

ROYAL BANK OF CANADA  
Form 424B2  
June 01, 2018

---

May 2018

MSELN-338-C

Registration Statement No. 333-208507

PRICING SUPPLEMENT

Dated May 31, 2018

Filed Pursuant to Rule 424(b)(2)

STRUCTURED INVESTMENTS

Opportunities in U.S. Equities

\$5,765,400 Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc.

due June 3, 2020

Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

The Dual Directional Trigger PLUS, or “Trigger PLUS,” are senior unsecured obligations of Royal Bank of Canada, do not pay interest, do not guarantee any return of principal at maturity and have the terms described in the accompanying prospectus supplement and prospectus, as supplemented or modified by this document. At maturity, if the price of the underlying stock has increased, investors will receive the stated principal amount of their investment plus a return reflecting the leveraged upside performance of the underlying stock, subject to the maximum upside payment. If the price of the underlying stock has decreased by no more than 20%, investors will receive the stated principal amount plus an unleveraged positive return equal to the absolute value of the percentage decline, which will effectively be limited to a positive return of 20%. However, if the price of the underlying stock has decreased by more than 20%, investors will lose 1% of the stated principal amount for every 1% decline in the final share price from the initial share price. The Trigger PLUS are for investors who seek an equity-based return and who are willing to risk their principal and forgo current income and upside above the maximum upside payment in exchange for the leveraged return feature and the unleveraged absolute return feature, which in each case apply to a limited range of positive or negative performance of the underlying stock, as applicable. Investors may lose their entire initial investment in the Trigger PLUS. The Trigger PLUS are senior notes issued as part of Royal Bank of Canada’s Global Medium-Term Notes, Series G program. All payments on the Trigger PLUS are subject to the credit risk of Royal Bank of Canada.

#### SUMMARY TERMS

Issuer: Royal Bank of Canada

Underlying stock: The common stock of Apple Inc. (Bloomberg symbol: “AAPL”)

Aggregate principal amount: \$5,765,400

Stated principal amount: \$10 per Trigger PLUS

Issue price: \$10 per Trigger PLUS

Pricing date: May 31, 2018

Issue date: June 5, 2018

Valuation date: May 29, 2020, subject to adjustment for non-trading days and certain market disruption events

Maturity date: June 3, 2020

Payment at maturity

(per Trigger PLUS): If the final share price is greater than the initial share price:

\$10 + leveraged upside payment

In no event will payment at maturity exceed the maximum upside payment.

If the final share price is less than or equal to the initial share price but is greater than or equal to the trigger price:

Edgar Filing: ROYAL BANK OF CANADA - Form 424B2

\$10 + (\$10 x absolute share return)

In this scenario, you will receive a 1% positive return on the Trigger PLUS for each 1% negative return on the underlying stock. In no event will this amount exceed the stated principal amount plus \$2.00.

If the final share price is less than the trigger price:

\$10 x share performance factor

This amount will be less than \$8.00. You will lose at least 20% of the principal amount if the final share price is less than the trigger price.

Maximum upside payment:	\$12.23 per Trigger PLUS (122.30% of the stated principal amount).		
Leveraged upside payment:	\$10 x leverage factor x share percent change		
Leverage factor:	150%		
Share percent change:	(final share price – initial share price) / initial share price		
Absolute share return:	The absolute value of the share percent change. For example, a –5% share percent change will result in a +5% absolute share return.		
Share performance factor:	final share price / initial share price		
Trigger price:	\$149.50, which is 80% of the initial share price (rounded to two decimal places)		
Initial share price:	\$186.87, which was the closing price of the underlying stock on the pricing date		
Final share price:	The closing price of the underlying stock on the valuation date times the adjustment factor on that date		
Adjustment factor:	1.0, subject to adjustment in the event of certain events affecting the underlying stock, see “Additional Terms of the Trigger PLUS - Antidilution adjustments” below.		
CUSIP/ISIN:	78013Q798 / US78013Q7988		
Listing:	The Trigger PLUS will not be listed on any securities exchange.		
Agent:	RBC Capital Markets, LLC (“RBCCM”).		
Commissions and issue price:	Price to public	Agent’s commissions	Proceeds to issuer
Per Trigger PLUS	\$10.00	\$0.20 <sup>(1)</sup>	
		\$0.05 <sup>(2)</sup>	\$9.75
Total	\$5,765,400	\$115,308	\$5,621,265
		\$28,827	

RBCCM, acting as agent for Royal Bank of Canada, will receive a fee of \$0.25 per \$10 stated principal amount and (1) will pay to Morgan Stanley Wealth Management (“MSWM”) a fixed sales commission of \$0.20 for each Trigger PLUS that MSWM sells. See “Supplemental Information Regarding Plan of Distribution; Conflicts of Interest.”

(2) Of the amount per \$10 stated principal amount received by RBCCM, acting as agent for Royal Bank of Canada, RBCCM will pay MSWM a structuring fee of \$0.05 for each Trigger PLUS.

The initial estimated value of the Trigger PLUS as of the pricing date is \$9.7267 per \$10 Trigger PLUS, which is less than the price to public. The market value of the Trigger PLUS at any time will reflect many factors, cannot be predicted with accuracy, and may be less than this amount.

An investment in the Trigger PLUS involves certain risks. See “Risk Factors” beginning on page 7 of this document, beginning on page S-1 of the accompanying prospectus supplement, and beginning on page 1 of the prospectus.

You should read this document together with the related prospectus supplement and prospectus, each of which can be accessed via the hyperlinks below, before you decide to invest.

Please also see “Additional Terms of the Trigger PLUS” in this document.

[Prospectus Supplement dated January 8, 2016](#)

[Prospectus dated January 8, 2016](#)

None of the Securities and Exchange Commission, any state securities commission or any other regulatory body has approved or disapproved of the Trigger PLUS or passed upon the adequacy or accuracy of this document. Any representation to the contrary is a criminal offense. The Trigger PLUS 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.

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Investment Summary

Dual Directional Trigger Performance Leveraged Upside Securities

Principal at Risk Securities

The Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020 (the "Trigger PLUS") can be used:

§ As an alternative to direct exposure to the underlying stock that enhances returns for any positive performance of the underlying stock, subject to the maximum upside payment.

§ To obtain an unleveraged positive return for a limited range of negative performance of the underlying stock.

§ To potentially outperform the underlying stock in a moderately bullish or moderately bearish scenario.

The Trigger PLUS are exposed on a 1:1 basis to the full negative performance of the underlying stock if the final share price is less than the trigger price.

Maturity: Approximately two years

Leverage factor: 150%

Trigger price: 80% of the initial share price

Maximum upside payment: \$12.23 per Trigger PLUS (122.30% of the stated principal amount).

Minimum payment at maturity: None. Investors may lose their entire initial investment in the Trigger PLUS.

Coupon: None

May 2018 Page 2

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
 Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Key Investment Rationale

The Trigger PLUS offer leveraged exposure to the positive performance of the underlying stock, subject to the maximum upside payment, and an unleveraged positive return based on the absolute value of a limited range of negative percentage changes of the underlying stock. At maturity, if the price of the underlying stock has increased, investors will receive the stated principal amount of their investment plus a return reflecting the leveraged upside performance of the underlying stock, subject to the maximum upside payment of \$12.23 per Trigger PLUS. If the price of the underlying stock has decreased by no more than 20%, investors will receive the stated principal amount plus an unleveraged positive return equal to the absolute value of the percentage decline, which will effectively be limited to a positive return of 20%. However, if the price of the underlying stock has decreased by more than 20%, investors will lose 1% of the principal amount for every 1% decline in the final share price from the initial share price. Investors may lose their entire initial investment in the Trigger PLUS.

Leveraged  
 Upside  
 Performance

The Trigger PLUS offer investors an opportunity to capture enhanced returns relative to a direct investment in the underlying stock, subject to the maximum upside payment.

Absolute  
 Return  
 Feature

The Trigger PLUS enable investors to obtain an unleveraged positive return if the final share price is less than or equal to the initial share price but is greater than or equal to the trigger price.

Upside  
 Scenario if  
 the  
 Underlying  
 Stock  
 Appreciates

The final share price is greater than the initial share price and, at maturity, we will pay the stated principal amount of \$10 plus 150% of the share percent change, subject to the maximum upside payment of \$12.23 per Trigger PLUS (122.30% of the stated principal amount).

Absolute  
 Return  
 Scenario

The final share price is less than or equal to the initial share price but is greater than or equal to the trigger price, which is 80% of the initial share price. In this case, you receive a 1% positive return on the Trigger PLUS for each 1% decline in the price of the underlying stock. For example, if the final share price is 10% less than the initial share price, the Trigger PLUS will provide a total positive return of 10% at maturity. The maximum return you may receive in this scenario is a positive 20% return at maturity.

Downside  
 Scenario

The final share price is less than the trigger price and, at maturity, we will pay less than the stated principal amount by an amount that is proportionate to the percentage decrease in the price of the underlying stock from the initial share price. This amount will be less than \$8.00 per Trigger PLUS. For example, if the final share price is 70% less than the initial share price, the Trigger PLUS will be redeemed at maturity for a loss of 70% of principal at \$3 per Trigger PLUS, or 30% of the stated principal amount. There is no minimum payment at maturity on the Trigger PLUS, and you could lose your entire investment.

