ROYAL BANK OF CANADA Form 424B2 November 08, 2018

RBC Capital Markets®	Filed Pursuant to Rule 424(b)(2)
	Registration Statement No. 333-227001

Pricing Supplement		
Dated November 7, 2018\$895,000		
To the Product	Buffered Enhanced Return Notes	
Prospectus Supplement	Linked to the S&P 500 [®] Index,	
ERN-EI-1, Prospectus	Due November 12, 2021	
Supplement, and	Royal Bank of Canada	
Prospectus Each Dated		
September 7, 2018		

Royal Bank of Canada is offering the Buffered Enhanced Return Notes (the "Notes") linked to the performance of the S&P 500[®] Index (the "Reference Asset").

The CUSIP number for the Notes is 78013XRZ3. The Notes do not pay interest. The Notes provide a 125.00% leveraged positive return if the level of the Reference Asset increases from the Initial Level to the Final Level, subject to the Maximum Redemption Amount of 130.00% of the principal amount of the Notes. If the Final Level is less than the Initial Level by no more than 25%, investors will receive the principal amount. Investors will lose 1% of the principal amount of the Notes are subject to our credit risk.

Issue Date: November 13, 2018

Maturity Date: November 12, 2021

The Notes will not be listed on any securities exchange.

Investing in the Notes involves a number of risks. See "Risk Factors" beginning on page S-1 of the prospectus supplement dated September 7, 2018, "Additional Risk Factors Specific to the Notes" beginning on page PS-4 of the product prospectus supplement dated September 7, 2018, and "Selected Risk Considerations" beginning on page P-6 of this pricing supplement.

The Notes will not constitute deposits insured by the Canada Deposit Insurance Corporation, the U.S. Federal Deposit Insurance Corporation or any other Canadian or U.S. government agency or instrumentality. The Notes are not subject to conversion into our common shares under subsection 39.2(2.3) of the Canada Deposit Insurance Corporation Act. 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.

	<u>Per Note</u>	<u>Total</u>
Price to public ⁽¹⁾	100.00%	\$895,000.00
Underwriting discounts and commissions ⁽¹⁾	0.65%	\$5,817.50
Proceeds to Royal Bank of Canada	99.35%	\$889,182.50

We or one of our affiliates may pay varying selling concessions of up to \$6.50 per \$1,000 in principal amount of the Notes in connection with the distribution of the notes to other registered broker dealers. See "Supplemental Plan of Distribution (Conflicts of Interest)" below. Certain dealers who purchased the Notes for sale to certain fee-based

⁽¹⁾ advisory accounts may have foregone some or all of their underwriting discount or selling concessions. The public offering price for investors purchasing the Notes in these accounts may be between \$993.50 and \$1,000 per \$1,000 in principal amount.

The initial estimated value of the Notes as of the date of this pricing supplement is \$986.20 per \$1,000 in principal amount, which is less than the price to public. The actual value of the Notes at any time will reflect many factors,

cannot be predicted with accuracy, and may be less than this amount. We describe our determination of the initial estimated value in more detail below. RBC Capital Markets, LLC

