

# PRODUCT INFORMATION

## FOREIGN EXCHANGE OPTIONS

GLOBAL MARKETS DIRECTORATE OF OTP BANK PLC.

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Please read this Product Information carefully before concluding a contract on foreign exchange options. For further information, please contact our staff.

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## Table of contents

1.	FOREIGN EXCHANGE OPTIONS .....	3
1.1	WHO SHOULD INVEST? .....	3
1.2	THE TWO TYPES OF FX OPTIONS BY DIRECTION OF THE TRANSACTION RIGHT: .....	4
1.3	THE TWO TYPES OF FX OPTION BY TYPE OF EXERCISE: .....	4
2.	KEY DEFINITIONS .....	6
3.	OTHER FEATURES OF FX OPTIONS .....	10
4.	TRANSACTION COLLATERAL .....	11
4.1	ADDITIONAL LEVERAGE .....	11
4.2	MAINTENANCE MARGINING .....	11
4.3	POSSIBILITY TO UNILATERALLY CLOSE A POSITION (FORCED LIQUIDATION) .....	12
5.	CLOSING FOREIGN EXCHANGE OPTION TRANSACTIONS .....	13
6.	EXAMPLES .....	14
6.1	SELLING A EUR CALL / HUF PUT OPTION .....	14
6.2	BUYING A EUR PUT / HUF CALL OPTION .....	18
7.	EXOTIC FX OPTIONS .....	22
7.1	BARRIER OPTIONS .....	22
7.1.1	Who should invest? .....	22
7.1.2	Types of FX option by barrier .....	23
7.2	DIGITAL (BINARY) OPTIONS .....	26
7.2.1	Who should invest? .....	27
8.	EXAMPLES .....	28
8.1	SELLING A EUR CALL / HUF PUT OPTION WITH A KNOCK-IN LEVEL .....	28
8.2	BUYING A EUR PUT / HUF CALL OPTION WITH A KNOCK-OUT LEVEL .....	31
9.	OPTION STRATEGIES .....	36
9.1	TYPES OF OPTION STRATEGY ACCEPTED BY THE BANK .....	37
9.2	STRATEGIES FOR BARRIER OPTIONS .....	41
10.	EXAMPLES .....	42
10.1	SHORT EUR/HUF KO FORWARD STRATEGY .....	42
11.	SUMMARY OF THE RISKS OF FOREIGN EXCHANGE OPTION TRANSACTIONS .....	47
12.	MISCELLANEOUS INFORMATION .....	50
13.	NOTICES AND DISCLAIMERS .....	52



# 1. Foreign exchange options

A foreign exchange option (hereinafter: FX Option) is a contract between the customer and OTP Bank Plc. (hereinafter: Bank) in which the option buyer **acquires the right**, and the option seller **undertakes the obligation** to buy or sell FX Option on a future date (exercise date) at a pre-determined price (strike price). The buyer **pays** a premium (option premium) to the option seller (writer) for the acquisition of the right, and the option seller **receives** a premium (option premium) for undertaking the obligation.

The transaction is a derivative Individual Transaction, i.e. a complex financial instrument between the Bank and the customer outside the regulated market (OTC).

## 1.1 Who should invest?

- The transaction is recommended to investors seeking to mitigate or completely eliminate (hedge) the exchange rate risk resulting from their FX Option exposures.
  - With FX Option options, customers can take positions to protect against exchange rate risk while also benefiting from potential favourable exchange rate movements.
- Investors with specific expectations for the movements of the currency pair concerned (underlying product), who seek to benefit from favourable exchange rate movements, and to make extra returns by taking exchange rate risk.
  - Buying FX options enables customers to develop strategies to limit maximum loss.
  - By selling FX options, customers can undertake obligations at an exercise level adjusted to their own risk appetite in exchange for the option premium. In such an arrangement the customer is exposed to unlimited exchange rate risk, and there is a possibility of incurring unlimited loss.

## 1.2 The two types of FX options by direction of the transaction right:

### CALL option:

Its buyer acquires the right to **buy** a pre-determined amount of **foreign exchange** at a pre-determined price (strike price) on a pre-determined exercise date. In exchange for the option premium, the option seller undertakes an obligation to sell a certain amount of foreign exchange at the strike price when the option is exercised.

### PUT option:

Its buyer acquires the right to **sell** a predetermined amount of **foreign exchange** at a predetermined rate (strike price) and exercise date. In exchange for the option premium, the option seller undertakes the obligation to buy a certain amount of foreign exchange at the strike price when the option is exercised.

CALL	Buy a call option	Right to buy the base currency
	Sell a call option	Obligation to sell the base currency
PUT	Buy a put option	Right to sell the base currency
	Sell a put option	Obligation to buy the base currency

## 1.3 The two types of FX option by type of exercise:

### EUROPEAN option:

Options of the European type may only be exercised at a specific time on the exercise date. That is, the option may only be exercised at this particular time. For HUF options this is 12:00 CET, whereas options for other currencies may be exercised at different times as determined by the Bank.

**AMERICAN option:**

Options of the American type may be exercised at any time during the term up to a specific time on the exercise date. The option may be exercised at any time when its holder decides to do so.

## 2. Key definitions

Exercise of an option	With options of the European type, if on the maturity date and time the spot market price exceeds the strike price in the case of a call option, or remains below it in the case of a put option, the option will be exercised, i.e. the option buyer will exercise the right to buy or sell foreign exchange, which will create a transaction for the purchase or sale of the base (first) currency.
Expiry of an option without exercise	With options of the European type, if on the maturity date and time the market price remains below the strike price in the case of a call option, or exceeds it in the case of a put option, the option will not be exercised, i.e. the option buyer will not exercise the right to buy or sell foreign exchange, so that the option will terminate without being exercised.
Option premium	The premium to be paid for buying the option, or respectively the premium received for selling the option. The standard settlement date for the option premium is typically the second banking day following contracting (for some currencies, it may be the first or other day).
Strike price	The strike price is the exchange rate specified at the time of contracting, at which the option will be exercised when the option holder chooses to do so. With plain vanilla options, this will occur if the market rate exceeds the strike price in the case of a call option, or remains below it in the case of a put option on the maturity date and time of the transaction. The strike price is also referred to as exercise or strike level.

Exercise date	The maturity date of an option is the date on which the option may be exercised, depending on the market rate.
Settlement date	The settlement date of an option is the date on which a foreign exchange transaction resulting from an exercised option is physically settled. This is typically the second (for some currencies the first or other) banking day following the maturity date.
Plain vanilla options	A general basic type of foreign exchange options without any specific features. The holder of the option may exercise it unconditionally.
Barrier options	Once a certain spot market price is breached, the option buyer may (knock-in) or may not (knock-out) exercise the option, i.e. this type of option is conditional.
Knock-in barrier level	The option may only be exercised when this barrier (knock-in) has been breached.
Knock-out barrier level	The barrier level (knock-out) the breach of which will prevent the option buyer from exercising the option, and will terminate the transaction.
Digital options	A payout under the option will be made when a specific barrier is breached, otherwise it will be terminated without any payout.
Delta	It shows the amount of change in the value of the option (i.e. the option premium) resulting from a unit movement in the market rate of the currency concerned.



Volatility	A value describing the variability of the exchange rate of a given currency. The higher the volatility of the exchange rate of a currency pair or the price of a financial instrument, the greater the fluctuations observed in the price of the financial instrument/currency pair, and the higher the potential risk to investors investing in the instrument. Among other factors, volatility depends on the economic and legal features of the financial instrument, the issuer, and the financial and capital markets in which the financial instrument is traded and distributed.
Time value	The value of the term of a given option in pricing the option. The term is the interval between the trade date and the exercise date, which is a relevant factor in the value of an option, i.e. the option premium.
Interest rate	The market interest rate levels of the two currencies comprising the option.
ATM option	The strike price of an ATM (at the money) option equals the current market rate of the underlying currency pair.
ATMF option	The strike price of an ATMF (at the money forward) option equals the future (forward) rate calculated from the interest rate differential of the two underlying currencies.
ITM option	An option is ITM, i.e. “in the money” if, with CALL options, the strike price is lower than the current market rate of the underlying currency pair, or, with PUT options, the strike price is higher than the current market rate of the underlying currency pair.