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Additional Information

You should read this document together with the prospectus dated January 8, 2016, as supplemented by the prospectus supplement dated January 8, 2016, relating to our Senior Global Medium-Term Notes, Series G, of which the Trigger PLUS are a part. This document, together with these documents, contains the terms of the Trigger PLUS and supersedes all other 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 rely only on the information provided or incorporated by reference in this document, the prospectus and the prospectus supplement. We have not authorized anyone else to provide you with different information, and we take no responsibility for any other information that others may give you. We and Morgan Stanley Wealth Management are offering to sell the Trigger PLUS and seeking offers to buy the Trigger PLUS only in jurisdictions where it is lawful to do so. The information contained in this document and the accompanying prospectus supplement and prospectus is current only as of their respective dates.

If the information in this document differs from the information contained in the prospectus supplement or the prospectus, you should rely on the information in this document.

You should carefully consider, among other things, the matters set forth in “Risk Factors” in this document and the accompanying prospectus supplement, as the Trigger PLUS involve risks not associated with conventional debt securities. We urge you to consult your investment, legal, tax, accounting and other advisers before you invest in the Trigger PLUS.

You may access these documents on the SEC website at [www.sec.gov](http://www.sec.gov) as follows (or if such address has changed, by reviewing our filings for the relevant date on the SEC website):

·Prospectus dated January 8, 2016:

<https://www.sec.gov/Archives/edgar/data/1000275/000121465916008810/j18160424b3.htm>

·Prospectus Supplement dated January 8, 2016:

<https://www.sec.gov/Archives/edgar/data/1000275/000121465916008811/p14150424b3.htm>

Our Central Index Key, or CIK, on the SEC website is 1000275.

Please see the section “Documents Incorporated by Reference” on page i of the above prospectus for a description of our filings with the SEC that are incorporated by reference therein.

May 2018 Page 4

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

How the Trigger PLUS Work

Payoff Diagram

The payoff diagram below illustrates the payment at maturity on the Trigger PLUS for a range of hypothetical percentage changes in the price of the underlying stock. The graph is based on the following terms:

Stated principal amount:	\$10 per Trigger PLUS
Leverage factor:	150%
Trigger price:	80% of the initial share price
Maximum upside payment:	\$12.23 per Trigger PLUS (122.30% of the stated principal amount).
Minimum payment at maturity:	None

Trigger PLUS Payoff Diagram

May 2018 Page 5

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>  
Principal at Risk Securities

How it works

Upside Scenario if the Underlying Stock Appreciates. If the final share price is greater than the initial share price, then investors would receive the \$10 stated principal amount plus a return reflecting 150% of the appreciation of the § underlying stock over the term of the Trigger PLUS, subject to the maximum upside payment. Under the terms of the Trigger PLUS, an investor would realize the maximum upside payment at maturity if the final share price is approximately 114.87% of the initial share price.

§ If the price of the underlying stock appreciates by 3%, the investor would receive a 4.50% return, or \$10.45 per Trigger PLUS.

§ If the underlying stock appreciates by approximately 14.87% or more, the investor would receive only the maximum upside payment of \$12.23 per Trigger PLUS, or 122.30% of the stated principal amount.

§ Absolute Return Scenario. If the final share price is less than or equal to the initial share price but is greater than or equal to the trigger price of 80% of the initial share price, the investor would receive a 1% positive return on the Trigger PLUS for each 1% decline in the underlying stock.

§ If the price of the underlying stock depreciates by 10%, the investor would receive a 10% return, or \$11.00 per Trigger PLUS.

§ The maximum return you may receive in this scenario is a positive 20% return at maturity.

Downside Scenario. If the final share price is less than the trigger price, the investor would receive an amount that is less than the \$10 stated principal amount, based on a 1% loss of principal for each 1% decline in the underlying § stock. This amount will be less than \$8.00 per Trigger PLUS. There is no minimum payment at maturity on the Trigger PLUS.

§ If the price of the underlying stock depreciates by 30%, the investor would lose 30% of the investor's principal and receive only \$7.00 per Trigger PLUS at maturity, or 70% of the stated principal amount.



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Risk Factors

An investment in the Trigger PLUS is subject to the risks described below, as well as the risks described under “Risk Factors” in the accompanying prospectus supplement and prospectus. Investors in the Trigger PLUS are also exposed to further risks related to the issuer of the Trigger PLUS, Royal Bank of Canada, which are described in Royal Bank of Canada’s annual report on Form 40-F for its most recently completed fiscal year, filed with the SEC and incorporated by reference herein. See the categories of risks, identified and disclosed in the management’s discussion and analysis of financial condition and results of operations included in the annual report on Form 40-F. This section (and the management’s discussion and analysis section of the annual report on Form 40-F) describes the most significant risks relating to the Trigger PLUS. You should carefully consider whether the Trigger PLUS are suited to your particular circumstances.

The Trigger PLUS do not pay interest or guarantee return of principal. The terms of the Trigger PLUS differ from those of ordinary debt securities in that the Trigger PLUS do not pay interest or guarantee payment of the principal amount at maturity. If the final share price is less than the trigger price (which is 80% of the initial share price), the absolute return feature will no longer be available and the payout at maturity will be an amount in cash that is at least § 20% less than the \$10 stated principal amount of each Trigger PLUS. In this case, you will lose a significant portion of your principal amount equal to the percentage decrease in the price of the underlying stock from the initial share price to the final share price. There is no minimum payment at maturity on the Trigger PLUS, and, accordingly, you could lose your entire initial investment in the Trigger PLUS.

The appreciation potential of the Trigger PLUS is limited by the maximum upside payment. The appreciation potential of the Trigger PLUS reflecting the positive performance of the underlying stock is limited by the maximum upside payment of \$12.23 per Trigger PLUS, or 122.30% of the stated principal amount. Although the leverage § factor provides 150% exposure to any increase in the price of the underlying stock as of the valuation date above the initial share price, because the payment at maturity will be limited to 122.30% of the stated principal amount for the Trigger PLUS, any increase in the final share price over the initial share price by more than approximately 14.87% will not further increase the return on the Trigger PLUS.

In addition, because investors will receive the stated principal amount plus an unleveraged positive return equal to the absolute value of the percentage decline in the price of the underlying stock only if the final share price is greater than or equal to the trigger price, the maximum return you may receive in this scenario is a positive 20% return at maturity.

The Trigger PLUS are subject to the credit risk of Royal Bank of Canada, and any actual or anticipated changes to its credit ratings or credit spreads may adversely affect the market value of the Trigger PLUS. You are dependent on Royal Bank of Canada’s ability to pay all amounts due on the Trigger PLUS at maturity and therefore you are subject to the credit risk of Royal Bank of Canada. If Royal Bank of Canada defaults on its obligations under the Trigger § PLUS, your investment would be at risk and you could lose some or all of your investment. As a result, the market value of the Trigger PLUS prior to maturity will be affected by changes in the market’s view of Royal Bank of Canada’s creditworthiness. Any actual or anticipated decline in Royal Bank of Canada’s credit ratings or increase in the credit spreads charged by the market for taking Royal Bank of Canada credit risk is likely to adversely affect the market value of the Trigger PLUS.

The initial estimated value of the Trigger PLUS is less than the price to the public. The initial estimated value that is set forth on the cover page of this document does not represent a minimum price at which we, RBCCM or any of our affiliates would be willing to purchase the Trigger PLUS in any secondary market (if any exists) at any time. If you § attempt to sell the Trigger PLUS 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 price of the underlying stock, the borrowing rate we pay to issue securities of this kind, and the inclusion in the price to the public of the agent’s commissions and the estimated costs relating to our hedging of the Trigger PLUS. These factors, together with various credit, market and economic factors over the term of the Trigger PLUS, are expected

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

to reduce the price at which you may be able to sell the Trigger PLUS in any secondary market and will affect the value of the Trigger PLUS 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 Trigger PLUS prior to maturity may be less than your original purchase price, as any such sale price would not be expected to include the agent's commissions and the hedging costs relating to the Trigger PLUS. In addition to bid-ask spreads, the value of the Trigger PLUS determined for any secondary market price is expected to be based on the secondary rate rather than the internal funding rate used to price the Trigger PLUS and determine the initial estimated value. As a result, the secondary price will be less than if the internal funding rate was used. The Trigger PLUS are not designed to be short-term trading instruments. Accordingly, you should be able and willing to hold your Trigger PLUS to maturity.

Our initial estimated value of the Trigger PLUS is an estimate only, calculated as of pricing date. The initial estimated value of the Trigger PLUS is based on the value of our obligation to make the payments on the Trigger PLUS, together with the mid-market value of the derivative embedded in the terms of the Trigger PLUS. See § "Structuring the Trigger PLUS" 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 Trigger PLUS. These assumptions are based on certain forecasts about future events, which may prove to be incorrect. Other entities may value the Trigger PLUS or similar securities at a price that is significantly different than we do.

The value of the Trigger PLUS 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 Trigger PLUS in any secondary market, if any, should be expected to differ materially from the initial estimated value of your Trigger PLUS.

The Trigger PLUS will not be listed on any securities exchange and secondary trading may be limited. The Trigger PLUS will not be listed on any securities exchange. Therefore, there may be little or no secondary market for the Trigger PLUS. RBCCM may, but is not obligated to, make a market in the Trigger PLUS, and, if it chooses to do so at any time, it may cease doing so. When it does make a market, it will generally do so for transactions of routine secondary market size at prices based on its estimated of the current value of the Trigger PLUS, taking into account its bid/offer spread, our credit spreads, market volatility, the notional size of the proposed sale, the cost of unwinding § any related hedging positions, the time remaining to maturity and the likelihood that it will be able to resell the Trigger PLUS. Even if there is a secondary market, it may not provide enough liquidity to allow you to trade or sell the Trigger PLUS easily. Because we do not expect that other broker-dealers will participate significantly in the secondary market for the Trigger PLUS, the price at which you may be able to trade your Trigger PLUS is likely to depend on the price, if any, at which RBCCM is willing to transact. If, at any time, RBCCM were not to make a market in the Trigger PLUS, it is likely that there would be no secondary market for the Trigger PLUS. Accordingly, you should be willing to hold your Trigger PLUS to maturity.