SUMMARY

The information in this	"Summary" section is qualified by the more detailed information set forth in this pricing
supplement, the produc	t prospectus supplement, the prospectus supplement, and the prospectus.
Issuer:	Royal Bank of Canada ("Royal Bank")
Underwriter:	RBC Capital Markets, LLC ("RBCCM")
Reference Asset:	S&P 500 [®] Index
Bloomberg Ticker:	SPX
Currency:	U.S. Dollars
Minimum Investment:	\$1,000 and minimum denominations of \$1,000 in excess thereof
Pricing Date:	November 7, 2018
Issue Date:	November 13, 2018
CUSIP:	78013XRZ3
Valuation Date:	November 8, 2021
	If, on the Valuation Date, the Percentage Change is positive, then the investor will receive an
	amount per \$1,000 principal amount per Note equal to the lesser of:
	1. Principal Amount + (Principal Amount x Percentage Change x Leverage Factor) and
	2. the Maximum Redemption Amount
Payment at Maturity	If an the Valuation Data the Demonstrate Change is loss then an equal to 00% but not by more
	If, on the Valuation Date, the Percentage Change is less than or equal to 0%, but not by more
(if held to maturity):	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then
	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only.
	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer
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(if held to maturity):	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)]
(if held to maturity): Percentage Change:	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)] The Percentage Change, expressed as a percentage, is calculated using the following formula:
(if held to maturity): Percentage Change: Initial Level:	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)] The Percentage Change, expressed as a percentage, is calculated using the following formula: 2,813.89, which was the closing level of the Reference Asset on the Pricing Date.
(if held to maturity): Percentage Change: Initial Level: Final Level:	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)] The Percentage Change, expressed as a percentage, is calculated using the following formula: 2,813.89, which was the closing level of the Reference Asset on the Pricing Date. The closing level of the Reference Asset on the Valuation Date.
(if held to maturity): Percentage Change: Initial Level: Final Level: Leverage Factor:	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)] The Percentage Change, expressed as a percentage, is calculated using the following formula: 2,813.89, which was the closing level of the Reference Asset on the Pricing Date.
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(if held to maturity): Percentage Change: Initial Level: Final Level: Leverage Factor: Maximum	than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)] The Percentage Change, expressed as a percentage, is calculated using the following formula: 2,813.89, which was the closing level of the Reference Asset on the Pricing Date. The closing level of the Reference Asset on the Valuation Date. 125.00% (subject to the Maximum Redemption Amount)
(if held to maturity): Percentage Change: Initial Level: Final Level: Leverage Factor: Maximum Redemption Amount:	 than the Buffer Percentage (that is, the Percentage Change is between zero and 25.00%), then the investor will receive the principal amount only. If, on the Valuation Date, the Percentage Change is negative, by more than the Buffer Percentage (that is, the Percentage Change is between -25.01% and -100%), then the investor will receive a cash payment equal to: Principal Amount + [Principal Amount x (Percentage Change + Buffer Percentage)] The Percentage Change, expressed as a percentage, is calculated using the following formula: 2,813.89, which was the closing level of the Reference Asset on the Pricing Date. The closing level of the Reference Asset on the Valuation Date. 125.00% (subject to the Maximum Redemption Amount) 130.00% multiplied by the principal amount

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Maturity Date: Principal at Risk:	November 12, 2021, subject to extension for market and other disruptions, as described in the product prospectus supplement dated September 7, 2018. The Notes are NOT principal protected. You may lose a substantial portion of your principal amount at maturity if the Final Level is less than the Buffer Level.
Calculation Agent:	RBCCM
U.S. Tax Treatment:	By purchasing a Note, each holder agrees (in the absence of a change in law, an administrative determination or a judicial ruling to the contrary) to treat the Notes as a pre-paid cash-settled derivative contract for U.S. federal income tax purposes. However, the U.S. federal income tax consequences of your investment in the Notes are uncertain and the Internal Revenue Service could assert that the Notes should be taxed in a manner that is different from that described in the preceding sentence. Please see the section below, "Supplemental Discussion of U.S. Federal Income Tax Consequences," and the discussion (including the opinion of our counsel Morrison & Foerster LLP) in the product prospectus supplement dated September 7, 2018 under "Supplemental Discussion of U.S. Federal Income Tax Consequences," which apply to the Notes.
Secondary Market:	RBCCM (or one of its affiliates), though not obligated to do so, may maintain a secondary market in the Notes after the Issue Date. The amount that you may receive upon sale of your Notes prior to maturity may be less than the principal amount of your Notes.
Listing:	The Notes will not be listed on any securities exchange.
Clearance an Settlement:	^d DTC global (including through its indirect participants Euroclear and Clearstream, Luxembourg as described under "Description of Debt Securities—Ownership and Book-Entry Issuance" in the prospectus dated September 7, 2018).
Terms Incorporated in the Master Note:	