OTM option	An option is OTM, i.e. “out of the money” if, with CALL options, the strike price is higher than the current market rate of the underlying currency pair, or, with PUT options, the strike price is lower than the current market rate of the underlying currency pair.
Base currency	For a currency pair, the base currency is always the first currency in the name of the currency pair, i.e. the currency for which the transaction is contracted. For example, when buying EUR/USD the customer buys EUR in exchange for USD. Accordingly, the exchange rate of the EUR/USD currency pair shows the USD amount to be paid for a unit of EUR.
Market value of an option (MtM, mark to market)	All positions in foreign exchange options have a market value. A description of the Mark to Market value of individual transactions is provided in the Information Note on Methodology for the Collateral Announcement relating to the Investment Services Business Regulations. Depending on the above, the value of a foreign exchange option may continuously fluctuate throughout the term.

### 3. Other features of FX options

- Entering into an FX option enables the customer to open a large position by investing a small amount of capital and exploiting the leverage of the derivative transaction (i.e. opening a position that is a multiple of the base capital in both size and risk). When selling an FX option, this could expose the customer to high and potentially unlimited risk. The option may also be unleveraged if the customer deposits the entire nominal value of the option (provides it as collateral).
- After opening a FX option, the customer may decide at any time during the term to close the open position through an offsetting contract. Depending on the current value of the option (and the factors described in the section “Market value of the instrument”), this could potentially involve an unlimited loss or gain.
- The interbank FX market data available to the Bank in terms of breaching the strike price or barrier levels are not necessarily the same as the interbank market data available to the customer, as a result of which the customer must rely on notifications from the Bank for reliable information on whether or not the strike price or barrier levels have been breached. The Bank is therefore the party that calculates whether the strike price or barrier levels have been breached.

## **4. Transaction collateral Initial and variation margin**

### **4.1 Additional leverage**

Foreign exchange option transactions are leveraged. The customer does not need to provide the full nominal value of the trade in order to enter into a FX option; it is enough to deposit a pre-determined percentage of the nominal value of the transaction as an initial margin.

Leveraged trading allows customers to acquire transactions and positions of an amount higher than their invested capital. Leveraged trading has significant risks, including the risk of losing the entire capital and even losses of up to several times the capital invested.

### **4.2 Maintenance margining**

The Bank applies limits and requests the customer to provide collateral against the risks associated with the FX option. The customer is required to provide the margin in the form specified by the Bank (cash or security collateral). Normally, the margin requirement of the derivative product is a pre-determined percentage of the nominal value of the FX option. In case of an unfavourable shift in the FX option price, the Bank may require additional margin. In such a case, the customer is required to provide the additional margin in accordance with the contractual terms, and any losses sustained as a result – which could be substantial – will be borne exclusively by the customer. The Bank determines the additional margin requirement of the FX option based on the current fair market value of the transaction. The collateral (margin) may be released, provided that the reason for pledging the collateral has ceased to exist, at the express request of the customer, on the condition that the Bank's right to collateral under the Global Markets Master Agreement with the Customer shall continue to apply to the Customer's financial instruments and funds over which the Customer has free disposal.

### **4.3 Possibility to unilaterally close a position (forced liquidation)**

The Bank requires collateral for the FX option transaction based on its current fair market value. If, for any reason, the collateral provided by the customer is deemed insufficient by the Bank to cover the financial risk of the positions opened and held by the customer, the Bank may require the customer to provide additional margin. Upon the Bank's call, the customer is required to provide the additional margin in accordance with the contractual terms, and any losses sustained as a result will be borne exclusively by the customer. If the customer fails to provide the required additional margin in accordance with the contractual terms despite being called upon by the Bank, the Bank may decide to liquidate the position, which could involve substantial losses for the customer. Liquidation costs, potential capital losses and the consequences of the failure of liquidation shall be borne exclusively by the customer.

## 5. Closing foreign exchange option transactions

The customer is entitled to request the partial or full closing of any foreign exchange option transaction. A foreign exchange option transaction is closed by mutual agreement of the parties by concluding a transaction for the original currency pair but in the opposite direction (closing transaction). A closing transaction concluded on the closing day for the maturity date of the original transaction can be an option trade, which can be concluded no later than the third business day before the maturity date, or a spot transaction, which can be concluded in the period from the second business day before the maturity date up to and including the maturity date. By closing the position, the Customer realises a profit or loss, which is settled typically on the second banking day after the closing transaction is closed.

If the customer does not request the closing of the foreign exchange option transaction and does not make available the amount required for gross settlement to be paid by the customer on the relevant account by 4:00 p.m. on the settlement day of the foreign exchange option transaction, the Bank shall be entitled to unilaterally close the foreign exchange option transaction with a spot transaction. The Bank will close the FX option transaction by 6:00 p.m. at the latest through an individual spot foreign exchange transaction based on the current interbank foreign exchange market rate.

### Closure of foreign exchange option transactions by the Bank

In the case of a closing event, the Bank is entitled to unilaterally close the FX option.

In the closing process, the Bank will determine the amounts to be paid on the closing day. The Bank determines the payment liability for each Party on a transaction-by-transaction basis. It can discount this amount to the closing date by calculating its present value. In the Fees, the Bank discloses the rate of interest used for discounting. The Bank shall settle accounts with the customer on a net basis at the time of closing. The above shall qualify as an agreement aimed at netting at the closing of the position.

## 6. EXAMPLES

### Plain vanilla options

#### 6.1 Selling a EUR call / HUF put option

##### Baseline

- The customer is certain in the expectation that the EUR/HUF exchange rate will not rise above a certain level at maturity in 6 months' time and wishes to make extra returns by receiving the option premium, while taking on the foreign exchange risk and accepting the maximum possible unlimited loss.

##### Disadvantages

- The instrument is not suitable for hedging against exchange rate risk, because when the EUR/HUF rate falls, the customer will only be able to sell EUR at a lower rate.
- The potential maximum loss to the customer could be unlimited due to the need to sell significantly below the market rate.

##### Example transaction details

Buyer:	OTP Bank Plc.
Seller:	Customer
Class of FX option:	European
Type of FX option:	EUR call / HUF put
Nominal value of the option:	EUR 1,000,000
Strike price:	456.00
Maturity date, option rate observation date:	6 months, CET 12:00
Settlement date:	6 months + 2 banking days
Currency and amount of the option premium:	HUF 18,700,000
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Initial margin requirement of the transaction:	3.95% of the nominal value, i.e. EUR 39,500 (HUF 16,906,000)
Current market rate (spot benchmark):	428.00

##### Assessment of the example transaction

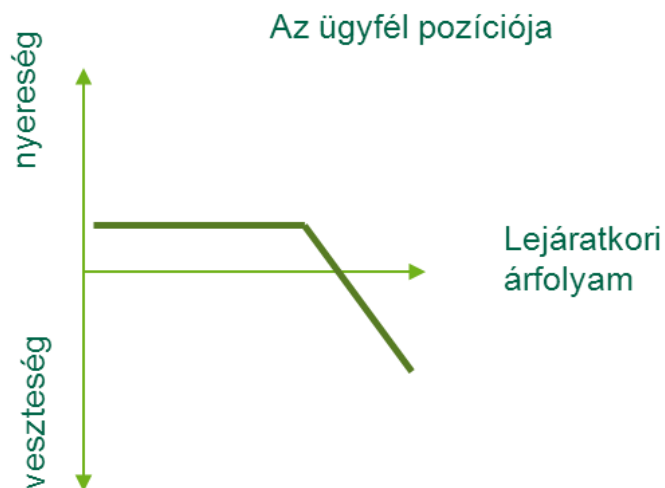
Break-even point of the option at maturity:	474.70
Maximum loss:	Unlimited

Maximum gain:

HUF 18,700,000

### What is expected?

- The customer expects the exchange rate not to appreciate significantly until maturity, and in particular the EUR/HUF rate to remain below the break-even point of 474.70 at maturity.



veszteség: loss

Az ügyfél pozíciója: Customer's position

nyereség: gain

Lejáratkori árfolyam: Exchange rate at maturity



## Market scenarios

### a) The EUR/HUF rate rises to 480.00

- **Closure of the option before the exercise date**

One month after opening the option, with volatility and interest rate levels unchanged, the customer expects the exchange rate to rise further, and decides to realise the loss in order to avoid further losses, repurchasing the short option at HUF 41 per EUR.