The amount payable on the Trigger PLUS is not linked to the price of the underlying stock at any time other than the valuation date. The final share price will be based on the closing price of the underlying stock on the valuation date, subject to adjustment for non-business days and certain market disruption events. Even if the price of the underlying stock appreciates, or decreases by no more than 20%, prior to the valuation date but then decreases on the valuation § date to a price that is less than the trigger price, the payment at maturity will be significantly less than it would have been had the payment at maturity been linked to the price of the underlying stock prior to that decrease. Although the actual price of the underlying stock on the stated maturity date or at other times during the term of the Trigger PLUS may be higher than the final share price, the payment at maturity will be based solely on the closing price of the underlying stock on the valuation date.

The market price of the Trigger PLUS will be influenced by many unpredictable factors. Several factors will § influence the value of the Trigger PLUS in the secondary market and the price at which RBCCM may be willing to purchase or sell the Trigger PLUS in the secondary market, including:

§ the trading price and volatility (frequency and magnitude of changes in value) of the underlying stock,  
§ dividend yield on the underlying stock,



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

§ market interest rates,

§ our creditworthiness, as represented by our credit ratings or as otherwise perceived in the market,

§ time remaining to maturity,

§ geopolitical conditions and economic, financial, political, regulatory or judicial events that affect the underlying stock, the U.S. equities market generally and which may affect the price of the underlying stock,

§ the occurrence of certain events affecting the underlying stock that may or may not require an adjustment to the adjustment factor, and

§ any actual or anticipated changes in our credit ratings or credit spreads.

The price of the underlying stock may be, and has recently been, volatile, and we can give you no assurance that the volatility will lessen. See “Apple Inc. Overview” below. You may receive less, and possibly significantly less, than the stated principal amount per Trigger PLUS if you try to sell your Trigger PLUS prior to maturity.

If the price of the shares of the underlying stock changes, the market value of the Trigger PLUS may not change in the same manner. Owning the Trigger PLUS is not the same as owning shares of the underlying stock. Accordingly, changes in the price of the underlying stock may not result in a comparable change of the market value of the § Trigger PLUS. If the closing price of one share of the underlying stock on any trading day increases above the initial share price or the trigger price, the value of the Trigger PLUS may not increase in a comparable manner, if at all. It is possible for the price of the shares of the underlying stock to increase while the value of the Trigger PLUS declines.

Investing in the Trigger PLUS is not equivalent to investing in the underlying stock. Investors in the Trigger PLUS § will not have voting rights or rights to receive dividends or other distributions or any other rights with respect to the underlying stock.

No affiliation with Apple Inc. Apple Inc. (the “underlying company”) is not an affiliate of ours, is not involved with this offering in any way, and has no obligation to consider your interests in taking any corporate actions that might § affect the value of the Trigger PLUS. We have not made any due diligence inquiry with respect to the underlying company in connection with this offering.

The historical performance of the underlying stock should not be taken as an indication of its future performance. The price of the underlying stock will determine the amounts to be paid on the Trigger PLUS. The historical performance of the underlying stock does not give an indication of its future performance. As a result, it is impossible to predict whether the price of the underlying stock will rise or fall during the term of the Trigger PLUS. § The price of the underlying stock will be influenced by complex and interrelated political, economic, financial and other factors. The value of the underlying stock may decrease such that you may not receive any positive return of your investment. There can be no assurance that the price of the underlying stock will not decrease so that at maturity you will not lose some or all of your investment.

The antidilution adjustments the calculation agent is required to make do not cover every corporate event that could affect the underlying stock. RBCCM, as calculation agent, will adjust the amount adjustment factor for certain corporate events affecting the underlying stock, such as stock splits and stock dividends, and certain other corporate actions involving the underlying company, such as mergers. However, the calculation agent will not make an § adjustment for every corporate event that can affect the underlying stock. For example, the calculation agent is not required to make any adjustments if the underlying company or anyone else makes a partial tender or partial exchange offer for the underlying stock, nor will adjustments be made following the valuation date. If an event occurs that does not require the calculation agent to adjust the adjustment factor, the market price of the Trigger PLUS may be materially and adversely affected.

Hedging and trading activity by us and our subsidiaries could potentially adversely affect the value of the Trigger § PLUS. One or more of our subsidiaries and/or third-party dealers expect to carry out hedging activities

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

related to the Trigger PLUS (and possibly to other instruments linked to the underlying stock), including trading in the underlying stock. Some of our subsidiaries also trade the underlying stock and other financial instruments related to the underlying stock on a regular basis as part of their general broker-dealer and other businesses. Any of these hedging or trading activities on or prior to the pricing date could have increased the initial share price, and, as a result, the trigger price, which is the price at or above which the underlying stock must close on the valuation date so that investors do not suffer a loss on their initial investment in the Trigger PLUS. Additionally, such hedging or trading activities during the term of the Trigger PLUS, including on the valuation date, could adversely affect the price of the underlying stock on the valuation date, and, accordingly, the payout to you at maturity, if any.

We may engage in business with or involving the underlying company without regard to your interests. We or our affiliates may presently or from time to time engage in business with the underlying company without regard to your interests and thus may acquire non-public information about the underlying company. Neither we nor any of our § affiliates undertakes to disclose any of that information to you. In addition, we or our affiliates from time to time have published and in the future may publish research reports with respect to the underlying company, which may or may not recommend that investors buy or hold the underlying stock.

We or our affiliates may have adverse economic interests to the holders of the Trigger PLUS. RBCCM and other affiliates of ours may trade the shares of the underlying stock and other financial instruments related to the underlying stock on a regular basis, for their accounts and for other accounts under their management. RBCCM and these affiliates may also issue or underwrite or assist unaffiliated entities in the issuance or underwriting of other § securities or financial instruments linked to the underlying stock. To the extent that we or one of our affiliates serves as issuer, agent or underwriter for those securities or financial instruments, our or their interests with respect to those products may be adverse to those of the holders of the Trigger PLUS. Any of these trading activities could potentially affect the performance of the underlying stock and, accordingly, could affect the value of the Trigger PLUS and the amounts, if any, payable on the underlying stock.

We may hedge our obligations under the Trigger PLUS through certain affiliates, who would expect to make a profit on that hedge. We or our affiliates may adjust these hedges by, among other things, purchasing or selling those assets at any time, including around the valuation date, which could have an impact on the return of your Trigger PLUS. Because hedging our obligations entails risk and may be influenced by market forces beyond our or our affiliates' control, such hedging may result in a profit that is more or less than expected, or it may result in a loss.

We will not hold any shares of the underlying stock for your benefit. The indenture and the terms governing the Trigger PLUS do not contain any restriction on our ability or the ability of any of our affiliates to sell, pledge or otherwise convey all or any shares of the underlying stock that we or they may § acquire. Neither we nor our affiliates will pledge or otherwise hold any such shares for your benefit. Consequently, in the event of our bankruptcy, insolvency or liquidation, any of those assets that we own will be subject to the claims of our creditors generally and will not be available for your benefit specifically.

You must rely on your own evaluation of the merits of an investment linked to the underlying stock. In the ordinary course of their business, our affiliates may have expressed views on expected movement in the underlying stock, and may do so in the future. These views or reports may be communicated to our clients and clients of our affiliates. § However, these views are subject to change from time to time. Moreover, other professionals who transact business in markets relating to the underlying stock may at any time have significantly different views from those of our affiliates. For these reasons, you are encouraged to derive information concerning the underlying stock from multiple sources, and you should not rely solely on views expressed by our affiliates.

The calculation agent, which is a subsidiary of the issuer, will make determinations with respect to the Trigger PLUS, which may create a conflict of interest. Our wholly owned subsidiary, RBCCM, will serve as the calculation § agent. As calculation agent, RBCCM determined the initial share price and the trigger price, and will determine the final share price, whether a market disruption event has occurred, whether to make any adjustments to the adjustment factor and the payment at maturity, if any. Any of these determinations made by RBCCM, in its



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

capacity as calculation agent, including with respect to the occurrence or non-occurrence of market disruption events, may affect the payout to you at maturity.

Significant aspects of the tax treatment of the Trigger PLUS are uncertain. The tax treatment of an investment in the Trigger PLUS is uncertain. We do not plan to request a ruling from the Internal Revenue Service or from the Canada Revenue Agency regarding the tax treatment of an investment in the Trigger PLUS, and the Internal Revenue Service, the Canada Revenue Agency or a court may not agree with the tax treatment described in this document. The Internal Revenue Service has issued a notice indicating that it and the U.S. Treasury Department are actively considering whether, among other issues, a holder should be required to accrue interest over the term of an instrument such as the Trigger PLUS even though that holder will not receive any payments with respect to the Trigger PLUS until maturity and whether all or part of the gain a holder may recognize upon sale, exchange or maturity of an instrument such as the Trigger PLUS should be treated as ordinary income. The outcome of this process is uncertain and could apply on a retroactive basis.