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ADDITIONAL TERMS OF YOUR NOTES

You should read this pricing supplement together with the prospectus dated September 7, 2018, as supplemented by the prospectus supplement dated September 7, 2018 and the product prospectus supplement dated September 7, 2018, relating to our Senior Global Medium-Term Notes, Series H, of which these Notes are a part. Capitalized terms used but not defined in this pricing supplement will have the meanings given to them in the product prospectus supplement. In the event of any conflict, this pricing supplement will control. The Notes vary from the terms described in the product prospectus supplement in several important ways. You should read this pricing supplement carefully. This pricing supplement, together with the documents listed below, contains the terms of the Notes and supersedes all prior or contemporaneous oral statements as well as any other written materials including preliminary or indicative pricing terms, correspondence, trade ideas, structures for implementation, sample structures, brochures or other educational materials of ours. You should carefully consider, among other things, the matters set forth in "Risk Factors" in the prospectus supplement dated September 7, 2018 and "Additional Risk Factors Specific to the Notes" in the product prospectus supplement dated September 7, 2018, as the Notes involve risks not associated with conventional debt securities. We urge you to consult your investment, legal, tax, accounting and other advisors before you invest in the Notes. You may access these documents on the Securities and Exchange Commission (the "SEC") website at www.sec.gov as follows (or if that address has changed, by reviewing our filings for the relevant date on the SEC website):

Prospectus dated September 7, 2018:

https://www.sec.gov/Archives/edgar/data/1000275/000121465918005973/196181424b3.htm Prospectus Supplement dated September 7, 2018: https://www.sec.gov/Archives/edgar/data/1000275/000121465918005975/f97180424b3.htm

Product Prospectus Supplement ERN-EI-1 dated September 7, 2018: https://www.sec.gov/Archives/edgar/data/1000275/000114036118038044/form424b5.htm

Our Central Index Key, or CIK, on the SEC website is 1000275. As used in this pricing supplement, "we," "us," or "our" refers to Royal Bank of Canada.

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HYPOTHETICAL RETURNS

The examples set out below are included for illustration purposes only. The hypothetical Percentage Changes of the Reference Asset used to illustrate the calculation of the Payment at Maturity (rounded to two decimal places) are not estimates or forecasts of the Final Level or the level of the Reference Asset on any trading day prior to the Maturity Date. All examples are based on the Buffer Percentage of 25.00%, resulting in the Buffer Level of 75.00% of the Initial Level, the Leverage Factor of 125.00%, the Maximum Redemption Amount of 130.00% of the principal amount, and assume that a holder purchased Notes with an aggregate principal amount of \$1,000 and that no market disruption event occurs on the Valuation Date.

Example 1-Calculation of the Payment at Maturity where the Percentage Change is positive.

Percentage Change: 10% Payment at Maturity: $1,000 + (1,000 \times 10\% \times 125.00\%) = 1,000 + 125.00 = 1,125.00$ On a \$1,000 investment, a 10% Percentage Change results in a Payment at Maturity of \$1,125.00, a 12.50% return on the Notes.

Example Calculation of the Payment at Maturity where the Percentage Change is positive (and the Payment at 2— Maturity is subject to the Maximum Redemption Amount).

Percentage

50.00% Change: $1.000 + (1.000 \times 50.00\% \times 125.00\%) = 1.000 + 625.00 = 1.625.00$ Payment at However, the Maximum Redemption Amount is \$1,300.00. Accordingly, you will receive a Maturity: payment at maturity equal to \$1,300 per \$1,000 in principal amount of the Notes. On a \$1,000 investment, a 50.00% Percentage Change results in a Payment at Maturity of \$1,300.00, a 30.00% return on the Notes.

Example Calculation of the Payment at Maturity where the Percentage Change is negative (but not by more than the 3— Buffer Percentage).

