10], or (b) the Chicago Mercantile Exchange (CME) is closed.[11,12] To avoid all doubt, please see the Appendix for a list of Holidays for upcoming calendar years.

Force Majeure
Calculation of the indices may not be possible or feasible under certain events or circumstances, including, without limitation, market disruptions, a systems failure, natural or man-made disaster, act of God, armed conflict, act of terrorism, riot or labor disruption or any similar intervening circumstance, that is beyond the reasonable control of the Index Sponsor and that the Index Sponsor determines affects the Indices or underlying markets. Upon the occurrence of any such force majeure event, the Index Sponsor may, in its discretion, elect one (or more) of the following options:

- Make such determinations and/or adjustments to the terms of the Indices as it considers appropriate to determine any closing level on any such appropriate Index Business Day; and/or
- Defer publication of the information relating to the Indices until the next Index Business Day on which it determines that no force majeure event exists; and/or
- Permanently cancel the publication of the information relating to the Indices. The Index Sponsor employs the methodology described above and its application of the methodology shall be conclusive and binding.

Market Disruption

"Disrupted Day" shall mean any Scheduled Index Business Day on which any of the events set out below occurs:

- The Chicago Mercantile Exchange or the New York Stock Exchange fails to open for trading; or

- A suspension of or limitation imposed (whether by reason of movements in price exceeding permitted limits or otherwise) on the trading on the Chicago Mercantile Exchange of Eurodollar Futures at any time during the one hour period which ends at 3pm NY Time ("the Valuation Time"); or

- An event which disrupts or impairs the ability of market participants in general to effect transactions in or to obtain market values for Eurodollar Futures contracts at any time during the one hour period which ends at the relevant Valuation Time; or

[10] https://www.nyse.com/markets/hours-calendars
[11] http://www.cmegroup.com/tools-information/holiday-calendar.html
[12] Prior to June 16th, 2017, the Janus Velocity LIBOR Indices also considered London bank holidays to be index holidays.

- The closure of the Chicago Mercantile Exchange in respect of Eurodollar Futures contracts prior to its Scheduled Closing Time (3:00pm NY time, unless such earlier closing time is announced by the Chicago Mercantile Exchange at least one hour prior to the earlier of (i) the actual closing time for the regular trading session; and (ii) the deadline for the submission of orders to be entered into the Chicago Mercantile Exchange system for execution at the Valuation Time).

In the event of a Disrupted Day, the roll for that day is carried out on the next Scheduled Index Business Day. The rest of the scheduled roll proceeds accordingly after the completion of the next (non-disrupted) Index Business Day.

Note that all historical levels for the Janus Velocity LIBOR 1Y, Long LIBOR, and Short LIBOR Indices prior to the inception date were calculated by treating prior market disruptions as scheduled holidays.

Delisting of Futures Contracts

If one or more futures contracts included in one of the indices is no longer listed, the Index Sponsor may choose to suspend publication of any affected indices at that time.

Index Committee

The Index Committee, composed of senior Janus Henderson personnel and an external representative, is responsible for reviewing the design, composition, and calculation of the Janus Velocity LIBOR Indices, the development of new indices, and to determine changes, if any, to the index methodology.

Decisions made by the Index Committee include all matters related to index policy and maintenance. The Index Committee meets periodically to review market conditions and index performance, or on an as-needed basis to address major market developments.

The Index Committee reserves the right to exercise its discretion in making decisions with respect to any index policy or action. Index Committee internal procedures and discussions are considered to be potentially market moving and are therefore kept confidential.

Index Dissemination

Index Tickers
The indices are calculated in real-time and disseminated by the Consolidated Tape Association (CTA) every 15 seconds during the U.S. trading day. Official closing index levels are published on each index business day at approximately 6:30 PM Eastern Time and are made available on www.janusindices.com.

FTP
Daily index level information is available via FTP. Please contact the Index Sponsor for subscription information.

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Appendix I: Holiday Schedule

Holiday	2017	2018	2019
New Year's Day	2-Jan	1-Jan	1-Jan
Martin L. King Day	16-Jan	15-Jan	21-Jan
Presidents' Day	20-Feb	19-Feb	18-Feb
Good Friday	14-Apr	30-Mar	19-Apr
Easter Monday (UK)	17-Apr	-	-
Memorial Day	29-May	28-May	27-May
Independence Day	4-Jul	4-Jul	4-Jul
Labor Day	4-Sep	3-Sep	2-Sep
Columbus Day	-	8-Oct	14-Oct
Veterans Day	-	12-Nov	11-Nov
Thanksgiving	23-Nov	22-Nov	28-Nov
Christmas Day	25-Dec	25-Dec	25-Dec

Note: The Chicago Mercantile Exchange (CME) lists Columbus Day and Veterans' Day as holidays on their group holiday calendar website, however, for 2017 the CME publicly declared that these two days would be normal schedule (i.e. not treated as holidays). As a result, we have removed these days from the holiday schedule above. As for future years, CME may repeat the same procedure; if they do, we would not treat Columbus Day and Veterans' Day as holidays.