Please read carefully the sections entitled “Canadian Federal Income Tax Consequences” and “Supplemental Discussion of U.S. Federal Income Tax Consequences” in this document, the section entitled “Tax Consequences” in the accompanying prospectus and the section entitled “Certain Income Tax Consequences” in the accompanying prospectus supplement. You should consult your tax advisor about your own tax situation.

May 2018 Page 11

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Additional Terms of the Trigger PLUS

Please read this information in conjunction with the summary terms on the front cover of this document.

#### Additional Provisions

The “closing price” for the underlying stock (or one unit of any other security for which a closing price must be determined) on any trading day means:

- (i) if the underlying stock (or any such other security) is listed on a national securities exchange (other than the Nasdaq), the last reported sale price, regular way, of the principal trading session on such day on the principal national securities exchange registered under the Exchange Act, on which the underlying stock (or any such other security) is listed,
- (ii) if the underlying stock (or any such other security) is a security of the Nasdaq, the official closing price published by the Nasdaq on such day, or
- (iii) if the underlying stock (or any such other security) is not listed on any national securities exchange but is included in the OTC Bulletin Board Service (the “OTC Bulletin Board”) operated by the Financial Industry Regulatory Authority, Inc. (“FINRA”), the last reported sale price of the principal trading session on the OTC Bulletin Board on that day.

Closing price:

If the underlying stock (or any such other security) is listed on any national securities exchange but the last reported sale price or the official closing price published by the Nasdaq, as applicable, is not available under the preceding sentence, then the closing price for one share of the underlying stock (or one unit of any such other security) on any trading day will mean the last reported sale price of the principal trading session on the over-the-counter market as reported on the Nasdaq or the OTC Bulletin Board on that day. If a market disruption event (as defined below) occurs with respect to the underlying stock (or any such other security) or the last reported sale price or the official closing price published by the Nasdaq, as applicable, for the underlying stock (or any such other security) is not available under either of the two preceding sentences, then the closing price for any trading day will be the mean, as determined by the calculation agent, of the bid prices for the underlying stock (or any such other security) for that trading day obtained from as many recognized dealers in that security, but not exceeding three, as will make such bid prices available to the calculation agent. Bids of RBCCM and its successors or any of its affiliates may be included in the calculation of that mean, but only to the extent that any such bid is the highest of the bids obtained. If no bid prices are provided from any third party dealers, the closing price will be determined by the calculation agent in its sole and absolute discretion (acting in good faith) taking into account any information that it deems relevant. The term “OTC Bulletin Board Service” will include any successor service.

Postponement of the valuation date:

In the calculation of the final share price, the calculation agent will take into account market disruption events and non-trading days as follows:

If the scheduled valuation date is not a trading day or if there is a market disruption event on that date, the valuation date shall be the next succeeding trading day on which there is no market disruption event; provided that if a market disruption event has occurred on each of the five consecutive trading days immediately succeeding the scheduled valuation date, then (i) that fifth succeeding trading day will be deemed to be the valuation date notwithstanding the occurrence of a market disruption event on that date and (ii) with respect to any that fifth trading day on which a market



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
 Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

disruption event occurs, the calculation agent will determine the final share price of the underlying stock on that fifth trading day based on the mean of the bid prices for the underlying stock for that date obtained from as many recognized dealers in that security, but not exceeding three, as will make such bid prices available to the calculation agent. Bids of RBCCM or any of its affiliates may be included in the calculation of the mean, but only to the extent that any such bid is the highest of the bids obtained. If no bid prices are provided from any third party dealers, the final share price will be determined by the calculation agent in its sole and absolute discretion (acting in good faith) taking into account any information that it deems relevant.

**Postponement of maturity date:** If the scheduled valuation date is not a trading day or if a market disruption event occurs on that day so that the valuation date is postponed and falls less than two business days prior to the scheduled maturity date, the maturity date will be postponed to the second business day following that valuation date as postponed.

“Market disruption event” means:

(a) a suspension, absence or material limitation of trading of the underlying stock on its primary market for more than two hours of trading or during the one-half hour period preceding the close of the principal trading session in that market; or a breakdown or failure in the price and trade reporting systems of the primary market for the underlying stock as a result of which the reported trading prices for the underlying stock during the last one-half hour preceding the close of the principal trading session in that market are materially inaccurate; or the suspension, absence or material limitation of trading on the primary market for trading in options contracts related to the underlying stock, if available, during the one-half hour period preceding the close of the principal trading session in the applicable market, in each case as determined by the calculation agent in its sole discretion; and  
 (b) a determination by the calculation agent in its sole discretion that any event described in clauses (a) above materially interfered with our ability or the ability of any of our affiliates to unwind or adjust all or a material portion of the hedge position with respect to the Trigger PLUS.

**Market disruption events:**

For the purpose of determining whether a market disruption event has occurred: (1) a limitation on the hours or number of days of trading will not constitute a market disruption event if it results from an announced change in the regular business hours of the primary market, (2) a decision to permanently discontinue trading in the relevant options contract will not constitute a market disruption event, (3) a suspension of trading in options contracts on the underlying stock by the primary securities market trading in such contracts by reason of (i) a price change exceeding limits set by that securities exchange or market, (ii) an imbalance of orders relating to such contracts or (iii) a disparity in bid and ask quotes relating to those contracts will constitute a suspension, absence or material limitation of trading in options contracts related to the underlying stock and (4) a suspension, absence or material limitation of trading on the primary securities market on which options contracts related to the underlying stock are traded will not include any time when that securities market is itself closed for trading under ordinary circumstances.

**Antidilution adjustments:**

1. If the underlying stock is subject to a stock split or reverse stock split, then once the split has become effective, the adjustment factor will be adjusted to equal the product of the prior adjustment factor and the number of securities issued in the stock split or reverse stock split with respect to one share of the underlying stock.
2. If the underlying stock is subject (i) to a stock dividend (issuance of additional

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

shares of the underlying stock) that is given ratably to all holders of the underlying stock or (ii) to a distribution of shares of the underlying stock as a result of the triggering of any provision of the corporate charter of the underlying company, then once the dividend has become effective and the underlying stock is trading ex-dividend, the adjustment factor will be adjusted so that the new adjustment factor shall equal the prior adjustment factor plus the product of (i) the number of shares issued with respect to one share of underlying stock and (ii) the prior adjustment factor.

3. If the underlying company issues rights or warrants to all holders of the underlying stock to subscribe for or purchase the underlying stock at an exercise price per share that is less than the closing price of the underlying stock on both (i) the date the exercise price of the rights or warrants is determined and (ii) the expiration date of the rights or warrants, and if the expiration date of the rights or warrants precedes the maturity date of the Trigger PLUS, then the adjustment factor will be adjusted to equal the product of the prior adjustment factor and a fraction, the numerator of which shall be the number of shares of the underlying stock outstanding immediately prior to the issuance of the rights or warrants plus the number of additional shares of the underlying stock offered for subscription or purchase under the rights or warrants and the denominator of which shall be the number of shares of the underlying stock outstanding immediately prior to the issuance of the rights or warrants plus the number of additional shares of the underlying stock which the aggregate offering price of the total number of shares of the underlying stock so offered for subscription or purchase under the rights or warrants would purchase at the closing price on the expiration date of the rights or warrants, which will be determined by multiplying the total number of shares offered by the exercise price of the rights or warrants and dividing the product so obtained by the closing price.

4. There will be no adjustments to the adjustment factor to reflect cash dividends or other distributions paid with respect to the underlying stock other than distributions described in paragraph 2, paragraph 3 and clauses (i), (iv) and (v) of paragraph 5 below and "Extraordinary Dividends" as described below. A cash dividend or other distribution with respect to the underlying stock will be deemed to be an "Extraordinary Dividend" if that cash dividend or distribution exceeds the immediately preceding non-Extraordinary Dividend for the underlying stock by an amount equal to at least 10% of the closing price of the underlying stock (as adjusted for any subsequent corporate event requiring an adjustment hereunder, such as a stock split or reverse stock split) on the trading day preceding the ex-dividend date (that is, the day on and after which transactions in the underlying stock on the primary U.S. organized securities exchange or trading system on which the underlying stock is traded no longer carry the right to receive that cash dividend or that cash distribution) for the payment of the Extraordinary Dividend. If an Extraordinary Dividend occurs with respect to the underlying stock, the adjustment factor with respect to the underlying stock will be adjusted on the ex-dividend date with respect to such Extraordinary Dividend so that the new adjustment factor will equal the product of (i) the then current adjustment factor and (ii) a fraction, the numerator of which is the closing price on the trading day preceding the ex-dividend date, and the denominator of which is the amount by which the closing price on the trading day preceding the ex-dividend date exceeds the Extraordinary Dividend Amount. The "Extraordinary Dividend Amount" with respect to an Extraordinary Dividend for the underlying stock will equal (i) in the case of cash dividends or other distributions that constitute regular dividends, the amount per share of such Extraordinary Dividend minus the amount per share of the immediately preceding non-Extraordinary Dividend for the underlying stock or (ii) in the case of cash dividends or other distributions that do not constitute

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>  
Principal at Risk Securities

regular dividends, the amount per share of the Extraordinary Dividend. To the extent an Extraordinary Dividend is not paid in cash, the value of the non-cash component will be determined by the calculation agent, whose determination will be conclusive. A distribution on the underlying stock described in clause (i), (iv) or (v) of paragraph 5 below that also constitutes an Extraordinary Dividend will cause an adjustment to the adjustment factor only under clause (i), (iv) or (v) of paragraph 5, as applicable.