Percentage -8% Change:

Payment at At maturity, if the Percentage Change is negative BUT not by more than the Buffer Maturity: Percentage, then the Payment at Maturity will equal the principal amount. On a \$1,000 investment, a -8% Percentage Change results in a Payment at Maturity of \$1,000, a 0% return on the Notes.

Example 4 Calculation of the Payment at Maturity where the Percentage Change is negative (by more $\overline{\text{th}}$ an the Buffer Percentage).

Percentage Change: -55%

Payment at Maturity: $1,000 + [1,000 \times (-55\% + 25.00\%)] = 1,000 - 300.00 = 700.00$ On a \$1,000 investment, a -55% Percentage Change results in a Payment at Maturity of \$700.00, a -30.00% return on the Notes.

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SELECTED RISK CONSIDERATIONS

An investment in the Notes involves significant risks. Investing in the Notes is not equivalent to investing directly in the Reference Asset. These risks are explained in more detail in the section "Additional Risk Factors Specific to the Notes," beginning on page PS-4 of the product prospectus supplement. In addition to the risks described in the prospectus supplement and the product prospectus supplement, you should consider the following:

Principal at Risk – Investors in the Notes could lose a substantial portion of their principal amount if there is a decline \cdot in the level of the Reference Asset. You will lose 1% of the principal amount of the Notes for each 1% that the Final Level is less than the Initial Level by more than 25%.

The Notes Do Not Pay Interest and Your Return May Be Lower than the Return on a Conventional Debt Security of Comparable Maturity – There will be no periodic interest payments on the Notes as there would be on a conventional fixed-rate or floating-rate debt security having the same maturity. The return that you will receive on the Notes, which could be negative, may be less than the return you could earn on other investments. Even if your return is positive, your return may be less than the return you would earn if you bought a conventional senior interest bearing debt security of Royal Bank.

Your Potential Payment at Maturity Is Limited – The Notes will provide less opportunity to participate in the appreciation of the Reference Asset than an investment in a security linked to the Reference Asset providing full •participation in the appreciation, because the payment at maturity will not exceed the Maximum Redemption Amount. Accordingly, your return on the Notes may be less than your return would be if you made an investment in a security directly linked to the positive performance of the Reference Asset.

Payments on the Notes Are Subject to Our Credit Risk, and Changes in Our Credit Ratings Are Expected to Affect the Market Value of the Notes – The Notes are Royal Bank's senior unsecured debt securities. As a result, your receipt of the amount due on the maturity date is dependent upon Royal Bank's ability to repay its obligations at that time. This will be the case even if the level of the Reference Asset increases after the Pricing Date. No assurance can be given as to what our financial condition will be at the maturity of the Notes.

There May Not Be an Active Trading Market for the Notes—Sales in the Secondary Market May Result in Significant Losses – There may be little or no secondary market for the Notes. The Notes will not be listed on any securities exchange. RBCCM and other affiliates of Royal Bank may make a market for the Notes; however, they are not required to do so. RBCCM or any other affiliate of Royal Bank may stop any market-making activities at any time. Even if a secondary market for the Notes develops, it may not provide significant liquidity or trade at prices advantageous to you. We expect that transaction costs in any secondary market would be high. As a result, the difference between bid and asked prices for your Notes in any secondary market could be substantial.

You Will Not Have Any Rights to the Securities Included in the Reference Asset – As a holder of the Notes, you will not have voting rights or rights to receive cash dividends or other distributions or other rights that holders of ·securities included in the Reference Asset would have. The Final Level will not reflect any dividends paid on the securities included in the Reference Asset, and accordingly, any positive return on the Notes may be less than the potential positive return on those securities.