#### Details of the closing transaction:

Buyer:	Customer
Seller:	OTP Bank Plc.
Class of FX option:	European
Type of FX option:	EUR call / HUF put
Nominal value of the option:	EUR 1,000,000
Strike price:	456.00
Maturity date, option rate observation date:	5 months, CET 12:00
Settlement date:	5 months + 2 banking days
Currency and amount of the option premium:	HUF 41,000,000
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Current market rate (spot benchmark):	480.00

*Transaction result:  $(18,700,000 - 41,000,000) = \underline{\underline{HUF -22,300,000}}$*

- **Exercise of the option**

The customer is under an obligation to sell at an unfavourable rate in exchange for the option premium. In this case, a spot EUR/HUF foreign exchange sell conversion is generated automatically for the customer at the exchange rate of 456.00 EUR/HUF, to be settled on T+2.

→ The customer settles the transaction through physical delivery, i.e. by selling EUR at HUF 456.00 (in two days, the EUR nominal value will be debited and HUF credited to the accounts specified in the contract).

→ In the course of settlement, the customer buys EUR 1,000,000 for T+2 at 480.00 EUR/HUF to close the spot foreign

exchange conversion resulting from the exercise of the option. The spot buy and sell conversions are settled in net terms as shown below.

$$(456.00 - 480.00) \times 1,000,000 = \text{HUF } -24,000,000$$

$$\text{Transaction result: } 18,700,000 - 24,000,000 = \underline{\text{HUF } -5,300,000}$$

## b) The EUR/HUF rate falls to 410.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate not to drop further and volatility and interest rate levels to remain unchanged, the customer decides to realise the result, and at 1055 points per EUR, repurchases the option sold.

### Details of the closing transaction:

Buyer:	Customer
Seller:	OTP Bank Plc.
Class of FX option:	European
Type of FX option:	EUR call / HUF put
Nominal value of the option:	EUR 1,000,000
Strike price:	456.00
Maturity date, option rate observation date:	5 months, CET 12:00
Settlement date:	5 months + 2 banking days
Currency and amount of the option premium:	HUF 18,700,000
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Current market rate (spot benchmark):	410.00

$$\text{Transaction result: } 18,700,000 - 10,550,000 = \underline{\text{HUF } +8,150,000}$$

- **Expiry without exercise**

The option expires without being exercised because the EUR/HUF exchange rate at 12 noon on the maturity date is below 456.00, eliminating the customer's obligation to sell. The value of the option is reduced to zero. The customer may realise the full amount of the option premium as a gain.

$$\text{Transaction result: } 18,700,000 - 0 = \underline{\text{HUF } +18,700,000}$$

## 6.2 Buying a EUR put / HUF call option

### Baseline

- Due to his business activities (such as export), the customer has to sell EUR in six months, because his sales are generated in EUR, and his expenditures are made in HUF. The customer has no specific expectations for the likely development of the EUR/HUF rate. He seeks to fix the lowest EUR/HUF sell rate to hedge against foreign exchange risk, and benefit from a favourable movement.
- The customer specifically expects the EUR/HUF rate to fall, and, by taking the exchange rate risk, he seeks to make extra earnings from a favourable movement, while also limiting potential maximum loss.

### Disadvantages

- The option premium reduces the result
- The customer needs to finance to option premium

### Example transaction details

Buyer:	Customer
Seller:	OTP Bank Plc.
Class of FX option:	European
Type of FX option:	EUR put / HUF call
Nominal value of the option:	EUR 1,000,000
Strike price:	423.00
Maturity date, option rate observation date:	6 months, CET 12:00
Settlement date:	6 months + 2 banking days
Currency and amount of the option premium:	HUF 6,450,000 (645 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Initial margin requirement of the transaction:	None (the option premium is to be paid)
Expected variation margin on T+1 day:	HUF 6,450,000
Current market rate (spot benchmark):	428.00

### Assessment of the example transaction

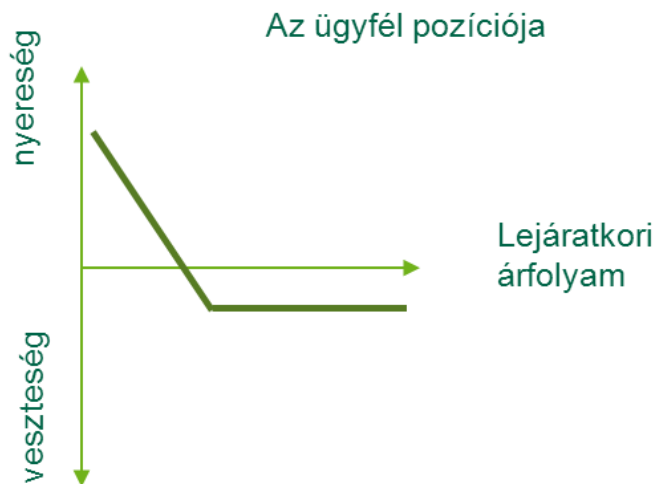
Break-even point of the option at maturity:	416.55
Maximum loss:	HUF 6,450,000

Maximum gain:

Unlimited

**What is expected?**

- The customer expects the exchange rate to depreciate significantly until maturity, when the customer can close the open option position, or the EUR/HUF rate to remain below the break-even point of 416.55 at maturity.



veszteség: loss

Az ügyfél pozíciója: Customer's position

nyereség: gain

Lejáratkori árfolyam: Exchange rate at maturity

## Market scenarios

### a) The EUR/HUF rate rises to 448.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate to rise further and volatility and interest rate levels to remain unchanged, the customer decides to close the position in order to avoid further losses, and at 195 points per EUR, sells the option purchased.

#### Details of the closing transaction:

Buyer:	Customer
Seller:	OTP Bank Plc.
Class of FX option:	European
Type of FX option:	EUR put / HUF call
Nominal value of the option:	EUR 1,000,000
Strike price:	423.00
Maturity date, option rate observation date:	5 months, CET 12:00
Settlement date:	5 months + 2 banking days
Currency and amount of the option premium:	HUF 1,950,000 (195 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Current market rate (spot benchmark):	448.00

*Transaction result: 1,950,000 – 6,450,000 = HUF –4,500,000*

- **Expiry without exercise**

The option expires without being exercised because the EUR/HUF exchange rate at 12 noon on the maturity date (448.00) is higher than the strike price (423.00), therefore the customer is unable to exercise the right purchased. The value of the option is reduced to zero. The EUR may be sold in the market at a better rate.

*Transaction result: 0 – 6,450,000 = HUF –6,450,000*

### b) The EUR/HUF rate falls to 410.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate not to drop further and volatility and interest rate levels to remain

unchanged, the customer decides to realise the result, and at 1120 points per EUR, sells the option purchased.

### Details of the closing transaction:

Buyer:	Customer
Seller:	OTP Bank Plc.
Class of FX option:	European
Type of FX option:	EUR put / HUF call
Nominal value of the option:	EUR 1,000,000
Strike price:	423.00
Maturity date, option rate observation date:	5 months, CET 12:00
Settlement date:	5 months + 2 banking days
Currency and amount of the option premium:	HUF 11,200,000 (1,120 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Current market rate (spot benchmark):	410.00

*Transaction result: 11,200,000 – 6,450,000 = HUF +4,750,000*

- **Exercise of the option**

In exchange for the option premium paid, the customer may sell at a better rate. In this case, a spot EUR/HUF foreign exchange sell conversion is generated automatically for the customer at the exchange rate of 423.00 EUR/HUF, to be settled on T+2.

- The customer settles the transaction through physical delivery, i.e. by selling EUR at HUF 423.00 (in two days, the EUR nominal value will be debited and HUF credited on the corresponding accounts).
- In the course of settlement, the customer buys EUR 1,000,000 for T+2 at 410.00 EUR/HUF to close the spot foreign exchange conversion resulting from the exercise of the option. The spot buy and sell conversions are settled in net terms as shown below.

$$(423.00 - 410.00) \times 1,000,000 = \text{HUF } +13,000,000$$

*Transaction result: 13,000,000 – 6,450,000 = HUF +6,550,000*

## 7. Exotic FX options

### 7.1 Barrier options

A barrier FX option is identical in all parameters to the aforementioned plain vanilla option, except that contracting also involves the specification of one or more barrier(s), so that the right or obligation resulting from the option will be activated or eliminated if the exchange rate breaches that barrier at any time during the term (American barrier), or in a specific period (window barrier) or at a specific date within the term agreed at the time of contracting (European barrier).