5. If (i) there occurs any reclassification or change of the underlying stock, including, without limitation, as a result of the issuance of any tracking stock or similar security by the underlying stock issuer, (ii) the underlying stock issuer or any surviving entity or subsequent surviving entity of the underlying stock issuer (the “successor corporation”) has been subject to a merger, combination or consolidation and is not the surviving entity, (iii) any statutory exchange of securities of the underlying stock issuer or any successor corporation with another corporation occurs (other than under clause (ii) above), (iv) the underlying stock issuer is liquidated, (v) the underlying stock issuer issues to all holders of the underlying stock equity securities of an issuer other than the underlying stock issuer (other than in a transaction described in clause (ii), (iii) or (iv) above) (a “spin-off event”) or (vi) a tender or exchange offer or going-private transaction is consummated for all the outstanding shares of the underlying stock (any event in clauses (i) through (vi), a “reorganization event”), the “final share price” will be deemed to equal the exchange property value on the valuation date.

In the event exchange property consists of securities, those securities will, in turn, be subject to the antidilution adjustments set forth in paragraphs 1 through 5.

For purposes of determining whether or not the exchange property value is less than the trigger price, “exchange property value” means (x) for any cash received in any reorganization event, the value, as determined by the calculation agent, as of the date of receipt, of the cash received for one share of the underlying stock, as adjusted by the adjustment factor at the time of such reorganization event, (y) for any property other than cash or securities received in any such reorganization event, the market value, as determined by the calculation agent in its sole discretion, as of the date of receipt, of the exchange property received for one share of the underlying stock, as adjusted by the adjustment factor at the time of the reorganization event and (z) for any security received in any such reorganization event, an amount equal to the closing price, as of the day on which the exchange property value is determined, per share of the security multiplied by the quantity of the security received for each share of the underlying stock, as adjusted by the adjustment factor at the time of such reorganization event.

For purposes of paragraph 5 above, in the case of a consummated tender or exchange offer or going-private transaction involving consideration of particular types, exchange property shall be deemed to include the amount of cash or other property delivered by the offeror in the tender or exchange offer (in an amount determined on the basis of the rate of exchange in the tender or exchange offer or going-private transaction). In the event of a tender or exchange offer or a going-private transaction with respect to exchange property in which an offeree may elect to receive cash or other property, exchange property will be deemed to include the kind and amount of cash and other property received by offerees who elect to receive cash.

Following the occurrence of any reorganization event referred to in paragraph 5 above, all references in this document with respect to the Trigger PLUS to “the underlying stock” shall be deemed to refer to the exchange property and references to a “share” or “shares” of the underlying stock shall be deemed to refer to the applicable share or units of the exchange property, unless the context otherwise requires.

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
 Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

No adjustment to the adjustment factor will be required unless such adjustment would require a change of at least 0.1% in the adjustment factor then in effect. The adjustment factor resulting from any of the adjustments specified above will be rounded to the nearest one hundred-thousandth, with five one-millionths rounded upward. Adjustments to the adjustment factor will be made up to the close of business on the valuation date.

No adjustments to the adjustment factor or method of calculating the adjustment factor will be required other than those specified above. The adjustments specified above do not cover all events that could affect the final share price of the underlying stock, including, without limitation, a partial tender or exchange offer for the underlying stock.

The calculation agent will be solely responsible for the determination and calculation of any adjustments to the adjustment factor or method of calculating the adjustment factor and of any related determinations and calculations with respect to any distributions of stock, other securities or other property or assets (including cash) in connection with any corporate event described in this section, and its determinations and calculations will be conclusive in the absence of manifest error.

The calculation agent will provide information as to any adjustments to the adjustment factor or to the method of calculating the amount payable at maturity of the Trigger PLUS made under paragraph 5 above upon written request by any investor in the Trigger PLUS.

**Business day:** A business day means a Monday, Tuesday, Wednesday, Thursday or Friday that is not a day on which banking institutions in The City of New York generally are authorized or obligated by law, regulation or executive order to close.

**Trading day:** "Trading day" means a day, as determined by the calculation agent, on which trading is generally conducted on the New York Stock Exchange, Nasdaq, the Chicago Mercantile Exchange and the Chicago Board of Options Exchange and in the over-the-counter market for equity securities in the United States.

**Default interest:** In the event we fail to make a payment on the maturity date, any overdue payment in respect of such payment on the Trigger PLUS will bear interest until the date upon which all sums due are received by or on behalf of the relevant holder, at a rate per annum which is the rate for deposits in U.S. dollars for a period of six months which appears on the Reuters Screen LIBOR page as of 11:00 a.m. (London time) on the first business day following such failure to pay. Such rate shall be determined by the calculation agent. If interest is required to be calculated for a period of less than one year, it will be calculated on the basis of a 360-day year consisting of the actual number of days in the period.

**Events of default and acceleration:** If the maturity of the Trigger PLUS is accelerated upon an event of default under the Indenture, the amount payable upon acceleration will be determined by the calculation agent. Such amount will be calculated as if the date of declaration of acceleration were the valuation date.

**Minimum ticketing size:** \$1,000 / 100 Trigger PLUS

**Additional amounts:** We will pay any amounts to be paid by us on the Trigger PLUS without deduction or withholding for, or on account of, any and all present or future income, stamp and other taxes, levies, imposts, duties, charges, fees, deductions or withholdings ("taxes") now or hereafter imposed, levied, collected, withheld or assessed by or on behalf of Canada or any Canadian political subdivision or authority that has the power to tax, unless the deduction or withholding is required by law or by the interpretation or administration

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

thereof by the relevant governmental authority. At any time a Canadian taxing jurisdiction requires us to deduct or withhold for or on account of taxes from any payment made under or in respect of the Trigger PLUS, we will pay such additional amounts (“Additional Amounts”) as may be necessary so that the net amounts received by each holder (including Additional Amounts), after such deduction or withholding, shall not be less than the amount the holder would have received had no such deduction or withholding been required.

However, no Additional Amounts will be payable with respect to a payment made to a holder of the Trigger PLUS or of a right to receive payments in respect thereto (a “Payment Recipient”), which we refer to as an “Excluded Holder,” in respect of any taxes imposed because the beneficial owner or Payment Recipient:

- (i) with whom we do not deal at arm’s length (within the meaning of the Income Tax Act (Canada)) at the time of making such payment;
- (ii) who is subject to such taxes by reason of its being connected presently or formerly with Canada or any province or territory thereof otherwise than by reason of the holder’s activity in connection with purchasing the Trigger PLUS, the holding of the Trigger PLUS or the receipt of payments thereunder;
- (iii) who is, or who does not deal at arm’s length with a person who is, a “specified shareholder” (within the meaning of subsection 18(5) of the Income Tax Act (Canada)) of Royal Bank of Canada (generally a person will be a “specified shareholder” for this purpose if that person, either alone or together with persons with whom the person does not deal at arm’s length, owns 25% or more of (a) our voting shares, or (b) the fair market value of all of our issued and outstanding shares);
- (iv) who presents such security for payment (where presentation is required) more than 30 days after the relevant date (except to the extent that the holder thereof would have been entitled to such Additional Amounts on presenting a security for payment on the last day of such 30 day period); for this purpose, the “relevant date” in relation to any payments on any security means:
  - a. the due date for payment thereof, or
  - b. if the full amount of the monies payable on such date has not been received by the trustee on or prior to such due date, the date on which the full amount of such monies has been received and notice to that effect is given to holders of the Trigger PLUS in accordance with the Indenture;
- (v) who could lawfully avoid (but has not so avoided) such withholding or deduction by complying, or requiring that any agent comply with, any statutory requirements necessary to establish qualification for an exemption from withholding or by making, or requiring that any agent make, a declaration of non-residence or other similar claim for exemption to any relevant tax authority; or
- (vi) who is subject to deduction or withholding on account of any tax, assessment, or other governmental charge that is imposed or withheld by reason of the application of Section 1471 through 1474 of the United States Internal Revenue Code of 1986, as amended (the “Code”) (or any successor provisions), any regulation, pronouncement, or

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
 Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

agreement thereunder, official interpretations thereof, or any law implementing an intergovernmental approach thereto, whether currently in effect or as published and amended from time to time.

For the avoidance of doubt, we will not have any obligation to pay any holders Additional Amounts on any tax which is payable otherwise than by deduction or withholding from payments made under or in respect of the Trigger PLUS.

We will also make such withholding or deduction and remit the full amount deducted or withheld to the relevant authority in accordance with applicable law. We will furnish to the trustee, within 30 days after the date the payment of any taxes is due pursuant to applicable law, certified copies of tax receipts evidencing that such payment has been made or other evidence of such payment satisfactory to the trustee. We will indemnify and hold harmless each holder of the Trigger PLUS (other than an Excluded Holder) and upon written request reimburse each such holder for the amount of (x) any taxes so levied or imposed and paid by such holder as a result of payments made under or with respect to the Trigger PLUS, and (y) any taxes levied or imposed and paid by such holder with respect to any reimbursement under (x) above, but excluding any such taxes on such holder's net income or capital.

For additional information, see the section entitled "Tax Consequences—Canadian Taxation" in the accompanying prospectus.

Form of the

Trigger Book-entry

PLUS:

Trustee: The Bank of New York Mellon

Calculation agent: RBCCM. The calculation agent will make all determinations regarding the Trigger PLUS. Absent manifest error, all determinations of the calculation agent will be final and binding on you and us, without any liability on the part of the calculation agent. You will not be entitled to any compensation from us for any loss suffered as a result of any of the above determinations or confirmations by the calculation agent.