The Initial Estimated Value of the Notes Is Less than the Price to the Public – The initial estimated value set forth on the cover page of this pricing supplement does not represent a minimum price at which we, RBCCM or any of our affiliates would be willing to purchase the Notes in any secondary market (if any exists) at any time. If you attempt to sell the Notes prior to maturity, their market value may be lower than the price you paid for them and the initial estimated value. This is due to, among other things, changes in the level of the Reference Asset, the borrowing rate we pay to issue securities of this kind, and the inclusion in the price to the public of the underwriting discount and the estimated costs relating to our hedging of the Notes. These factors, together with various credit, market and economic factors over the term of the Notes, are expected to reduce the price at which you may be able to sell the Notes in any secondary market and

will affect the value of the Notes in complex and unpredictable ways. Assuming no change in market conditions or any other relevant factors, the price, if any, at which you may be able to sell your Notes prior to maturity may be less than your original purchase price, as any such sale price would not be expected to include the underwriting discount and the hedging costs relating to the Notes. In addition to bid-ask spreads, the value of the Notes determined for any secondary market price is expected to be based on the secondary rate rather than the internal funding rate used

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Buffered Enhanced Return Notes

to price the Notes and determine the initial estimated value. As a result, the secondary price will be less than if the internal funding rate was used. The Notes are not designed to be short-term trading instruments. Accordingly, you should be able and willing to hold your Notes to maturity.

The Initial Estimated Value of the Notes on the Cover Page Is an Estimate Only, Calculated as of the Time the Terms of the Notes Were Set –The initial estimated value of the Notes is based on the value of our obligation to make the payments on the Notes, together with the mid-market value of the derivative embedded in the terms of the Notes. See ·"Structuring the Notes" below. Our estimate is based on a variety of assumptions, including our credit spreads, expectations as to dividends, interest rates and volatility, and the expected term of the Notes. These assumptions are based on certain forecasts about future events, which may prove to be incorrect. Other entities may value the Notes or similar securities at a price that is significantly different than we do.

The value of the Notes at any time after the Pricing Date will vary based on many factors, including changes in market conditions, and cannot be predicted with accuracy. As a result, the actual value you would receive if you sold the Notes in any secondary market, if any, should be expected to differ materially from the initial estimated value of your Notes.

Inconsistent Research – Royal Bank or its affiliates may issue research reports on securities that are, or may become, components of the Reference Asset. We may also publish research from time to time on financial markets and other matters that may influence the levels of the Reference Asset or the value of the Notes, or express opinions or provide recommendations that may be inconsistent with the purchasing or holding the Notes or with the investment view implicit in the Notes or the Reference Asset. You should make your own independent investigation of the merits of investing in the Notes and the Reference Asset.

Market Disruption Events and Adjustments – The payment at maturity and the Valuation Date are subject to adjustment as described in the product prospectus supplement. For a description of what constitutes a market disruption event as well as the consequences of that market disruption event, see "General Terms of the Notes—Market Disruption Events" in the product prospectus supplement.

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INFORMATION REGARDING THE REFERENCE ASSET

All disclosures contained in this document regarding the Reference Asset, including, without limitation, its make up, method of calculation, and changes in its components, have been derived from publicly available sources. The information reflects the policies of, and is subject to change by, S&P Dow Jones Indices LLC ("S&P"). S&P, which owns the copyright and all other rights to the Reference Asset, has no obligation to continue to publish, and may discontinue publication of, the Reference Asset. The consequences of S&P discontinuing publication of the Reference Asset are discussed in the section of the product prospectus supplement entitled "General Terms of the Notes—Unavailability of the Level of the Reference Asset." Neither we nor RBCCM accepts any responsibility for the calculation, maintenance or publication of the Reference Asset or any successor index.

The Reference Asset is intended to provide an indication of the pattern of common stock price movement. The calculation of the level of the Reference Asset is based on the relative value of the aggregate market value of the common stocks of 500 companies as of a particular time compared to the aggregate average market value of the common stocks of 500 similar companies during the base period of the years 1941 through 1943.

