Product & Risk Disclosure Statement

Covered Option Contracts

1. Features

1.1 Definition of an Option Contract

A Forex Option contract is an agreement between the two parties (Bank and User) which confers the right to the buyer of the option, but not the obligation to buy or to sell an agreed amount of one currency in exchange for other currency on an agreed future date at an agreed exchange rate in exchange for an agreed fee

1.2 Options Terminologies

Below are the common terminologies pertaining to option contracts:

- **Call Option** – Gives the buyer the right to buy the underlying asset currency
- **Put Option** - Gives the buyer the right to sell the underlying asset currency
- **Strike Rate / Strike Price** - The pre-determined rate at which the buyer of the option may choose to exercise his right to buy/sell the underlying asset currency.
- **Notional value** – Agreed amount of underlying to be bought/sold
- An option can be at the money (ATM), in the money (ITM) or out of the money (OTM) as compared to the forward rate.
    - ATM: if the prevailing market rate is same as the Strike price of Option
    - ITM: if the prevailing market rate is higher (for Call option) / lower (for Put option) than the strike price of Option
    - OTM: if the prevailing market rate is higher (for Put option) / lower (for Call option) than the strike price of Option
- **Expiry Date** - The date on which the option ceases to exist.
- **Cut** - The pre-determined time of the day at which the option ceases to exist on the expiry date
- **Delivery Date** - Value date on which the cash flow exchange takes place. It is typically on T+2 business days from the expiration date.
- **Style (European or American) -**
    - European Style options may be exercised only at the cut off time on the expiry date
    - American style options may be exercised at any time prior to cut off time on the expiry date
- **Premium** - The "price / cost" of the option; normally settled up-front (value spot)

1.3 Types of Covered Option Contract

(i) <u>Covered Call Option</u>

Covered Call Option is option strategy, where exporter sells call option(s) against an equivalent amount of their confirmed order.

This strategy gives up the protection benefit of a forward or vanilla put option to gain upfront option premium and a limited upside benefit compared to a vanilla put option

(ii) <u>Covered Put Option</u>

Covered Put Option is option strategy, where importer sells put option(s) against an equivalent amount of their confirmed payment obligation.
This strategy gives up the protection benefit of a forward or vanilla call option to gain upfront option premium and a limited upside benefit compared to a vanilla call option

All features and other terms and conditions of option contracts will be guided by the extant Governing Directions issued by RBI which lay down the guidelines to be followed for offering Derivative OTC products based on broad principles enumerated therein. Current guidelines governing the Option contracts as on date of publishing of this document are:

1. Circular captioned "Risk Management and Interbank Dealings – Hedging of Foreign Exchange Risk", effective from 01st Sept. 2020, through A.P.(DIR Series) Circular No. 29 issued on 7th April, 2020
2. The Master Direction – Reserve Bank of India (Market-makers in OTC Derivatives) Directions, 2021', effective from 3rd January 2022, vide Notification No. FMRD.FMD.08/02.03.247/2021-22 dated 16th September 2021.

1.4 Pricing of Cover Option Contracts

Pricing of option is determined by using suitable financial models as the pay-off of these structures are non-linear in nature. Black – Scholes model is the commonly used pricing model, and it takes in to account various market parameters to arrive at a final option price (termed as Premium) which is to be borne by the Buyer of the option.

Below is the list of common variables affecting the price of an option:

- Spot Rate
- Strike Price
- Time to expiration
- Volatility
- Interest rates

From pricing perspective, sensitivity of option premium to market parameters is monitored through a set of risk parameters termed as "Greeks". "Delta" is one such commonly used Greeks which measures the expected change in the option premium with the change in spot rate.