#### 7.1.1 Who should invest?

- Investors seeking to reduce the foreign exchange risk resulting from their foreign exchange exposures at a lower cost or better exchange rate compared to a plain vanilla option of similar parameters accept that certain option strategies will not provide a complete hedge.
  - With exotic foreign exchange options, customers may, at lower cost, take positions that provide partial or conditional protection against exchange rate risk while deriving a greater benefit from potential favourable exchange rate movements.
- The transaction is recommended to investors with specific and particular expectations for the movements of the currency pair concerned, who seek to benefit from favourable exchange rate movements, and to make extra returns by taking exchange rate risk through an exchange rate structure that is more complex and more unique than a plain vanilla option of similar parameters.
  - Buying barrier options enables investors to develop a strategy that limits maximum loss and is cheaper than a plain vanilla option of similar parameters. However, with a barrier option, there may be additional risk relative to plain vanilla options from breaching or failure to breach the barrier level.

- By selling barrier options, customers may undertake obligations at an exercise level adjusted to their own risk appetite in exchange for the option premium. Setting the barrier level at the time of contracting enables the customer to tailor the size of risk (by specifying knock-in or knock-out levels) compared to a plain vanilla option of similar parameters. In such an arrangement the customer is exposed to unlimited exchange rate risk, and there is a possibility of incurring unlimited loss.

### 7.1.2 Types of FX option by barrier

#### Knock-in option:

The buyer of a knock-in barrier FX option acquires the right to buy or sell a pre-determined amount of foreign exchange at a pre-determined price (strike price) on a pre-determined maturity date, **but only if the barrier level is breached** by the foreign exchange market quotes available to the Bank **at any time** during the term of the option (**taking into consideration the time limit on the knock-in level, if applicable**). In exchange for the option premium, the option seller undertakes an obligation to buy or sell the foreign exchange when the option is exercised, provided that **the barrier level is breached** by the foreign exchange market quotes available to the Bank **at any time** during the term of the option. Accordingly, the breach of the barrier level will activate a plain vanilla option and the associated right or obligation.

#### Knock-out option:

The buyer of a knock-out barrier FX option acquires the right to buy or sell a pre-determined amount of foreign exchange at a pre-determined price (strike price) on a pre-determined maturity date, **but only if the barrier level is not breached** by the foreign exchange market quotes available to the Bank during the term of the option (**taking into consideration the time limit on the knock-out level, if applicable**). In exchange for the option premium, the option seller undertakes an obligation to buy or sell the foreign exchange when the option is exercised, provided that



**the barrier level is not breached** by the foreign exchange market quotes available to the Bank at any time during the term of the option. Accordingly, the breach of the barrier level will eliminate the option and the associated right or obligation.

#### **Double knock-in option:**

The buyer of a double knock-in barrier FX option acquires the right to buy or sell a pre-determined amount of foreign exchange at a pre-determined price (strike price) on a pre-determined maturity date, **but only if either of the two barrier levels is breached** by the foreign exchange market quotes available to the Bank **at any time** during the term of the option (**taking into consideration the time limit on the knock-in level, if applicable**). In exchange for the option premium, the option seller undertakes an obligation to buy or sell the foreign exchange when the option is exercised, provided that **either of the two barrier levels is breached** by the foreign exchange market quotes available to the Bank at any time during the term of the option. Accordingly, the breach of either of the two barrier levels will activate a plain vanilla option and the associated right or obligation.

#### **Double knock-out option:**

The buyer of a double knock-out barrier FX option acquires the right to buy or sell a pre-determined amount of foreign exchange at a pre-determined price (strike price) on a pre-determined maturity date, but only if **neither of the two barrier levels is breached** by the foreign exchange market quotes available to the Bank during the term of the option (taking into consideration the time limit on the knock-out level, if applicable). In exchange for the option premium, the option seller undertakes an obligation to buy or sell the foreign exchange when the option is exercised, provided that **neither of the two barrier levels is breached** by the foreign exchange market quotes available to the Bank at any time during the term of the option. Accordingly, the breach of

either of the two barrier levels will eliminate the option and the associated right or obligation.

**Window barrier option:**

A window barrier option is an alternative form of barrier options where the barrier level is not monitored throughout the entire term from the moment of the trade to maturity, but is narrowed down to a continuous interval within the term. The barrier levels are only active in this narrower time window.

## 7.2 Digital (binary) options

A digital FX option is a special option where the option buyer becomes eligible for a payout (option payout) when certain conditions are met. Instead of a strike price, digital FX options involve the specification of one or several barriers. A payout under a digital option will be made if, depending on the type of barrier used, the FX market quotes available to the Bank breach, or respectively, fail to breach the pre-determined barrier level(s) at any time during the term of the option. A future payout under a digital option will only be made to the option buyer if the condition of the option has been met. The amount of the contingent payout is already known at the time of contracting. There are only two possible scenarios at maturity: either the buyer will receive a full payout or the amount of the payout will be zero when the option has expired. The option premium is set as a percentage of the payout. The amount of the option payout is paid on the settlement date.

### **One touch:**

If the digital option breaches the barrier during the term of the transaction, the buyer of the option will be eligible for the option payout.

### **No touch:**

If the digital option does not breach the barrier on the interbank foreign exchange market during the term of the transaction, the buyer of the option will be eligible for the option payout.

### **Double one touch:**

If the digital option breaches either of the two barriers, specified at the time of contracting, on the interbank foreign exchange market during the term of the transaction, the buyer of the option will be eligible for the option payout.

### **Double no touch:**

If the digital option does not breach either of the two barriers, specified at the time of contracting, on the interbank foreign exchange market during the term of the transaction, the buyer of the option will be eligible for the option payout.

### 7.2.1 Who should invest?

- Investors with specific expectations for the direction and extent of the movements of the currency pair concerned (underlying product), seeking to benefit from favourable exchange rate movements and to make extra returns by taking exchange rate risk. The Bank offers the digital option product only to professional or eligible counterparties.
  - When buying digital options, the customer can adjust the digital barrier levels to his exchange rate expectations. Maximum loss is capped at the amount of the option premium paid. A payout will be made under the option where the expectations are satisfied, and no payout will be made in the event of a shift in the wrong direction. The amount of the payout is known at the time of contracting.

## 8. EXAMPLES

### Barrier options

#### 8.1 Selling a EUR call / HUF put option with a knock-in level

##### Baseline

- The customer is certain in the expectation that the EUR/HUF exchange rate will not breach a certain level during the entire term of the option or, even if it does, it will not be higher than a certain level at maturity in 6 months' time. By taking the exchange rate risk, he seeks to make extra earnings from the option premium, while also taking the risk of a potentially unlimited maximum loss.

##### Disadvantages

- The trade is not suitable for hedging against exchange rate risk, because when the EUR/HUF rate falls, the customer will only be able to sell EUR at a lower rate.
- By taking the exchange rate risk, the customer could be exposed to a potentially unlimited maximum loss due to the need to sell significantly below the current rate when the knock-in level is breached by the market rate.

## Example transaction details

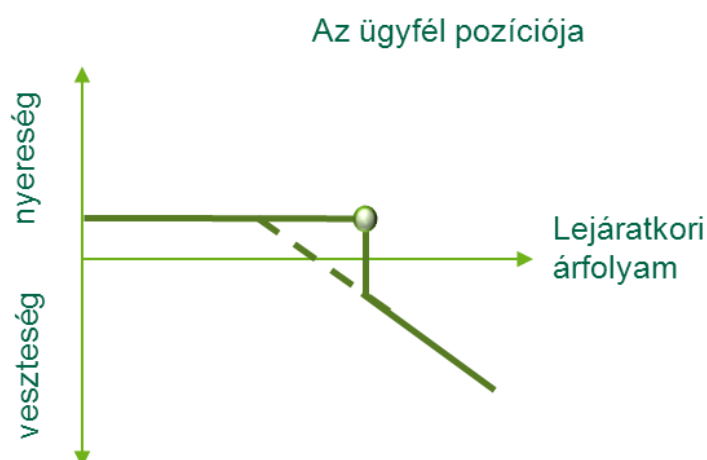
Buyer:	OTP Bank Plc.
Seller:	Customer
Class of foreign exchange option:	European
Type of foreign exchange option:	EUR call / HUF put
Nominal value of the option:	EUR 1,000,000
Strike price:	430.00
Barrier (knock-in):	440.00
Maturity date, option rate observation date:	3 months, CET 12:00
Settlement date:	3 months + 2 banking days
Currency and amount of the option premium:	HUF 19,100,000 (1910 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Initial margin requirement of the transaction:	3.95% of the nominal value, i.e. EUR 39,500 (HUF 16,906,000)
Current market rate (spot benchmark):	428,00

## Assessment of the example transaction

Break-even point of the option at maturity:	449.10
Maximum loss:	Unlimited
Maximum gain:	HUF 19,100,000

## What is expected?

- The customer expects the EUR/HUF rate not to appreciate significantly, and in particular that it would remain below 440.00 until maturity.



veszteség: loss

nyereség: gain

## Market scenarios

### a) The EUR/HUF rate rises to 448.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate to rise further and volatility and interest rate levels to remain unchanged, the customer decides to realise the result in order to avoid further losses, and at 1550 points per EUR, repurchases the option sold.

$$\text{Transaction result: } 19,100,000 - 15,500,000 = \text{HUF } +3,600,000$$

- **Exercise of the option**

The customer is under an obligation to sell at an unfavourable rate in exchange for the option premium. In this case, a spot EUR/HUF foreign exchange sell conversion is generated automatically for the customer at the exchange rate of 430.00 EUR/HUF, to be settled on T+2.