S&P calculates the Reference Asset by reference to the prices of the constituent stocks of the Reference Asset without taking account of the value of dividends paid on those stocks. As a result, the return on the Notes will not reflect the return you would realize if you actually owned the Reference Asset constituent stocks and received the dividends paid on those stocks.

Effective with the September 2015 rebalance, consolidated share class lines will no longer be included in the Reference Asset. Each share class line will be subject to public float and liquidity criteria individually, but the company's total market capitalization will be used to evaluate each share class line. This may result in one listed share class line of a company being included in the Reference Asset while a second listed share class line of the same company is excluded.

Computation of the Reference Asset

While S&P currently employs the following methodology to calculate the Reference Asset, no assurance can be given that S&P will not modify or change this methodology in a manner that may affect the Payment at Maturity. Historically, the market value of any component stock of the Reference Asset was calculated as the product of the market price per share and the number of then outstanding shares of such component stock. In March 2005, S&P began shifting the Reference Asset halfway from a market capitalization weighted formula to a float-adjusted formula, before moving the Reference Asset to full float adjustment on September 16, 2005. S&P's criteria for selecting stocks for the Reference Asset did not change with the shift to float adjustment. However, the adjustment affects each company's weight in the Reference Asset.

Under float adjustment, the share counts used in calculating the Reference Asset reflect only those shares that are available to investors, not all of a company's outstanding shares. Float adjustment excludes shares that are closely held by control groups, other publicly traded companies or government agencies.

In September 2012, all shareholdings representing more than 5% of a stock's outstanding shares, other than holdings by "block owners," were removed from the float for purposes of calculating the Reference Asset. Generally, these "control holders" will include officers and directors, private equity, venture capital and special equity firms, other publicly traded companies that hold shares for control, strategic partners, holders of restricted shares, ESOPs, employee and family trusts, foundations associated with the company, holders of unlisted share classes of stock, government entities at all levels (other than government retirement/pension funds) and any individual person who controls a 5% or greater stake in a company as reported in regulatory filings. However, holdings by block owners, such as depositary banks, pension funds, mutual funds and ETF providers, 401(k) plans of the company, government retirement/pension funds, investment funds of insurance companies, asset managers and investment funds, independent foundations and savings and investment plans, will ordinarily be considered part of the float. Treasury stock, stock options, equity participation units, warrants, preferred stock, convertible stock, and rights are not part of the float. Shares held in a trust to allow investors in countries outside the country of domicile, such as

depositary shares and Canadian exchangeable shares are normally part of the float unless those shares form a control block.

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Buffered Enhanced Return Notes

For each stock, an investable weight factor ("IWF") is calculated by dividing the available float shares by the total shares outstanding. Available float shares are defined as the total shares outstanding less shares held by control holders. This calculation is subject to a 5% minimum threshold for control blocks. For example, if a company's officers and directors hold 3% of the company's shares, and no other control group holds 5% of the company's shares, S&P would assign that company an IWF of 1.00, as no control group meets the 5% threshold. However, if a company's officers and directors hold 3% of the company's shares and another control group holds 20% of the company's officers and directors hold 3% of the company's shares and another control group holds 20% of the company's officers and directors hold 3% of the company's shares and another control group holds 20% of the company's officers and directors hold 3% of the company's shares and another control group holds 20% of the company's officers and directors hold 3% of the company's shares and another control group holds 20% of the company's officers and directors hold 3% of the company's shares and another control group holds 20% of the company's outstanding shares are considered to be held for control. As of July 31, 2017, companies with multiple share class lines are no longer eligible for inclusion in the Reference Asset. Constituents of the Reference Asset prior to July 31, 2017 with multiple share class lines will be grandfathered in and continue to be included in the Reference Asset. If a constituent company of the Reference Asset reorganizes into a multiple share class line structure, that company will remain in the Reference Asset at the discretion of the S&P Index Committee in order to minimize turnover