Contact: Morgan Stanley Wealth Management clients may contact their local Morgan Stanley Wealth Management branch office or our principal executive offices at 1585 Broadway, New York, New York 10036 (telephone number 1-(866)-477-4776). All other clients may contact their local brokerage representative. Third-party distributors may contact Morgan Stanley Structured Investment Sales at 1-(800)-233-1087.

Validity of the Trigger PLUS: In the opinion of Norton Rose Fulbright Canada LLP, the issue and sale of the Trigger PLUS has been duly authorized by all necessary corporate action of the Bank in conformity with the Indenture, and when the Trigger PLUS have been duly executed, authenticated and issued in accordance with the Indenture and delivered against payment therefor, the Trigger PLUS will be validly issued and, to the extent validity of the Trigger PLUS is a matter governed by the laws of the Province of Ontario or Québec, or the laws of Canada applicable therein, and will be valid obligations of the Bank, subject to equitable remedies which may only be granted at the discretion of a court of competent authority, subject to applicable bankruptcy, to rights to indemnity and contribution under the Trigger PLUS or the Indenture which may be limited by applicable law; to insolvency and other laws of general application affecting creditors' rights, to limitations under applicable limitations statutes, and to limitations as to the currency in which judgments in Canada may be rendered, as prescribed by the Currency Act (Canada). This opinion is given as of the date hereof and is limited to the laws of the Provinces of Ontario and Québec and the federal laws of Canada applicable thereto. In addition, this opinion is subject to customary assumptions about the Trustee's authorization, execution and delivery of the Indenture and the genuineness of signatures and certain factual matters, all as stated in the letter of such counsel dated January 8, 2016, which has been filed as Exhibit 5.1 to Royal Bank's

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Form 6-K filed with the SEC dated January 8, 2016.

In the opinion of Morrison & Foerster LLP, when the Trigger PLUS have been duly completed in accordance with the Indenture and issued and sold as contemplated by the prospectus supplement and the prospectus, the Trigger PLUS will be valid, binding and enforceable obligations of Royal Bank, entitled to the benefits of the Indenture, 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). This opinion is given as of the date hereof and is limited to the laws of the State of New York. This opinion is subject to customary assumptions about the Trustee's authorization, execution and delivery of the Indenture and the genuineness of signatures and to such counsel's reliance on the Bank and other sources as to certain factual matters, all as stated in the legal opinion dated January 8, 2016, which has been filed as Exhibit 5.2 to the Bank's Form 6-K dated January 8, 2016.

Terms  
incorporated  
in the  
master note:

All of the terms in "Summary Terms" (except the item captioned "Commissions and issue price") and the terms above the item captioned "Contact" in "Additional Terms of the Trigger PLUS" of this pricing supplement, and the section "Supplemental Discussion of U.S. Federal Income Tax Consequences." In addition to those terms, the following two sentences are also so incorporated into the master note: RBC confirms that it fully understands and is able to calculate the effective annual rate of interest applicable to the Trigger PLUS based on the methodology for calculating per annum rates provided for in the Trigger PLUS. RBC irrevocably agrees not to plead or assert Section 4 of the Interest Act (Canada), whether by way of defense or otherwise, in any proceeding relating to the Trigger PLUS.

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

## Principal at Risk Securities

## Apple Inc. Overview

Apple Inc. designs, manufactures, and markets personal computers and related personal computing and mobile communication devices along with a variety of related software, services, peripherals, and networking solutions. The company sells its products through its online stores, its retail stores, its direct sales force, third-party wholesalers, and resellers.

The underlying stock is registered under the Securities Exchange Act of 1934, as amended (the "Exchange Act"). Information provided to or filed with the Securities and Exchange Commission (the "SEC") by the underlying company under the Securities Exchange Act can be located by reference to the SEC CIK number 0000320193 through the website at [www.sec.gov](http://www.sec.gov). In addition, information regarding the underlying company may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents. Neither the issuer nor the agent makes any representation that those publicly available documents or any other publicly available information regarding the underlying company is accurate or complete.

Information as of market close on May 31, 2018:

Bloomberg Ticker Symbol: AAPL 52 Weeks Ago: \$152.76

Exchange: Nasdaq 52 Week High (on 5/10/2018): \$190.04

Current Stock Price: \$186.87 52 Week Low (on 6/16/2017): \$142.27

The table below sets forth the published high and low closing prices of this underlying stock for each quarter from January 1, 2013 through May 31, 2018. The graph below sets forth the daily closing prices of the underlying stock from January 1, 2013 through May 31, 2018. We obtained the information in the table and graph below from Bloomberg Financial Markets, without independent verification. The historical performance of the underlying stock should not be taken as an indication of its future performance, and no assurance can be given as to the price of the underlying stock at any time, including the valuation date.

Common Stock of Apple Inc. High Low(\$)  
(CUSIP 037833100) (\$)

## 2013

First Quarter 78.43 60.01

Second Quarter 66.26 55.79

Third Quarter 72.53 58.46

Fourth Quarter 81.44 68.71

## 2014

First Quarter 79.62 71.35

Second Quarter 94.25 73.99

Third Quarter 103.30 93.08

Fourth Quarter 119.00 96.26

## 2015

First Quarter 133.00 105.99

Second Quarter 132.65 124.25

Third Quarter 132.07 103.12

Fourth Quarter 122.57 105.26

## 2016

First Quarter 109.56 93.42

Second Quarter 112.10 90.34



Third Quarter	115.57	94.99
Fourth Quarter	118.25	105.71
2017		
First Quarter	144.12	116.02
Second Quarter	156.10	140.68
Third Quarter	164.05	142.73
Fourth Quarter	176.42	153.48
2018		
First Quarter	181.72	155.15
Second Quarter (through May 31, 2018)	190.04	162.32

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>  
Principal at Risk Securities  
Common Stock of Apple Inc. – Historical Closing Prices  
January 1, 2013 to May 31, 2018

\* The red solid line indicates the trigger price, based on the initial share price of \$186.87, which was the closing price of the underlying stock on May 31, 2018.

This document relates only to the Trigger PLUS offered hereby and does not relate to the underlying stock or other securities of the underlying company. We have derived all disclosures contained in this document regarding the underlying stock from the publicly available documents described in the preceding paragraph. In connection with the offering of the Trigger PLUS, neither we nor the agent has participated in the preparation of those documents or made any due diligence inquiry with respect to the underlying company. Neither we nor the agent makes any representation that those publicly available documents or any other publicly available information regarding the underlying company is accurate or complete. Furthermore, we cannot give any assurance that all events occurring prior to the date hereof (including events that would affect the accuracy or completeness of the publicly available documents described in the preceding paragraph) that would affect the trading price of the underlying stock (and therefore the price of the underlying stock at the time we price the Trigger PLUS) have been publicly disclosed. Subsequent disclosure of any such events or the disclosure of or failure to disclose material future events concerning the underlying company could affect the value received at maturity with respect to the Trigger PLUS and therefore the market value of the Trigger PLUS.

Neither the issuer nor any of its affiliates makes any representation to you as to the performance of the underlying stock.

May 2018 Page 21

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Canadian Federal Income Tax Consequences

An investor should read carefully the description of material Canadian federal income tax considerations relevant to a Non-resident Holder owning debt securities under “Tax Consequences—Canadian Taxation” in the accompanying prospectus.

Supplemental Discussion of U.S. Federal Income Tax Consequences

The following, together with the discussion of U.S. federal income taxation in the accompanying prospectus and prospectus supplement, is a general description of the material U.S. tax considerations relating to the Trigger PLUS. It does not purport to be a complete analysis of all tax considerations relating to the Trigger PLUS. Prospective purchasers of the Trigger PLUS should consult their tax advisors as to the consequences under the tax laws of the country of which they are resident for tax purposes and the tax laws of Canada and the U.S. of acquiring, holding and disposing of the Trigger PLUS and receiving payments under the Trigger PLUS. This summary is based upon the law as in effect on the date of this document and is subject to any change in law that may take effect after such date.

Supplemental U.S. Tax Considerations

The following section supplements the discussion of U.S. federal income taxation in the accompanying prospectus and prospectus supplement. It applies only to those initial holders who are not excluded from the discussion of U.S. federal income taxation in the accompanying prospectus. It does not apply to holders subject to special rules including holders subject to Sections 451(b) of the Code.

NO STATUTORY, JUDICIAL OR ADMINISTRATIVE AUTHORITY DIRECTLY DISCUSSES HOW THE TRIGGER PLUS SHOULD BE TREATED FOR U.S. FEDERAL INCOME TAX PURPOSES. AS A RESULT, THE U.S. FEDERAL INCOME TAX CONSEQUENCES OF AN INVESTMENT IN THE TRIGGER PLUS ARE UNCERTAIN. BECAUSE OF THE UNCERTAINTY, YOU SHOULD CONSULT YOUR TAX ADVISOR IN DETERMINING THE U.S. FEDERAL INCOME TAX AND OTHER TAX CONSEQUENCES OF YOUR INVESTMENT IN THE TRIGGER PLUS, INCLUDING THE APPLICATION OF STATE, LOCAL OR OTHER TAX LAWS AND THE POSSIBLE EFFECTS OF CHANGES IN FEDERAL OR OTHER TAX LAWS.