<u>Example: Pricing of USD/INR Covered Call Option Contract for Exporter</u>

The Counterparty:	A B C Limited
Option Style:	European
Expiration Time:	TOKYO CUT 15:00:00 (11:30 AM IST)
Trade Date:	20-Dec-2021
Spot Reference:	76.0000
Premium payable by HDFC Bank:	INR 600,000.00
Premium Settlement Date:	22-Dec-2021
Holiday convention – Settlement Date:	Modified Following Business Day Convention New York, Mumbai for payment
Underlying required:	Exports

Calculation Agent:	As per the signed ISDA agreement

Option Buyer	Call Ccy	Call Amt	Put Ccy	Put Amt	Expiry Date	Settlement Date	Strike Price
HDFC BANK LTD	USD	**1,000,000.00**	INR	76,000,000.00	27-Jan-2022	31-Jan-2022	**76.0000**

USD/INR Spot rate: 76.0000
USD/INR forward swap price for 31-Jan-2022: + 0.3500 (35 paise)
USD/INR outright Forward rate for 31-Jan-2022: 76.0000+0.3500 = 76.3500

Indicative premium to be received upfront by ABC Limited
USD/INR Covered Call Option Premium received (INR per USD): 0.6000 (60 paise)
USD/INR Covered Call Option Premium received: INR 600,000

Example: Pricing of USD/INR Covered Put Option Contract for Importer

The Counterparty:	A B C Limited
Option Style:	European
Expiration Time:	TOKYO CUT 15:00:00 (11:30 AM IST)
Trade Date:	20-Dec-2021
Spot Reference:	76.0000
Premium payable by HDFC Bank:	INR 400,000.00
Premium Settlement Date:	22-Dec-2021
Holiday convention - Settl_Dt:	Modified Following Business Day Convention New York, Mumbai for payment
Underlying required:	Imports
Calculation Agent:	As per the signed ISDA agreement

Option Buyer	Put Ccy	Put Amt	Call Ccy	Call Amt	Expiry Date	Settlement Date	Strike Price
HDFC BANK LTD	USD	**1,000,000.00**	INR	76,000,000.00	27-Jan-2022	31-Jan-2022	**76.0000**

USD/INR Spot rate: 76.0000
USD/INR forward swap price for 31-Jan-2022: +0.3500 (35 paise)
USD/INR outright Forward rate for 31-Jan-2022: 76.0000+0.3500 = 76.3500

Indicative cost for ABC Limited
USD/INR Covered Put Option Premium received (INR per USD): 0.4000 (40 paise)
USD/INR Covered Put Option Premium received: INR 400,000

1.5 Eligible Users

Under the new guidelines issued by RBI through AP (Dir Series) Circular No 29 dated April 7,2020 covering “Risk Management & Interbank Dealings-Hedging of Foreign Exchange Risk”, effective Sept 1, 2020, ‘Non-retail’ category of users (including Non-Resident users) are eligible to enter into covered option contracts through an AD bank.

1.6 Underlying Exposure Requirements

Covered Options can only be booked against Contracted Exposure Facility (Non-Retail Clients cannot use the USD 10 Million Facility for covered options)

Contracted Exposure (CE)

- For Covered Option Contract(s) booked under "Contracted Exposure" facility, the user shall have to submit evidence of underlying exposure to the bank within 15 calendar days of the trade being entered into/booked.
- In the event the evidence of the underlying exposure is not provided by the user within the aforementioned stipulated timeline, the bank reserves the right to cancel the contract and the exchange gain if any will not be passed to the user by the bank while the user shall be liable to pay any exchange loss in the event of such cancellation.
- Submission of underlying documents can be by way of physical delivery or in any electronic form as per mutually acceptable media including but not limited to email.
- Cancellation and rebooking are freely allowed for Covered Options Contract(s) booked under "Contracted exposure" as long as the notional and/or maturity tenor of the Covered Options contract does not exceed the underlying exposure.
- For Covered Options Contract(s) booked under "Contracted Exposure" facility against the underlying exposure based on reasonable estimates (such as Master Sales Agreements (MSA) or Master procurement agreement or similar such agreements), the user shall submit all such documents deemed appropriate by the bank on periodic basis not later than annually, or as may be required by the bank due to change in bank's internal process from time to time.

2. Terms and conditions including for termination and utilization

2.1 Events applicable post booking of a Covered Option Contract

A deal once booked can either be
1. Utilized (on delivery date)
2. Cancelled (prior to or on maturity date for part or full amount of the contract)
3. Rolled over (prior to or on maturity date)

Delivery / Utilization:

On the "Expiry date" of the option, based on the prevailing market exchange rate ("fixing") at a predetermined timing ("Cut") the option exercise status is determined.

A Call option is considered as exercised if the fixing is higher than the Strike price of the option and a Put option is considered exercised if the fixing is lower than the Strike Price of the option.