The Reference Asset is calculated using a base-weighted aggregate methodology. The level of the Reference Asset reflects the total market value of all 500 component stocks relative to the base period of the years 1941 through 1943. An indexed number is used to represent the results of this calculation in order to make the level easier to use and track over time. The actual total market value of the component stocks during the base period of the years 1941 through 1943 has been set to an indexed level of 10. This is often indicated by the notation 1941-43 = 10. In practice, the daily calculation of the Reference Asset is computed by dividing the total market value of the component stocks by the "index divisor." By itself, the index divisor is an arbitrary number. However, in the context of the calculation of the Reference Asset, it serves as a link to the original base period level of the Reference Asset. The index divisor keeps the Reference Asset comparable over time and is the manipulation point for all adjustments to the Reference Asset, which is index maintenance.

Index Maintenance

Index maintenance includes monitoring and completing the adjustments for company additions and deletions, share changes, stock splits, stock dividends, and stock price adjustments due to company restructuring or spinoffs. Some corporate actions, such as stock splits and stock dividends, require changes in the common shares outstanding and the stock prices of the companies in the Reference Asset, and do not require index divisor adjustments.

To prevent the level of the Reference Asset from changing due to corporate actions, corporate actions which affect the total market value of the Reference Asset require an index divisor adjustment. By adjusting the index divisor for the change in market value, the level of the Reference Asset remains constant and does not reflect the corporate actions of individual companies in the Reference Asset. Index divisor adjustments are made after the close of trading and after the calculation of the Reference Asset closing level.

Changes in a company's total shares outstanding of 5% or more due to public offerings are made as soon as reasonably possible. Other changes of 5% or more (for example, due to tender offers, Dutch auctions, voluntary exchange offers, company stock repurchases, private placements, acquisitions of private companies or non-index companies that do not trade on a major exchange, redemptions, exercise of options, warrants, conversion of preferred stock, notes, debt, equity participations, at-the-market stock offerings or other recapitalizations) are made weekly, and are generally announced on Fridays for implementation after the close of trading the following Friday (one week later). If a 5% or more share change causes a company's IWF to change by five percentage points or more, the IWF is updated at the same time as the share change. IWF changes resulting from partial tender offers are considered on a case-by-case basis.

License Agreement

S&P[®] is a registered trademark of Standard & Poor's Financial Services LLC and Dow Jone[®] is a registered trademark of Dow Jones Trademark Holdings LLC ("Dow Jones"). These trademarks have been licensed for use by S&P. "Standard & Poor[®]s", "S&P 500" and "S&P" are trademarks of Standard & Poor's Financial Services LLC. These trademarks have been sublicensed for certain purposes by us. The Reference Asset is a product of S&P and/or its

affiliates and has been licensed for use by us.

The Notes are not sponsored, endorsed, sold or promoted by S&P Dow Jones Indices LLC, Standard & Poor's Financial Services LLC or any of their respective affiliates (collectively, "S&P Dow Jones Indices"). S&P Dow Jones Indices make no representation or warranty, express or implied, to the holders of the Notes or any member of the public regarding the advisability of investing in securities generally or in the Notes particularly or the ability of the Reference Asset to track general market

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Historical Information

The graph below sets forth the information relating to the historical performance of the Reference Asset. We obtained the information regarding the historical performance of the Reference Asset from Bloomberg Financial Markets.

We have not independently verified the accuracy or completeness of the information obtained from Bloomberg Financial Markets. The historical performance of the Reference Asset should not be taken as an indication of its future performance, and no assurance can be given as to the Final Level of the Reference Asset. We cannot give you assurance that the performance of the Reference Asset will result in any positive return on your initial investment. S&P 500[®] Index ("SPX")

PAST PERFORMANCE IS NOT INDICATIVE OF FUTURE RESULTS.

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SUPPLEMENTAL DISCUSSION OF

U.S. FEDERAL INCOME TAX CONSEQUENCES

The following disclosure supplements, and to the extent inconsistent supersedes, the discussion in the product prospectus supplement dated September 7, 2018 under "Supplemental Discussion of U.S. Federal Income Tax Consequences."