→ The customer settles the transaction through physical delivery, i.e. by selling EUR at HUF 430.00 (in two days, the EUR nominal value will be debited and HUF credited on the corresponding accounts).

→ In the course of settlement, the customer buys EUR 1,000,000 for T+2 at 448.00 EUR/HUF to close the spot foreign exchange conversion resulting from the exercise of the option. The spot buy and sell conversions are settled in net terms as shown below.

$$(430.00 - 448.00) \times 1,000,000 = \text{HUF } -18,000,000$$

$$\text{Transaction result: } 19,100,000 - 18,000,000 = \underline{\text{HUF } +1,100,000}$$

### b) The EUR/HUF rate falls to 410.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate not to drop further and volatility and interest rate levels to remain

unchanged, the customer decides to realise the result, and at 750 points per EUR, repurchases the option sold.

*Transaction result:  $19,100,000 - 7,500,000 = \underline{\text{HUF } +11,600,000}$*

- **Expiry without exercise**

The option expires without being exercised, eliminating the customer's obligation to sell. The value of the option is reduced to zero. The customer may realise the full amount of the option premium as a gain.

*Transaction result:  $19,100,000 - 0 = \underline{\text{HUF } +19,100,000}$*

## 8.2 Buying a EUR put / HUF call option with a knock-out level

### Baseline

- The customer is certain in the expectation that the EUR/HUF exchange rate will depreciate in 6 months' time and seeks to benefit from the favourable movement to make extra returns. The barrier (knock-out level) makes this option much cheaper to buy compared to a plain vanilla option; however, the customer will also be exposed to higher risk because when the knock-out level is breached by the exchange rate, the right under the option and consequently the position itself will be terminated.

### Disadvantages

- The instrument is not suitable for hedging against exchange rate risk, because when the knock-out level has been breached by the current market rate, the customer will no longer be able to exercise the right to sell, which will eliminate the protection, and potentially force the customer to sell EUR at a much more unfavourable rate.
- The customer may incur a loss from the option premium to be paid, because with the EUR/HUF rate rising, he will not exercise the right under the option, and if the knock-out level is breached by the current exchange rate, s/he will be unable to exercise the right to sell, and the position will be terminated completely.



## Example transaction details

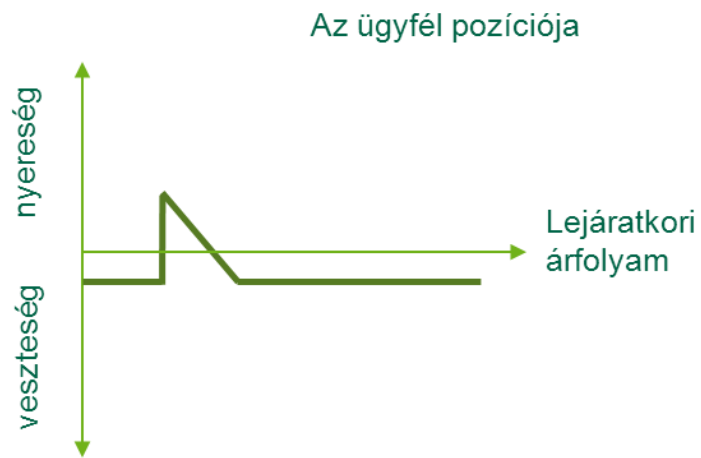
Buyer:	Customer
Seller:	OTP Bank Plc.
Class of foreign exchange option:	European
Type of foreign exchange option:	EUR put / HUF call
Nominal value of the option:	EUR 1,000,000
Strike price:	421.00
Barrier (knock-out):	412.00
Maturity date, option rate observation date:	6 months, CET 12:00
Settlement date:	6 months + 2 banking days
Currency and amount of the option premium:	HUF 1,350,000 (135 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Initial margin requirement of the transaction:	None (the option premium is to be paid)
Expected variation margin on T+1 day:	HUF 1,350,000
Current market rate (spot benchmark):	428.00

## Assessment of the example transaction

Break-even point of the option at maturity:	35419,65
Maximum loss:	HUF 1,350,000
Maximum gain:	Unlimited

## What is expected?

- The customer expects the exchange rate to depreciate until maturity, but not significantly (without breaching the 412.00 level), where the open option can be closed, or the EUR/HUF rate to remain below 421.00 at maturity.



veszteség: loss

Az ügyfél pozíciója: Customer's position

nyereség: gain

Lejáratkori árfolyam: Exchange rate at maturity

## Market scenarios

### a) The EUR/HUF rate rises to 430.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate to rise further and volatility and interest rate levels to remain unchanged, the customer decides to realise the result in order to avoid further losses, and at 10 points per EUR, sells the option purchased.

*Transaction result:  $100,000 - 1,350,000 = \underline{\underline{HUF -1,250,000}}$*

- **Expiry without exercise**

The option expires without being exercised, preventing the customer to exercise the right purchased. The value of the option is reduced to zero. The EUR/HUF may be sold in the market at a better rate.

*Transaction result:  $0 - 1,350,000 = \underline{\underline{HUF -1,350,000}}$*

### b) The EUR/HUF rate falls to 414.00

- **Closure of the option before the exercise date**

One month after opening the option, expecting the exchange rate not to drop further and volatility and interest rate levels to remain unchanged, the customer decides to realise the result, and at 20 points per EUR, sells the option purchased.

*Transaction result:  $200,000 - 1,350,000 = \underline{\underline{HUF -1,150,000}}$*

- **Exercise of the option (if the exchange rate has not breached the 412.00 level at any time during the term)**

In exchange for the option premium paid, the customer may sell at a better rate. In this case, a spot EUR/HUF foreign exchange sell conversion is generated automatically for the customer at the exchange rate of 421.00 EUR/HUF, to be settled on T+2.

→ The customer settles the transaction through physical delivery, i.e. by selling EUR at HUF 421.00 (in two days, the EUR nominal value will be debited and HUF credited on the corresponding accounts).

→ In the course of settlement, the customer buys EUR 1,000,000 for T+2 at 414.00 EUR/HUF to close the spot foreign exchange conversion resulting from the exercise of the option. The spot buy and sell conversions are settled in net terms as shown below.

$$(421.00 - 414.00) \times 1,000,000 = \text{HUF } +7,000,000$$

$$\text{Transaction result: } 7,000,000 - 1,350,000 = \underline{\text{HUF } +5,650,000}$$

## 9. Option strategies

Individual FX options may be integrated within a strategy based on consultations between the Bank and the customer. Individual FX options integrated within a strategy tend to have a lower combined initial margin requirement, not to exceed the sum of the initial margin requirements calculated separately for each strategy transaction. Strategic integration is only available for individual transactions contracted with the Bank, which, for the purposes of its records, the Bank will treat as individual transactions integrated within a strategy. Strategic integration may be terminated unilaterally by either the Bank or the customer.

Individual transactions included in the strategy to be developed according to the customer's intentions will be contracted by the Bank as individual transactions, and the terms of each transaction will also be confirmed individually. Strategic integration will be implemented once all of the individual transactions included in the strategy have been contracted. In legal terms, the fact of strategic integration will not terminate the status of the constituent transactions as individual legal transactions, and neither will strategic integration create a new transaction.