In the Covered Option, if option leg gets exercised on expiry date and accordingly cashflows will be exchanged on the delivery date.

In the case of Covered Call Option, if it gets exercised on the expiry date, the option seller is obligated to sell the underlying cash flow at the option exercised rate on delivery date (Gross settlement)

In the case of Covered Call Option, if it gets exercised on the expiry date, the option seller is obligated to buy the underlying cash flow at the option exercised rate on delivery date (Gross settlement)

Cancellation/termination/Unwind:

As per regulation, the user is permitted to cancel a Covered Option Contract on or before expiry time on the expiration date by settling the Mark to Market (MTM) value of the outstanding contract on spot basis (T+2 business days from the day cancellation).

MTM value of the outstanding contract is determined based on the option parameters and other market factors as explained in the earlier sections.

Once the Option is considered as exercised on the Expiry date, as an alternative to Gross Settlement, the user can subsequently opt to cancel the Cashflow exchange obligation (due on the delivery date) at prevailing market parameters. Under this “Net Settlement”, the net profit or loss, as applicable, is settled on the Delivery date.

Rollover of the Contract:

In case the user requests for the rollover of the contract, the same is permitted under the regulations. The user would need to furnish the booking details along with the extension details. Care should be taken to ensure that in case of contract booked under contracted exposure facility, the validity of the underlying supports the rollover of the contract.

Under rollover of Covered Option Contract, the original contract would be cancelled/terminated at current market rate and a rolled over contract will be booked for future date. During this simultaneous cancellation and rebooking, spot rate to the extent of the delta of the cancelled contract is matched. Cancellation value of the original contract is settled on spot basis (i.e., T+2 business days from the day cancellation).

3. Benefits

- The Structure allows the User to receive an upfront premium against the cover of a contracted exposure by giving up the potential upside which may have happened on the underlying exposure due to favourable movement on spot.
- User may benefit in case the overall spot movement on maturity beyond the option strike price of the option is less than the upfront premium received by the user

4. Risks

- There is no downside protection for the user in case of an adverse spot movement. The user may experience a significant downside risk on settlement of his obligations if the adverse spot movement is significant.
- The User forgoes the participation in case of favourable exchange movement beyond the strike price of the covered option. E.g., In the below illustration of Covered call against exports, the User will never get an exchange rate better then 76.00 (Strike) on maturity/delivery.
- **The MTM (mark-to market) risk**: MTM of the Cover Option Contract(s) may be in the money or out of the money at any point during the tenor of the contract. MTM fluctuations can lead to adverse volatility in Profit & Loss for the corporate/user and may also lead to margin calls (depending on sanction terms)
- In the event the underlying asset ceases to exist then the hedge needs to be unwound at the market rate (which could be out of the money and may lead to cash outflow)

5. Pay-off profile (Upside/Downside risks)

In case of a Covered Option Contract user sells a Call / Put option at a particular strike and receives upfront premium on spot (T+2 day) basis. As the option are sold, user has a downside risk from spot movement against the user view.

Pay-off profile of a Covered Option is explained in detail with following illustrations:

Illustration 1 (USD/INR Covered Call Option contract for Exporter):

ABC Ltd. enters into a Covered Call Option Contract for 1,000,000 USD/INR with the following terms:

The Counterparty:	A B C Limited
Option Style:	European
Expiration Time:	TOKYO CUT 15:00:00 (11:30 AM IST)
Trade Date:	20-Dec-2021
Spot Reference:	76.0000
Premium payable by HDFC Bank:	INR 600,000.00
Premium Settlement Date:	22-Dec-2021
Holiday convention - Settl_Dt:	Modified Following Business Day Convention New York, Mumbai for payment
Underlying required:	Exports
Calculation Agent:	As per the signed ISDA agreement

Option Buyer	Call Ccy	Call Amt	Put Ccy	Put Amt	Expiry Date	Settlement Date	Strike Price
HDFC BANK LTD	USD	**1,000,000.00**	INR	76,000,000.00	27-Jan-2022	31-Jan-2022	**76.0000**

Pay off on Maturity:

- If spot USD/INR on expiry is at or above 76.0000 then Counterparty has to sell USD 1,000,000.00 at 76.0000
- If spot USD/INR on expiry is below 76.0000 then Counterparty can sell USD 1,000,000.00 at market