We will not attempt to ascertain whether the underlying company would be treated as a “passive foreign investment company” within the meaning of Section 1297 of the Code, or a “U.S. real property holding corporation” within the meaning of Section 897 of the Code. If the underlying company were so treated, certain adverse U.S. federal income tax consequences could possibly apply to U.S. and non-U.S. holders, respectively. You should refer to any available information filed with the SEC by the underlying company and consult your tax advisor regarding the possible consequences to you in this regard.

In the opinion of our counsel, Morrison & Foerster LLP, it would generally be reasonable to treat a Trigger PLUS as a pre-paid cash-settled derivative contract in respect of the underlying stock for U.S. federal income tax purposes, and the terms of the Trigger PLUS require a holder and us (in the absence of a change in law or an administrative or judicial ruling to the contrary) to treat the Trigger PLUS for all tax purposes in accordance with such characterization. If the Trigger PLUS are so treated, a U.S. holder should generally recognize capital gain or loss upon the sale, exchange or maturity of the Trigger PLUS in an amount equal to the difference between the amount a holder receives at such time and the holder’s tax basis in the Trigger PLUS. In general, a U.S. holder’s tax basis in the Trigger PLUS will be equal to the price the holder paid for the Trigger PLUS. Capital gain recognized by an individual U.S. holder is generally taxed at preferential rates where the property is held for more than one year and is generally taxed at ordinary income rates where the property is held for one year or less. The deductibility of capital losses is subject to limitations.

Alternative Treatments. Alternative tax treatments of the Trigger PLUS are also possible and the Internal Revenue Service might assert that a treatment other than that described above is more appropriate. For example, it is possible to treat the Trigger PLUS, and the Internal Revenue Service might assert that a Trigger PLUS should be treated, as a single debt instrument. Pursuant to such characterization, since the Trigger PLUS have a term that exceeds one year, such a debt instrument would be subject to the special tax rules governing contingent payment debt instruments. If the Trigger PLUS are



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

so treated, a holder would generally be required to accrue interest income over the term of the Trigger PLUS based upon the yield at which we would issue a non-contingent fixed-rate debt instrument with terms and conditions similar to the Trigger PLUS. In addition, any gain a holder might recognize upon the sale, exchange or maturity of the Trigger PLUS would generally be ordinary income and any loss recognized by a holder at such time would generally be ordinary loss to the extent of interest that same holder included in income in the current or previous taxable years in respect of the Trigger PLUS, and thereafter, would be capital loss.

Because of the absence of authority regarding the appropriate tax characterization of the Trigger PLUS, it is also possible that the Internal Revenue Service could seek to characterize the Trigger PLUS in a manner that results in tax consequences that are different from those described above. For example, the Internal Revenue Service could possibly assert that any gain or loss that a holder may recognize upon the sale, exchange or maturity of the Trigger PLUS should be treated as ordinary gain or loss.

The Internal Revenue Service has released a notice that may affect the taxation of holders of the Trigger PLUS. According to the notice, the Internal Revenue Service and the U.S. Treasury Department are actively considering whether the holder of an instrument such as the Trigger PLUS should be required to accrue ordinary income on a current basis. It is not possible to determine what guidance they will ultimately issue, if any. It is possible, however, that under such guidance, holders of the Trigger PLUS will ultimately be required to accrue income currently and this could be applied on a retroactive basis. The Internal Revenue Service and the U.S. Treasury Department are also considering other relevant issues, including whether additional gain or loss from such instruments should be treated as ordinary or capital and whether the special "constructive ownership rules" of Section 1260 of the Code, which very generally can operate to recharacterize certain long-term capital gains as ordinary income and impose an interest charge, might be applied to such instruments. Holders are urged to consult their tax advisors concerning the significance, and the potential impact, of the above considerations. We intend to treat the Trigger PLUS for U.S. federal income tax purposes in accordance with the treatment described in this document unless and until such time as the U.S. Treasury Department and Internal Revenue Service determine that some other treatment is more appropriate.

Backup Withholding and Information Reporting.

Payments made with respect to the Trigger PLUS and proceeds from the sale or exchange of the Trigger PLUS may be subject to a backup withholding tax unless, in general, the holder complies with certain procedures or is an exempt recipient. Any amounts so withheld generally will be refunded by the Internal Revenue Service or allowed as a credit against the holder's U.S. federal income tax liability, provided the holder makes a timely filing of an appropriate tax return or refund claim to the Internal Revenue Service.

Reports will be made to the Internal Revenue Service and to holders that are not exempted from the reporting requirements.

Non-U.S. Holders. The following discussion applies to non-U.S. holders of the Trigger PLUS. A non-U.S. holder is a beneficial owner of a Trigger PLUS that, for U.S. federal income tax purposes, is a non-resident alien individual, a foreign corporation, or a foreign estate or trust.

Except as described below, a non-U.S. holder will generally not be subject to U.S. federal income or withholding tax for amounts paid in respect of the Trigger PLUS, provided that (i) the holder complies with any applicable certification requirements, (ii) the payment is not effectively connected with the conduct by the holder of a U.S. trade or business, and (iii) if the holder is a non-resident alien individual, such holder is not present in the U.S. for 183 days or more during the taxable year of the sale, exchange or maturity of the Trigger PLUS. In the case of (ii) above, the holder generally would be subject to U.S. federal income tax with respect to any income or gain in the same manner as if the holder were a U.S. holder and, in the case of a holder that is a corporation, the holder may also be subject to a branch profits tax equal to 30% (or such lower rate provided by an applicable U.S. income tax treaty) of a portion of its earnings and profits for the taxable year that are effectively connected with its conduct of a U.S. trade or business, subject to certain adjustments. Payments made to a non-U.S. holder may be subject to information reporting and to backup withholding unless the holder complies with applicable certification and identification requirements as to its foreign status.



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

A “dividend equivalent” payment is treated as a dividend from sources within the U.S. and 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, certain payments (including deemed payments) that are contingent upon or determined by reference to actual or estimated U.S. source dividends, with respect to certain equity-linked instruments, whether explicitly stated or implicitly taken into account in computing one or more of the terms of such instruments, including the Trigger PLUS, may be treated as dividend equivalents. However, withholding on “dividend equivalent” payments, if any, will not apply to securities issued before January 1, 2017. If any payments are treated as dividend equivalents subject to withholding, we (or the applicable paying agent) would be entitled to withhold taxes without being required to pay any additional amounts with respect to amounts so withheld.

As discussed above, alternative characterizations of the Trigger PLUS for U.S. federal income tax purposes are possible. Should an alternative characterization, by reason of change or clarification of the law, by regulation or otherwise, cause payments as to the Trigger PLUS to become subject to withholding tax, we will withhold tax at the applicable statutory rate. The Internal Revenue Service has also indicated that it is considering whether income in respect of instruments such as the Trigger PLUS should be subject to withholding tax. We will not be required to pay any additional amounts in respect of such withholding. Prospective investors should consult their own tax advisors in this regard.

Foreign Account Tax Compliance Act. The Foreign Account Tax Compliance Act (“FATCA”) imposes a 30% U.S. withholding tax on certain U.S. source payments, including interest (and OID), dividends, other fixed or determinable annual or periodical gain, profits, and income, and on the gross proceeds from a disposition of property (including payments at maturity or upon a redemption or sale) of a type which can produce U.S. source interest or dividends (“Withholdable Payments”), if paid to a foreign financial institution (including amounts paid to a foreign financial institution on behalf of a holder), unless such institution enters into an agreement with the U.S. Treasury Department to collect and provide to the U.S. Treasury Department certain information regarding U.S. financial account holders, including certain account holders that are foreign entities with U.S. owners, with such institution or otherwise complies with FATCA. In addition, the Trigger PLUS may constitute a “financial account” for these purposes and thus, be subject to information reporting requirements pursuant to FATCA. FATCA also generally imposes a withholding tax of 30% on Withholdable Payments made to a non-financial foreign entity unless that entity provides the withholding agent with a certification that it does not have any substantial U.S. owners or a certification identifying the direct and indirect substantial U.S. owners of the entity.

The U.S. Treasury Department and the Internal Revenue Service have announced that withholding on payments of gross proceeds from a sale or redemption of the Trigger PLUS will only apply to payments made after December 31, 2018. If we determine withholding is appropriate with respect to the Trigger PLUS, we will withhold tax at the applicable statutory rate, and we will not pay additional amounts with respect to any FATCA withholding. Therefore, if such withholding applies, any payments on the Trigger PLUS will be significantly less than what you would have otherwise received. Depending on your circumstances, these amounts withheld may be creditable or refundable to you. Foreign financial institutions and non-financial foreign entities located in jurisdictions that have an intergovernmental agreement with the United States governing FATCA may be subject to different rules. You are urged to consult with your own tax advisor regarding the possible implications of FATCA on your investment in the Trigger PLUS.

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Use of Proceeds and Hedging

The net proceeds from the sale of the Trigger PLUS will be used as described under “Use of Proceeds” in the accompanying prospectus supplement and prospectus and to hedge market risks of Royal Bank of Canada associated with its obligation to make the payment at maturity on the Trigger PLUS. The initial public offering price of the Trigger PLUS includes the underwriting discount and commission and the estimated cost of hedging our obligations under the Trigger PLUS.