The cancellation or termination of any individual transactions included in the strategy will result in the cancellation of the strategy. In the event of the option strategy being cancelled or terminated for whatever reason, the amount of the initial and variation margins will be determined on the basis of the individual transactions, the sum of which tends to exceed the combined margin requirement of the individual transactions integrated within the strategy. The customer is required to provide the additional margin in accordance with the contractual terms, and any losses sustained as a result – which could be substantial – will be borne exclusively by the customer.

Before adopting a decision on the development of an option strategy, it is recommended that the customer assess his investment purpose, the investment horizon, the hedging purpose, the advantages and

disadvantages of the option strategy, and in particular the costs of developing the strategy, its impact on the option premium, the range of gains and losses on the options integrated within the strategy, and the amount of gains and losses.

## 9.1 Types of option strategy accepted by the Bank

An option strategy is a complex option position established by opening a number of individual options. An option strategy accepted by the Bank may only integrate individual options for **identical underlying instruments**, **identical volumes**, and **identical exercise dates**.

### Risk reversal options

#### Call and Put options integrated in a strategies

	RISK REVERSAL	RISK REVERSAL
	Buying a Call option and selling a Put option with different strike prices.	Selling a Call option and buying a Put option with different strike prices.
<b>Initial margin</b>	The initial margin requirement is equal to the put option's one.	The initial margin requirement is equal to the call option's one.
<b>Expectation</b>	The exchange rate will not move downwards.	The exchange rate will not move upwards.

### Short options

#### integrated within a strangle / straddle strategy

	STRANGLE	STRADDLE
<b>SELL</b>	One Call and one Put option with different strike prices.	One Call and one Put option with identical strike prices.
<b>Initial margin</b>	The greater of the initial margins required for the Call and Put options.	The greater of the initial margins required for the Call and Put options.
<b>Expectation</b>	The exchange rate will move in a range without any major moves in either direction.	The exchange rate will move in a narrow range without any meaningful moves in either direction.

## Long options integrated within a strangle / straddle strategy

	STRANGLE	STRADDLE
<b>BUY</b>	One Call and one Put option with different strike prices.	One Call and one Put option with identical strike prices.
<b>Initial margin</b>	None. The option premium on the Call and Put options is to be paid.	None. The option premium on the Call and Put options is to be paid.
<b>Expectation</b>	The exchange rate will break out of a range with a major move in either direction (whether up or down is irrelevant).	The exchange rate will break out of a narrow range with a move in either direction (whether up or down is irrelevant).

## Short spread strategy

	CALL SPREAD	PUT SPREAD
<b>SELL</b>	Call option at a given strike price.	Put option at a given strike price.
<b>BUY</b>	Call option at a higher strike price.	Put option at a lower strike price.
<b>Initial margin</b>	The absolute value of the difference between the strike prices of the two options, multiplied by the nominal value.	The absolute value of the difference between the strike prices of the two options, multiplied by the nominal value.
<b>Expectation</b>	The exchange rate will not move upwards (+protection against an extreme upward move).	The exchange rate will not move downwards (+protection against an extreme downward move).

## Long spread strategy

	CALL SPREAD	PUT SPREAD
BUY	Call option at a given strike price.	Put option at a given strike price.
SELL	Call option at a higher strike price.	Put option at a lower strike price.
<b>Initial margin</b>	None. The difference between the option premiums on the two options is to be paid.	None. The difference between the option premiums on the two options is to be paid.
<b>Expectation</b>	The exchange rate will move upwards, but not to reach extremely high levels.	The exchange rate will move downwards, but not to reach extremely low levels.

## Short KO forward strategy

	KO FORWARD
SELL	Call option with the same strike price and the same knock-out barrier level.
BUY	Put option with the same strike price and the same knock-out barrier level.
<b>Initial margin</b>	The initial margin requirement for the short call option.
<b>Expectation</b>	The exchange rate will move downwards, but not to reach extremely low levels.



## Long KO forward strategy

	KO FORWARD
<b>SELL</b>	Put option with the same strike price and the same knock-out barrier level.
<b>BUY</b>	Call option with the same strike price and the same knock-out barrier level.
<b>Initial margin</b>	The initial margin requirement for the short put option.
<b>Expectation</b>	The exchange rate will move upwards, but not to reach extremely high levels.

## Call and Put options arranged in Seagull strategy

	SEAGULL	SEAGULL
	Buying a Call option and selling a Call option with a higher strike price and selling a Put option with the lowest strike price.	Buying a Put option and selling a Put option with a lower strike price and selling a Call option with the highest strike price.
<b>Initial margin</b>	The initial margin requirement is equal to the put option's one.	The initial margin requirement is equal to the call option's one.
<b>Expectation</b>	The exchange rate will move upwards	The exchange rate will move downwards

## 9.2 Strategies for barrier options

Similarly to the plain vanilla type, barrier options may be integrated within the above strategies, following the principle that when a strategy is applied, individual options will be contracted, of which all or none will be active. An active option is defined as a right associated with an option the exercise of which does not require the occurrence of a barrier event (e.g. a knock-out barrier option). On that basis, plain vanilla and knock-out barrier options may be integrated within the above option strategies, but a knock-in option may only be integrated with other knock-in options within the same strategy.

### Types allowing integration

- Plain vanilla and plain vanilla
- Plain vanilla and KO barrier
- KO barrier and KO barrier
- KI barrier and KI barrier

## 10. EXAMPLES

### Option strategies

#### 10.1 Short EUR/HUF KO forward strategy

##### Baseline

- The customer is certain that the EUR/HUF exchange rate will not depreciate significantly in 6 months. Based on this expectation the customer can specify a knock-out barrier at a level that enables him to take a sell position at a rate significantly above the forward rate. Therefore, he takes the risk of having the right under the option, and consequently the option itself, cancelled in the event that the knock-out level is breached by the exchange rate. When the strategy is applied, the positions taken on the basis of the individual transactions collectively correspond to a synthetic forward position, exposing the customer to a potentially unlimited maximum loss.

##### Disadvantages

- The instrument is not suitable for hedging against exchange rate risk, because when the knock-out level has been breached by the current market rate, the customer will no longer be able to exercise the right to sell, which will eliminate the protection, and potentially force the customer to sell EUR at a much more unfavourable rate.
- The customer is under an obligation to sell EUR at a pre-determined level, which could expose him to a potentially unlimited loss in the event of a rise in the EUR/HUF rate. When the knock-out level has been breached by the current exchange rate, he will be unable to exercise the right to sell, and the position will be terminated.

##### Example transaction details

The strategy is comprised of one individual short EUR call / HUF put option and one individual long EUR put / HUF call option, where both options have the same knock-out barrier, the same strike price (typically above the market rate), and the same volume and expiry. The option premium received for the short option equals the premium paid for the long option, amounting to a “zero cost” strategy.

1.

Buyer:	OTP Bank Plc.
Seller:	Customer
Class of foreign exchange option:	European
Type of foreign exchange option:	EUR call / HUF put
Nominal value of the option:	EUR 1,000,000
Strike price:	472.00
Barrier (knock-out):	395.00
Maturity date, option rate observation date:	6 months, CET 12:00
Settlement date:	6 months + 2 banking days
Currency and amount of the option premium:	HUF 12,500,000 (1250 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Initial margin requirement of the individual transactions contracted as part of the strategy:	3.95% of the nominal value, i.e. EUR 39,500 (HUF 16,906,000)
Current market rate (spot benchmark):	428.00

2.