Pay off Profile:

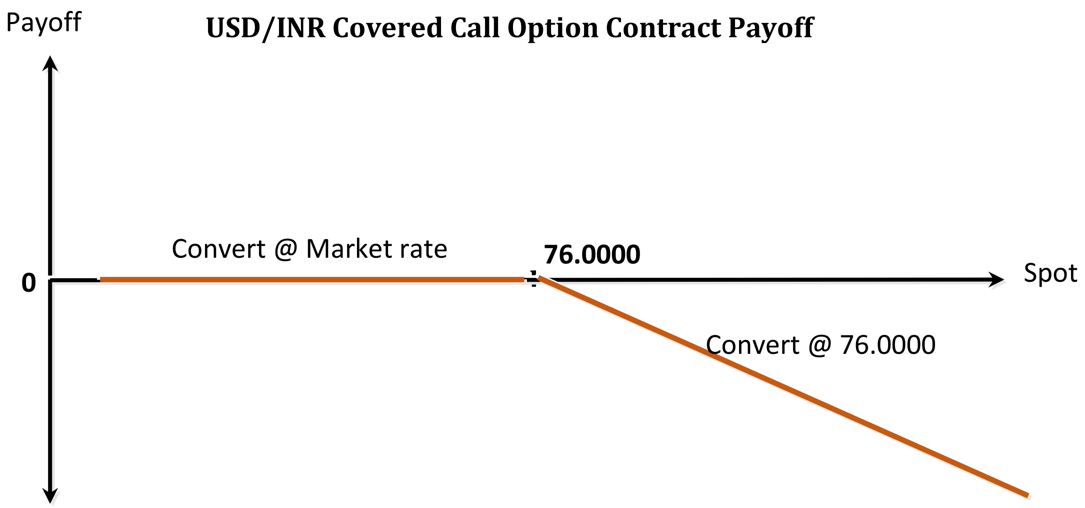


Illustration 2 (USD/INR Covered Put Option contract for Importer):

ABC Ltd. enters into a Covered Put Option Contract for 1,000,000 USD/INR with the following terms:

The Counterparty:	A B C Limited
Option Style:	European
Expiration Time:	TOKYO CUT 15:00:00 (11:30 AM IST)
Trade Date:	20-Dec-2021
Spot Reference:	76.0000
Premium payable by HDFC Bank:	INR 400,000.00
Premium Settlement Date:	22-Dec-2021
Holiday convention - Settl_Dt:	Modified Following Business Day Convention New York, Mumbai for payment
Underlying required:	Imports
Calculation Agent:	As per the signed ISDA agreement

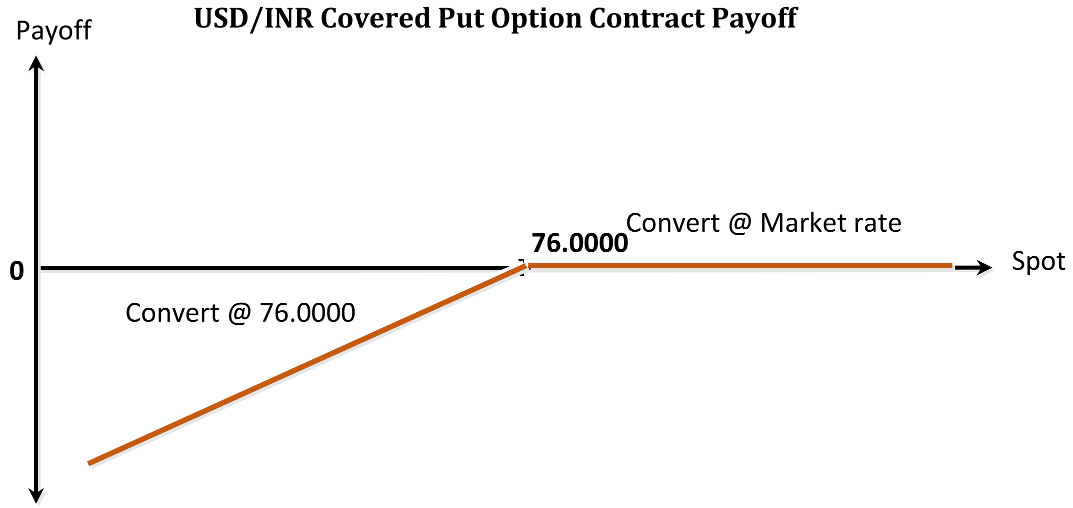
Option Buyer	Call Ccy	Call Amt	Put Ccy	Put Amt	Expiry Date	Settlement Date	Strike Price
HDFC BANK LTD	INR	76,000,000.00	USD	**1,000,000.00**	27-Jan-2022	31-Jan-2022	**76.0000**