Under Section 871(m) of the Code, a "dividend equivalent" payment is treated as a dividend from sources within the United States. Such payments generally would be subject to a 30% U.S. withholding tax if paid to a non-U.S. holder. Under U.S. Treasury Department regulations, payments (including deemed payments) with respect to equity-linked instruments ("ELIs") that are "specified ELIs" may be treated as dividend equivalents if such specified ELIs reference an interest in an "underlying security," which is generally any interest in an entity taxable as a corporation for U.S. federal income tax purposes if a payment with respect to such interest could give rise to a U.S. source dividend. However, the IRS has issued guidance that states that the U.S. Treasury Department and the IRS intend to amend the effective dates of the U.S. Treasury Department regulations to provide that withholding on dividend equivalent payments will not apply to specified ELIs that are not delta-one instruments and that are issued before January 1, 2021. Based on our determination that the Notes are not delta-one instruments, non-U.S. holders should not be subject to withholding on dividend equivalent payments, if any, under the Notes. However, it is possible that the Notes could be treated as deemed reissued for U.S. federal income tax purposes upon the occurrence of certain events affecting the Reference Asset or the Notes (for example, upon the Reference Asset rebalancing), and following such occurrence the Notes could be treated as subject to withholding on dividend equivalent payments. Non-U.S. holders that enter, or have entered, into other transactions in respect of the Reference Asset or the Notes should consult their tax advisors as to the application of the dividend equivalent withholding tax in the context of the Notes and their other transactions. If any payments are treated as dividend equivalents subject to withholding, we (or the applicable withholding agent) would be entitled to withhold taxes without being required to pay any additional amounts with respect to amounts so withheld.

SUPPLEMENTAL PLAN OF DISTRIBUTION (CONFLICTS OF INTEREST)

Delivery of the Notes will be made against payment for the Notes on November 13, 2018, which is the third (3rd) business day following the Pricing Date (this settlement cycle being referred to as "T+3"). See "Plan of Distribution" in the prospectus dated September 7, 2018. For additional information as to the relationship between us and RBCCM, please see the section "Plan of Distribution—Conflicts of Interest" in the prospectus dated September 7, 2018. In the initial offering of the Notes, they will be offered to investors at a purchase price equal to par, except with respect to certain accounts as indicated on the cover page of this document.

We expect to deliver the Notes on a date that is greater than two business days following the Pricing Date. Under Rule 15c6-1 of the Exchange Act, trades in the secondary market generally are required to settle in two business days, unless the parties to any such trade expressly agree otherwise. Accordingly, purchasers who wish to trade the Notes more than two business days prior to the original Issue Date will be required to specify alternative settlement arrangements to prevent a failed settlement.

The value of the Notes shown on your account statement may be based on RBCCM's estimate of the value of the Notes if RBCCM or another of our affiliates were to make a market in the Notes (which it is not obligated to do). That estimate will be based upon the price that RBCCM may pay for the Notes in light of then prevailing market conditions, our creditworthiness and transaction costs. For a period of approximately 6 months after the issue date of the Notes, the value of the Notes that may be shown on your account statement may be higher than RBCCM's estimated value of the Notes at that time. This is because the estimated value of the Notes will not include the underwriting discount and our hedging costs and profits; however, the value of the Notes shown on your account statement during that period may initially be a higher amount, reflecting the addition of RBCCM's underwriting discount and our estimated costs and profits from hedging the Notes. This excess is expected to decrease over time until the end of this period. After this period, if RBCCM repurchases your Notes, it expects to do so at prices that

reflect their estimated value.

We may use this pricing supplement in the initial sale of the Notes. In addition, RBCCM or another of our affiliates may use this pricing supplement in a market-making transaction in the Notes after their initial sale. Unless we or our agent informs the purchaser otherwise in the confirmation of sale, this pricing supplement is being used in a market-making transaction.

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