Supplemental Information Regarding Plan of Distribution;

Conflicts of Interest

Pursuant to the terms of a distribution agreement, RBCCM, an affiliate of Royal Bank of Canada, will purchase the Trigger PLUS from Royal Bank of Canada for distribution to Morgan Stanley Wealth Management. RBCCM will act as agent for the Trigger PLUS and will receive a fee of \$0.25 per \$10 stated principal amount and will pay to Morgan Stanley Wealth Management a fixed sales commission of \$0.20 for each of the Trigger PLUS they sell. Of the amount per \$10 stated principal amount received by RBCCM, RBCCM will pay Morgan Stanley Wealth Management a structuring fee of \$0.05 for each Trigger PLUS.

Morgan Stanley Wealth Management may reclaim selling concessions allowed to individual brokers within Morgan Stanley Wealth Management in connection with the offering if, within 30 days of the offering, Royal Bank of Canada repurchases the Trigger PLUS distributed by such brokers.

Delivery of the Trigger PLUS will be made against payment for the Trigger PLUS on June 5, 2018, which is the third business day following the pricing date (this settlement cycle being referred to as “T+3”). 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 Trigger PLUS more than two business days prior to the original issue date will be required to specify alternative settlement arrangements to prevent a failed settlement.

In addition, RBCCM or another of its affiliates or agents may use this document in market-making transactions after the initial sale of the Trigger PLUS, but is under no obligation to do so and may discontinue any market-making activities at any time without notice.

For additional information as to the relationship between us and RBCCM, please see the section “Plan of Distribution—Conflicts of Interest” in the accompanying prospectus.

The value of the Trigger PLUS shown on your account statement may be based on RBCCM’s estimate of the value of the Trigger PLUS if RBCCM or another of our affiliates were to make a market in the Trigger PLUS (which it is not obligated to do). That estimate will be based on the price that RBCCM may pay for the Trigger PLUS in light of then prevailing market conditions, our creditworthiness and transaction costs. For an initial period of approximately 12 months, the value of the Trigger PLUS that may be shown on your account statement is expected to be higher than RBCCM’s estimated value of the Trigger PLUS at that time. This is because the estimated value of the Trigger PLUS will not include the agent’s commission and our hedging costs and profits; however, the value of the Trigger PLUS shown on your account statement during that period is initially expected to be a higher amount, reflecting the addition of the agent’s commission and our estimated costs and profits from hedging the Trigger PLUS. This excess is expected to decrease over time until the end of this period, and we reserve the right to shorten this period. After this period, if RBCCM repurchases your Trigger PLUS, it expects to do so at prices that reflect its estimated value.

No Prospectus (as defined in Directive 2003/71/EC (as amended, the “Prospectus Directive”)) will be prepared in connection with the Trigger PLUS. Accordingly, the Trigger PLUS may not be offered to the public in any member state of the European Economic Area (the “EEA”), and any purchaser of the Trigger PLUS who subsequently sells any of the Trigger PLUS in any EEA member state must do so only in accordance with the requirements of the Prospectus Directive,



Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

as implemented in that member state.

The Trigger PLUS are not intended to be offered, sold or otherwise made available to, and should not be offered, sold or otherwise made available to, any retail investor in the EEA. For these purposes, the expression “offer” includes the communication in any form and by any means of sufficient information on the terms of the offer and the Trigger PLUS to be offered so as to enable an investor to decide to purchase or subscribe the Trigger PLUS, and a “retail investor” means a person who is one (or more) of: (a) a retail client, as defined in point (11) of Article 4(1) of Directive 2014/65/EU (as amended, “MiFID II”); or (b) a customer, within the meaning of Insurance Distribution Directive 2016/97/EU, as amended, where that customer would not qualify as a professional client as defined in point (10) of Article 4(1) of MiFID II; or (c) not a qualified investor as defined in the Prospectus Directive. Consequently, no key information document required by Regulation (EU) No 1286/2014 (as amended, the “PRIIPs Regulation”) for offering or selling the Trigger PLUS or otherwise making them available to retail investors in the EEA has been prepared, and therefore, offering or selling the Trigger PLUS or otherwise making them available to any retail investor in the EEA may be unlawful under the PRIIPs Regulation.

Structuring the Trigger PLUS

The Trigger PLUS are our debt securities, the return on which is linked to the performance of the underlying stock. As is the case for all of our debt securities, including our structured notes, the economic terms of the Trigger PLUS reflect our actual or perceived creditworthiness at the time of pricing. In addition, because structured notes result in increased operational, funding and liability management costs to us, we typically borrow the funds under these securities at a rate that is more favorable to us than the rate that we might pay for a conventional fixed or floating rate debt security of comparable maturity. Using this relatively lower implied borrowing rate, rather than the secondary market rate, along with the fees and expenses associated with structured notes, reduced the initial estimated value of the Trigger PLUS at the time their terms were set. Unlike the estimated value included in this document, any value of the Trigger PLUS determined for purposes of a secondary market transaction may be based on a different funding rate, which may result in a lower value for the Trigger PLUS than if our initial internal funding rate were used. In order to satisfy our payment obligations under the Trigger PLUS, we may choose to enter into certain hedging arrangements (which may include call options, put options or other derivatives) on the issue date with RBCCM or one of our other subsidiaries. The terms of these hedging arrangements take into account a number of factors, including our creditworthiness, interest rate movements, the volatility of the underlying stock, and the tenor of the Trigger PLUS. The economic terms of the Trigger PLUS and their initial estimated value depend in part on the terms of these hedging arrangements.

The lower implied borrowing rate, the underwriting commission and the hedging-related costs relating to the Trigger PLUS reduced the economic terms of the Trigger PLUS to you and resulted in the initial estimated value for the Trigger PLUS on the pricing date being less than their public offering price. See “Risk Factors—The initial estimated value of the Trigger PLUS is less than the price to the public” above.

May 2018 Page 26

---

Dual Directional Trigger PLUS Based on the Performance of the Common Stock of Apple Inc. due June 3, 2020  
Trigger Performance Leveraged Upside Securities<sup>SM</sup>

Principal at Risk Securities

Employee Retirement Income Security Act

This section is only relevant to you if you are an insurance company or the fiduciary of a pension plan or an employee benefit plan (including a governmental plan, an IRA or a Keogh Plan) proposing to invest in the Trigger PLUS. The Employee Retirement Income Security Act of 1974, as amended (“ERISA”), imposes certain requirements on “employee benefit plans” (as defined in Section 3(3) of ERISA) subject to ERISA, including entities such as collective investment funds and separate accounts whose underlying assets include the assets of such plans (collectively, “ERISA Plans”) and on those persons who are fiduciaries with respect to ERISA Plans. Each fiduciary of an ERISA Plan should consider the fiduciary standards of ERISA in the context of the ERISA Plan’s particular circumstances before authorizing an investment in the Trigger PLUS. Accordingly, 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.

In addition, Section 406 of ERISA and Section 4975 of the Internal Revenue Code prohibit certain transactions involving the assets of an ERISA Plan, as well as those plans that are not subject to ERISA but which are subject to Section 4975 of the Internal Revenue Code, such as individual retirement accounts, including entities whose underlying assets include the assets of such plans (together with ERISA Plans, “Plans”) and certain persons (referred to as “parties in interest” or “disqualified persons”) having certain relationships to such Plans, unless a statutory or administrative exemption is applicable to the transaction. Governmental plans may be subject to similar prohibitions. Therefore, a plan fiduciary considering purchasing Trigger PLUS should consider whether the purchase or holding of such instruments might constitute a “prohibited transaction.”

Royal Bank of Canada and certain of its affiliates each may be considered a “party in interest” or a “disqualified person” with respect to many employee benefit plans by reason of, for example, Royal Bank of Canada (or its affiliate) providing services to such plans. Prohibited transactions within the meaning of ERISA or the Internal Revenue Code may arise, for example, if Trigger PLUS are acquired by or with the assets of a Plan, and with respect to which Royal Bank of Canada or any of its affiliates is a “party in interest” or a “disqualified person”, unless those Trigger PLUS are acquired under an exemption for transactions effected on behalf of that Plan by a “qualified professional asset manager” or an “in-house asset manager”, for transactions involving insurance company general accounts, for transactions involving insurance company pooled separate accounts, for transactions involving bank collective investment funds, or under another available exemption. Section 408(b)(17) provides an additional exemption for the purchase and sale of securities and related lending transactions where neither the issuer of the securities nor any of its affiliates have or exercise any discretionary authority or control or render any investment advice with respect to the assets of any Plan involved in the transaction and the Plan pays no more than “adequate consideration” in connection with the transaction. The person making the decision on behalf of a Plan or a governmental plan shall be deemed, on behalf of itself and any such plan, by purchasing and holding the Trigger PLUS, or exercising any rights related thereto, to represent that (a) such purchase, holding and exercise of the Trigger PLUS will not result in a non-exempt prohibited transaction under ERISA or the Internal Revenue Code (or, with respect to a governmental plan, under any similar applicable law or regulation) and (b) neither Royal Bank of Canada nor any of its affiliates is a “fiduciary” (within the meaning of Section 3(21) of ERISA) with respect to the purchaser or holder in connection with such person’s acquisition, disposition or holding of the Trigger PLUS, or any exercise related thereto or as a result of any exercise by Royal Bank of Canada or any of its affiliates of any rights in connection with the Trigger PLUS, and no advice provided by Royal Bank of Canada or any of its affiliates has formed a primary basis for any investment decision by or on behalf of such purchaser or holder in connection with the Trigger PLUS and the transactions contemplated with respect to the Trigger PLUS.

If you are an insurance company or the fiduciary of a pension plan or an employee benefit plan, and propose to invest in the Trigger PLUS, you should consult your legal counsel.