Pay off on Maturity:

- If spot USD/INR on expiry is at or below 76.0000 then Counterparty has to buy USD 1,000,000.00 at 76.0000

- If spot USD/INR on expiry is above 76.0000 then Counterparty can buy USD 1,000,000.00 at market

Pay off Profile:



6. Set up of Covered Option Contract booking facility

Bank will set up Derivative (Cover Option) facility for its users who wish to avail the facility on a case-to-case basis, subject to due diligence, credit appraisal of the user's financials, documentation execution etc as per internal processes of the bank. For the purpose of the same, the bank might ask the user to put up margin money, collateral, MTM etc. as per bank's internal appraisal and assessment and the same would be mutually agreed with the user before setting up internal limits for the Covered Option Contract facility. Before offering this facility, the User might have to provide documentation like ISDA, FX facility agreement etc which shall contain other mutually agreed conditions relating to termination and events of default.

7. Costs and fees, including break-up

HDFC Bank will act as a principal on its own behalf as a Counterparty to the User taking on one or more risks in connection with an order/price, including credit risk and varying degrees of market risk. The Covered Option Rates contracted with users, will be dependent on the prevailing interbank rates and be inclusive of a mark-up adjustment. The factors that may contribute to the mark up adjustment, will amongst other things include counterparty credit risk, capital costs, liquidity risk, and tenor risk premium.

Any other statutory charges including stamp duty will be as applicable.

8. Risk Disclosure Statement

Below Risk Disclosure Statement is in line with the guidelines issued by RBI post review of Comprehensive Guidelines on Derivatives (CGD) and captioned 'The Master Direction – Reserve Bank of India (Market-makers in OTC Derivatives) Directions, 2021', effective from 3rd January 2022, vide Notification No. FMRD.FMD.08/02.03.247/2021-22 dated 16th September 2021. This will be applicable to all the transactions done with the bank on this product and the user is advised to refer to the below Risk Disclosure Statement before dealing in each such transaction.

a) Rationale of the Transaction

In case of a Covered Option Contract user sells a Call / Put option at a strike price and receives upfront premium on spot basis against the cover of a contracted exposure arising out of its exposure. User will benefit in case the overall spot movement on maturity beyond the strike price of the option is less than the upfront premium received by the client. However, user poses an unlimited downside risk to the user as shown in the below scenarios.

b) Sensitivity Analysis identifying various parameters that affect the product

User is exposed to the Mark to market movement during the tenor of the Covered Option Contract. Cancellation/unwind price of a Covered Option Contract would be linked to mark to market which is based on the following parameters that affect the final pay off and their sensitivity:

Parameters involved in Pricing

- Spot rate
- Forward rates as applicable for the delivery date(s)
- Volatility, i.e., the volatility applicable for each leg of the deal for each delivery date(s)

The table below shows how an option price changes with an **increase** in one of the underlying variables while keeping the other variables fixed.

Variable	European Call*	European Put*
Spot Rate	Increase	Decrease
Strike Price	Decrease	Increase
Time to expiration	Increase	Increase
Volatility	Increase	Increase
Interest rates	Increase	Decrease
**On the base currency.*		

c) Scenario Analysis covering upside and downside risks on pay off profile

Pay-off profile of a Covered Option Contract is non-linear in nature and implies the notional gain/loss (or Market to Market MTM) on the Covered Option contract on maturity date.