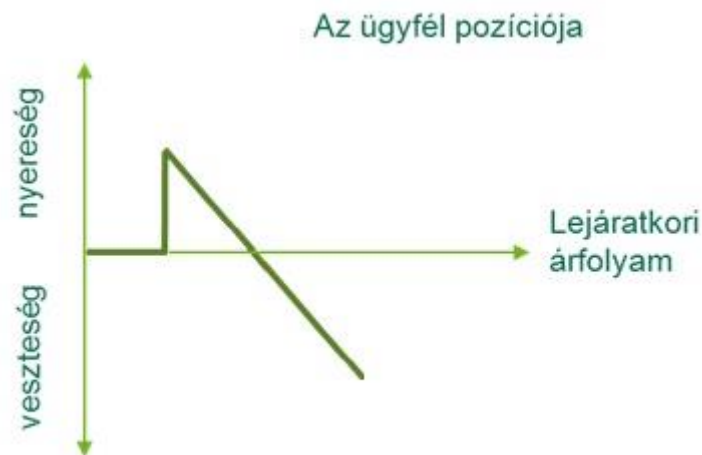
Buyer:	Customer
Seller:	OTP Bank Plc.
Class of foreign exchange option:	European
Type of foreign exchange option:	EUR put / HUF call
Nominal value of the option:	EUR 1,000,000
Strike price:	472.00
Barrier (knock-out):	395.00
Maturity date, option rate observation date:	6 months, CET 12:00
Settlement date:	6 months + 2 banking days
Currency and amount of the option premium:	HUF 12,500,000 (1250 points per EUR)
Payment date of the option premium:	Trade date + 2 banking days (T+2)
Initial margin requirement of the individual transactions contracted as part of the strategy:	None
Current market rate (spot benchmark):	428.00

## Assessment of the example transaction

Break-even point of the option at maturity:	472.00
Maximum loss:	Unlimited
Maximum gain:	Unlimited

## What is expected?

- The customer expects the exchange rate to depreciate until maturity, but not significantly (without breaching the 395.00 level), where the open option can be closed at a profit, or the EUR/HUF rate to remain below 472.00 at maturity. On opening the position, this leads the customer to sell EUR at a rate (472.00) that is higher than the current forward rate.



veszteség: loss

Az ügyfél pozíciója: Customer's position

nyereség: gain

Lejáratkori árfolyam: Exchange rate at maturity

## Market scenarios

### a) The EUR/HUF rate rises to 448.00

- Closure of individual options integrated within the strategy before the exercise date**

One month after opening the option, expecting the exchange rate to rise further and volatility and interest rate levels to remain unchanged, the customer decides to realise the result in order to avoid further losses, and at a cost of 550 points per EUR, closes the options integrated within the strategy.

*Result of the transactions integrated within the strategy:*

$$+ 12,500,000 - 12,500,000 - 18,700,000 + 13,200,000 = \underline{\underline{HUF -5,500,000}}$$

- **Exercise of the individual options integrated within the strategy (if the exchange rate has not breached the 395.00 level at any time during the term)**

The customer is under an obligation to sell at a higher rate compared to the market rate. In this case, a spot EUR/HUF foreign exchange sell conversion is generated automatically for the customer at the exchange rate of 472.00 EUR/HUF, to be settled on T+2.

- The customer settles the transaction through physical delivery, i.e. by selling EUR at HUF 472.00 (in two days, the EUR nominal value will be debited and HUF credited on the corresponding accounts).
- In the course of settlement, the customer buys EUR 1,000,000 for T+2 at 448.00 EUR/HUF to close the spot foreign exchange conversion resulting from the exercise of the option. The spot buy and sell conversions are settled in net terms as shown below.

$$(472.00 - 448.00) \times 1,000,000 = HUF +24,000,000$$

*Result of the individual transactions integrated within the strategy:*

$$+ 12,500,000 - 12,500,000 + 8,000,000 = \underline{\underline{HUF +8,000,000}}$$

## b) The EUR/HUF rate falls to 410.00

- **Closure of individual options integrated within the strategy before the exercise date**

One month after opening the position taken by contracting the individual options integrated within the strategy, expecting the

exchange rate not to drop further and volatility and interest rate levels to remain unchanged, the customer decides to realise the result, and at the cost of 130 points per EUR, closes the options contracted in application of the strategy.

*Result of the individual transactions contracted in application of the strategy:*

$$12,500,000 - 12,500,000 - 6,300,000 + 7,600,000 = \underline{HUF +1,300,000}$$

- **Exercise of the individual options contracted in application of the strategy (if the exchange rate has not breached the 395.00 level at any time during the term)**

The customer has the right to sell at a much better rate compared to the market rate. In this case, a spot EUR/HUF foreign exchange sell conversion is generated automatically for the customer at the exchange rate of 472.00 EUR/HUF, to be settled on T+2.

→ The customer settles the transaction through physical delivery, i.e. by selling EUR at HUF 472.00 (in two days, the EUR nominal value will be debited and HUF credited on the corresponding accounts).

→ In the course of settlement, the customer buys EUR 1,000,000 for T+2 at 410.00 EUR/HUF to close the spot foreign exchange conversion resulting from the exercise of the option. The spot buy and sell conversions are settled in net terms as shown below.

$$(472.00 - 410.00) \times 1,000,000 = HUF +62,000,000$$

*Result of the individual transactions contracted in application of the strategy:*

$$+12,500,000 - 12,500,000 + 62,000,000 = \underline{HUF +62,000,000}$$

# 11. Summary of the risks of foreign exchange option transactions

## Market value of the instrument

All positions in foreign exchange options have a market value. The market value of an FX option is determined by changes in the exchange rate of the underlying currency pair, its volatility, the market yields for the given maturity, the strike price or, in the case of exotic options, the barrier level(s), and the term remaining until maturity. The higher the fluctuation (volatility) of the underlying currency pair, the riskier the investment is considered.

Data on the volatility of the price of a financial instrument at a specific time or in the past cannot necessarily be used as a basis for reliable predictions on the future volatility of the price of the same financial instrument; consequently, information on future volatility are generally based on estimates and cannot provide guarantees for the investor.

## Impact on balance sheet

As the market value of FX options depends on changes in exchange rates and returns, the market value of the transaction may continuously change during the term of the contract. During the term of the transaction the customer's balance sheet may register a significant negative market value. If the transaction is closed before maturity, the customer may even incur a significant loss. Potential loss on the product is unlimited.

## Additional leverage

The product is a leveraged product. The customer is not required to provide the total strike amount at the time of the transaction in order to conclude an FX option transaction; it is sufficient to deposit a pre-determined percentage of the transaction value as collateral. Leveraged trading allows customers to acquire transactions and positions of an amount higher than their invested capital. Leveraged trading has significant risks, including the risk of losing the entire capital and even losses of up to several times the capital invested.



## **Additional cost of capital, margining**

The Bank applies limits and requests the customer to provide collateral against the risks associated with the FX option. The customer is required to provide the margin in the form specified by the Bank (cash or security collateral). Normally, the collateral requirement for the product is a pre-determined percentage of the nominal value of the FX option transaction, which may be unilaterally modified by the Bank. In the case of any unfavorable shift in prices, the Bank may require additional margin (i.e. collateral). At the Bank's request, the customer is required to provide the additional margin in accordance with the terms of the contract, and any (potentially high) losses sustained as a result are to be borne exclusively by the customer. The Bank determines the additional margin requirement of the FX option based on the current fair market value of the transaction. The margin (i.e. collateral) may be released if the reason for its blocking has ceased to exist, at the express request of the customer, on the condition that the Bank's right to collateral under the Global Markets Master Agreement with the customer shall continue to apply to the customer's financial instruments and funds over which the customer has free disposal.

## **Possibility to unilaterally close a position (forced liquidation)**

The bank requires collateral for the FX option transaction based on its current fair market value. If, for any reason, the collateral provided by the customer is deemed insufficient by the Bank to cover the financial risk of the positions opened and held by the customer, the Bank may require the customer to provide additional margin. At the Bank's request, the customer is required to provide the additional margin in accordance with the terms of the contract, and any losses sustained as a result are to be borne exclusively by the customer. If the customer fails to provide the required additional margin in accordance with the terms of the contract despite the Bank's request, the Bank may decide to liquidate the position, which could involve substantial losses for the customer. Liquidation costs, potential exchange losses and the consequences of the failure of liquidation shall be borne exclusively by the customer.

## **Sale or purchase obligation at a pre-fixed exchange rate**

Under the terms and conditions agreed at the time of concluding a short FX option transaction, the customer is required to purchase/sell the underlying currency on the maturity date at the strike price agreed at the time of contracting.

## **Selling plain vanilla and exotic options**

The product is not suitable for hedging in full against exchange rate risk. The potential maximum loss to the customer could be unlimited due to the need to sell significantly below the market rate.

## **Buying a plain vanilla option**

The option premium reduces the customer's profit  
The customer needs to finance the option premium

## **Buying an exotic option with a knock-out level**

The instrument is not suitable for hedging against exchange rate risk because when the knock-out level has been breached by the current market rate, the customer will no longer be able to exercise the right to sell, which will eliminate the protection, and potentially force the customer to sell EUR at a much more unfavourable rate.

The customer may incur a loss from the option premium to be paid, because with the exchange rate rising, s/he will not exercise the right under the option, and if the knock-out level is breached by the current exchange rate, s/he will be unable to exercise the right to sell, and the position will be terminated completely.

## **Short EUR/HUF KO forward strategy**

The instrument is not suitable for hedging against exchange rate risk because when the knock-out level has been breached by the current market rate, the customer will no longer be able to exercise the right to sell, which will eliminate the protection, and potentially force the customer to sell EUR at a much more unfavourable rate.

The customer has the obligation to sell at a pre-defined level and this may result in unlimited loss if the exchange rate rises. If the knock-out level is breached by the current exchange rate, the customer will be unable to exercise the right to sell, and the position will be terminated.

## 12. Miscellaneous information

### Prerequisites for access to FX options

- Concluding the Global Markets Master Agreement, which is annexed to OTP Bank Plc.'s Investment Services Business Regulation, with the Bank and signing any other required documents
- Concluding agreements for payment accounts denominated in the settlement currency of the transaction
- Meeting the margin requirements specified by the Bank
- Availability of the declarations on prior information, as required by Act CXXXVIII of 2007 on Investment Firms and Commodity Dealers, and on the Regulations Governing their Activities ('Act on Investment Firms').

### Guarantees linked to FX options

Coverage available under the National Deposit Insurance Fund (OBA) and the Investor Protection Fund (BEVA) is not applicable to OTC FX options.

### Fees and charges related to FX options

The Bank's quotation pertaining to FX options includes all direct fees and charges. It does not include any indirect costs related to obtaining and holding the financial instrument or to the conclusion, maintenance and performance of the contract (e.g. fee, commission, tax, account management).

### Tax implications of FX options

OTP Bank Plc. complies with the tax obligations imposed on payment agents in accordance with the legal provisions as in force at any time, which may differ depending on the tax status (e.g. tax residence) of the beneficiary and the legal title of the income. In performing its tax payment obligations, OTP Bank Plc. issues a voucher on the payment and, in the case of payments made to private individuals, it complies with its tax obligations set out in the applicable legal provisions.

Please note that adequate information regarding the tax treatment or the tax implications may only be provided in consideration of the individual circumstances of each customer and may be subject to change in the future.

### **Miscellaneous information**

For general further information, please refer to OTP Bank Plc.'s Standard Prior Information Announcement, OTP Bank Plc.'s Investment Services Business Regulation (Investment Services Business Regulations), including Annex A, constituting an integral part thereof, the General Terms and Conditions for Global Markets Services, the announcements constituting annexes to the Investment Services Business Regulations, the Global Markets Framework Agreement template and the Fees, the MIFID Customer Information, the EMIR announcement and the announcements and annexes referred to therein, which are available on the website <http://www.otpbank.hu>. Information may also be obtained at the branches of OTP Bank Plc.

## 13. Notices and disclaimers

1. This product information is complete with the following documents of OTP Bank Plc. as inseparable annexes hereto:

- Standard Prior Information Announcement, individual product information materials and any documents attached thereto along with all referenced business terms and notices;
- Information for Clients on MiFID;
- Announcement on compliance with certain provisions of the EMIR – in respect of investment services;
- OTP Bank Plc.'s Investment Services Business Regulation, including, in particular, the General Terms and Conditions for Global Markets Services, which form an integral part thereof, and the business regulations, announcement and annexes referred to therein, the Global Markets Master Agreement template and any other related documents required,
- General Business Terms and Conditions of OTP Bank Plc. and documents attached thereto along with all referenced notices;
- Prospectuses, base prospectuses, notices, as well as regular and extraordinary announcements published by the issuer or the broker in relation to individual financial instruments.

Please read all of the above documents and any other notices referenced or indicated therein in order to ensure that you can make informed decisions, in full awareness of all information pertaining to the transactions presented in this Product Information. Moreover, before making an informed decision about the use of the investment or the service, please be advised to carefully consider the subject and risk of your investment, the associated fees and charges and the possibility of potential losses, and to obtain information regarding the tax regulations pertaining to the product or the investment. Prices of financial instruments and securities are subject to change. Spot trades are transacted at the current exchange rate, which may involve a capital loss.

2. The publication of this Product Information and its transfer to customers do not constitute an offer, investment advice, tender notice, investment consulting, investment or financial analysis, solicitation for the purchase of any financial instrument, or any other kind of advice on legal, tax, or accounting issues, and the data provided herein are provided for informational purposes, intended solely as the provision of advance information to OTP Bank Plc.'s current and future customers as required by law. The contents of this information document are limited to general information and knowledge and as such, it disregards the unique or specific needs of individual customers and their willingness and ability to take risk; therefore, in case of any questions, please contact our staff or refer to your bank consultant before making an investment decision. Should you require investment advice from OTP Bank Plc. prior to making your decision, please contact our staff with a view to concluding an investment counselling agreement and making the necessary statements (particularly a suitability test).

3. Each investment carries certain risks that can affect the outcome of the investment decision, and investors may not necessarily realise their expected investment goal or recover their cost of the investment; accordingly, some or all of the invested capital may be lost, and may also incur additional payment obligations.

4. The information in this prospectus cannot serve as a reliable basis for conclusions concerning prospective future yields, changes or performance. The graphs and calculations contained herein are for illustrative purposes only and are intended to demonstrate alternative scenarios. In no case should they be construed as illustrating specific transactions, even if the customer has a transaction with identical or similar characteristics. No estimates may be made based on the data contained herein concerning either the current or the future level of interest rates/prices, or expected interest rate/price developments. The data contained herein cannot be regarded as information on the changes or performance of particular financial instruments, whether past or future. The risk of specific individual decisions and investments made on the basis of this information is borne

solely by you, and OTP Bank Plc shall not be held liable for the success of investment decisions or the achievement of the target set by you.

**5.** Nothing in this Prospectus constitutes OTP Bank Plc. acting as agent, nominee or otherwise for or on behalf of any prospective investor seeking to invest in any of the instruments described in this Prospectus. Please note that concluding the contract and submitting an order may involve further obligations, such as the margin (i.e. collateral) requirement of the transaction or the provision of supplementary collateral, and a failure to meet such obligations in accordance with the relevant provisions of the contract could result in losses upon the closure of the position. If the financial instrument in question is traded on a regulated market, we recommend that you visit the website of the relevant regulated market and clearing house for further information and details on trading conditions and settlement.

**6.** Please also assess the tax settlement consequences and other tax implications of each product or service, bearing in mind that these can only be accurately assessed on the basis of the applicable tax legislation and the individual circumstances of each customer, and that these circumstances are subject to change. The returns shown in this publication are non-annualised gross returns (unless indicated otherwise), from which tax may be deducted subject to the legal regulations in force.

**7.** Certain persons may not have access or may have only limited access to the products and/or services described in this prospectus. The creation, uploading to the website and the displaying of the prospectus and the displaying of information on products and/or services by OTP Bank Plc. shall under no circumstances be deemed to constitute an intention on the part of OTP Bank Plc. to make information on products and/or services described in this information available to persons for whom the use, acquisition or advertising of the products and/or services in question is prohibited or restricted by a country or other relevant jurisdiction.

**8.** This prospectus has been drawn up on the basis of information available to OTP Bank Plc. at the date of its preparation. While OTP Bank Plc has relied in good faith on sources it believes to be reliable in preparing this

prospectus, it makes no warranties, guarantees or representations of any kind as to the accuracy or completeness of the information contained herein.

**9.** The business terms, announcements, lists of conditions and product descriptions containing the detailed terms, conditions and fees of the products and services are available at our branches, and on the Bank's website at [www.otpbank.hu](http://www.otpbank.hu).

**10.** The Bank reserves the right to change the terms contained in this prospectus. This prospectus may be changed in the future without prior notice. Please make sure to follow any changes that may be made to this document.

**11.** OTP Bank Plc. (company registration number: 01-10-041-585; registered seat: H-1051 Budapest, Nádor utca 16; supervisory authority: Magyar Nemzeti Bank – H-1013 Budapest, Krisztina krt. 55; HFSA license numbers: III/41.003-22/2002 and E-III/456/2008). All rights reserved; this prospectus is the exclusive property of OTP Bank Plc. and its further use, reproduction and distribution, providing access to and retransmitting it, any references to it or incorporating it into other websites (services) is permitted only with the advance written consent of OTP Bank Plc.