Scenario Analysis reflecting upside and downside risks on the pay-off of foreign contract is shown through below illustrations:

Illustration 1 (USD/INR Covered Call Option contract for Exporter):

ABC Ltd. enters into a Covered Call Option Contract for 1,000,000 USD/INR with the following terms:

The Counterparty:	A B C Limited
Option Style:	European
Expiration Time:	TOKYO CUT 15:00:00 (11:30 AM IST)
Trade Date:	20-Dec-2021
Spot Reference:	76.0000
Premium payable by HDFC Bank:	INR 600,000.00
Premium Settlement Date:	22-Dec-2021
Holiday convention - Settl_Dt:	Modified Following Business Day Convention New York, Mumbai for payment
Underlying required:	Exports
Calculation Agent:	As per the signed ISDA agreement

Option Buyer	Call Ccy	Call Amt	Put Ccy	Put Amt	Expiry Date	Settlement Date	Strike Price
HDFC BANK LTD	USD	**1,000,000.00**	INR	76,000,000.00	27-Jan-2022	31-Jan-2022	**76.0000**

Scenario Analysis:

Assumed USD/INR Rate on Maturity	Profit / (Loss) in INR to User	Option Pay off
55.0000	0.00	User sells USD 1,000,000 at market
60.0000	0.00	User sells USD 1,000,000 at market
65.0000	0.00	User sells USD 1,000,000 at market
70.0000	0.00	User sells USD 1,000,000 at market
75.0000	0.00	User sells USD 1,000,000 at market
80.0000	-4,000,000.00	User sells USD 1,000,000 at 76.0000
85.0000	-9,000,000.00	User sells USD 1,000,000 at 76.0000
90.0000	-14,000,000.00	User sells USD 1,000,000 at 76.0000
95.0000	-19,000,000.00	User sells USD 1,000,000 at 76.0000

Illustration 2 (USD/INR Covered Put Option contract for Importer):

ABC Ltd. enters a Covered Put Option Contract for 1,000,000 USD/INR with the following terms:

The Counterparty:	A B C Limited
Option Style:	European
Expiration Time:	TOKYO CUT 15:00:00 (11:30 AM IST)
Trade Date:	20-Dec-2021
Spot Reference:	76.0000

Premium payable by HDFC Bank:	INR 400,000.00
Premium Settlement Date:	22-Dec-2021
Holiday convention - Settlement Date:	Modified Following Business Day Convention New York, Mumbai for payment
Underlying required:	Imports
Calculation Agent:	As per the signed ISDA agreement

Option Buyer	Call Ccy	Call Amt	Put Ccy	Put Amt	Exp_Dt	Settl_Dt	Strike Price
HDFC BANK LTD	INR	76,000,000.00	USD	**1,000,000.00**	27-Jan-2022	31-Jan-2022	**76.0000**

Scenario Analysis:

Assumed USD/INR Rate on Maturity	Profit / (Loss) in INR to A B C ltd	Option Pay off
55.0000	-21,000,000.00	User buys USD 1,000,000 at 76.0000
60.0000	-16,000,000.00	User buys USD 1,000,000 at 76.0000
65.0000	-11,000,000.00	User buys USD 1,000,000 at 76.0000
70.0000	-6,000,000.00	User buys USD 1,000,000 at 76.0000
75.0000	-1,000,000.00	User buys USD 1,000,000 at 76.0000
80.0000	0.00	User buys USD 1,000,000 at market
85.0000	0.00	User buys USD 1,000,000 at market
90.0000	0.00	User buys USD 1,000,000 at market
95.0000	0.00	User buys USD 1,000,000 at market

9. General Disclosure

9.1 This Product Disclosure Statement and Risk Disclosure Statement will be applicable to all the transactions done with the bank on this product and the user is advised to refer to these before dealing in each such transaction.

9.2 This transaction is a sophisticated financial instrument and involves a significant degree of various risks, including market risk, credit risk, and liquidity risk.

9.3 The User is expected to have sufficient knowledge, experience and professional advice to make their own evaluation of the risks and rewards of doing this transaction

9.4 The User is expected to have internal policies and approval for dealing in the product based on their Risk management policy

9.5 HDFC Bank assumes no fiduciary responsibility or liability for any consequences, financial or otherwise, arising from this transaction.

9.6 The User should take whatever tax, accounting, legal and other advice as considered necessary from third parties.

9.7 The features and Terms & Conditions mentioned above in this Product Disclosure Statement is subject to change depending on the changes in the extant guidelines or change in market dynamics as determined by HDFC Bank. The individual contract confirmations may further contain the exact specific of the transaction and governing terms and conditions of the contract.