Trading and Other Fair Value Assets: Market Shocks

Scenario Name:	2025 Exploratory Market Shock
As-Of Date:	10/11/2024
Date of Generation:	2/5/2025

Using the Provided Shocks
Risk factor shocks are provided here in a format that is analogous to that of the FR Y-14Q schedule for Trading and Other Fair Value Assets.
It is expected that firms will apply these risk factor shocks to produce the profit and loss (P/L) estimates for the trading and counterparty credit (CCR) portfolios.

In cases in which the specified shocks are not directly compatible with the firm's internal systems, the firm is expected to interpolate or extrapolate around the given points to determine the appropriate shock. Supporting documentation should include a description of the methods used to interpolate or extrapolate.

In cases where there are nonlinearities, firms should not simply multiply their exposures by the corresponding shocks to arrive at a purely linear P/L estimate, but should instead use full-revaluation methods to compute their loss estimates.

Using Other Shocks
If firms require a shock that has not been provided, then firms should use their best judgment to generate the missing shock so that it is sensible given shocks for related instruments and the scenario narrative. Any such cases must be described thoroughly in supplemental documentation to be submitted with firm's loss estimates.

2025 Exploratory Market Shock Scenario

Equity by Geography

		Vol Points												
Country	**Spot Shock (%)**	**1M**	**3M**	**6M**	**9M**	**1Y**	**2Y**	**3Y**	**5Y**	**7Y**	**10Y**	**15Y**	**20Y**	**30Y**
Australia	-20.5%	26.8	21.5	16.4	13.3	11.1	7.0	5.4	4.1	3.5	3.1	2.7	2.6	2.4
Austria	-15.8%	24.8	19.9	15.3	12.3	10.3	6.5	5.0	3.8	3.2	2.8	2.5	2.4	2.2
Belgium	-15.9%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Canada	-20.5%	26.8	21.5	16.4	13.3	11.1	7.0	5.4	4.1	3.5	3.1	2.7	2.6	2.4
Denmark	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Finland	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
France	-20.4%	24.7	19.8	15.2	12.2	10.3	6.5	5.0	3.8	3.2	2.8	2.5	2.4	2.2
Germany	-22.6%	28.1	24.1	19.2	15.6	13.0	7.8	5.8	4.2	3.6	3.1	2.7	2.5	2.3
Greece	-22.4%	28.1	22.5	17.2	13.9	11.7	7.3	5.7	4.3	3.7	3.2	2.9	2.7	2.5
Ireland	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Italy	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Japan	-18.4%	23.1	15.8	10.2	7.5	5.9	3.5	2.7	2.1	1.8	1.6	1.4	1.4	1.3
Netherlands	-20.7%	22.9	18.4	14.1	11.3	9.5	6.0	4.6	3.5	3.0	2.6	2.3	2.2	2.0
New Zealand	-20.5%	26.8	21.5	16.4	13.3	11.1	7.0	5.4	4.1	3.5	3.1	2.7	2.6	2.4
Norway	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Portugal	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Spain	-20.5%	24.6	19.7	15.1	12.2	10.2	6.4	5.0	3.7	3.2	2.8	2.5	2.3	2.2
Sweden	-20.9%	25.4	20.4	15.6	12.6	10.5	6.6	5.1	3.8	3.3	2.9	2.6	2.4	2.3
Switzerland	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
United Kingdom	-15.4%	23.8	19.9	15.5	12.4	10.3	6.2	4.7	3.4	2.9	2.5	2.2	2.1	1.9
United States	-20.0%	27.5	24.6	21.1	18.3	16.1	10.7	8.2	6.0	5.0	4.3	3.7	3.5	3.2
Euro Stoxx 50 Index	-22.4%	23.8	19.1	14.6	11.8	9.9	6.2	4.8	3.6	3.1	2.7	2.4	2.3	2.1
Stoxx Europe 600 Index	-18.6%	25.5	20.5	15.7	12.6	10.6	6.7	5.1	3.9	3.3	2.9	2.6	2.4	2.3
Other Cross-Country Indices	-18.6%	25.5	20.5	15.7	12.6	10.6	6.7	5.1	3.9	3.3	2.9	2.6	2.4	2.3
Other Advanced Economies	-20.0%	27.5	24.6	21.1	18.3	16.1	10.7	8.2	6.0	5.0	4.3	3.7	3.5	3.2
Bulgaria	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Czech Republic	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Hungary	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Poland	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Russia	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Ukraine	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
MSCI EM Eastern Europe	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Other Cross-Country Indices	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Other Emerging Europe	-21.7%	40.9	32.8	25.1	20.2	17.0	10.7	8.2	6.2	5.3	4.7	4.2	3.9	3.6
Argentina	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
Brazil	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
Chile	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
Mexico	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
MSCI EM Latin America Index	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
Other Cross-Country Indices	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
Other Latam & Caribbean	-28.0%	45.6	32.9	22.7	17.4	14.4	9.6	8.0	6.7	6.2	5.8	5.4	5.3	5.1
China	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Hong Kong	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
India	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Indonesia	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Malaysia	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Philippines	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Singapore	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
South Korea	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Taiwan	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
MSCI EM Asia Index	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Other Cross-Country Indices	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Other Asia Ex-Japan	-20.8%	45.7	36.7	28.1	22.6	19.0	12.0	9.2	6.9	6.0	5.2	4.6	4.4	4.1
Israel	-21.5%	46.2	37.1	28.3	22.9	19.2	12.1	9.3	7.0	6.0	5.3	4.7	4.4	4.1
Turkey	-21.5%	46.2	37.1	28.3	22.9	19.2	12.1	9.3	7.0	6.0	5.3	4.7	4.4	4.1
Other Cross-Country Indices	-21.5%	46.2	37.1	28.3	22.9	19.2	12.1	9.3	7.0	6.0	5.3	4.7	4.4	4.1
Other Middle East/N. Africa	-21.5%	46.2	37.1	28.3	22.9	19.2	12.1	9.3	7.0	6.0	5.3	4.7	4.4	4.1
South Africa	-16.4%	23.2	18.6	14.3	11.5	9.6	6.1	4.7	3.5	3.0	2.7	2.4	2.2	2.1
Other Cross-Country Indices	-16.4%	23.2	18.6	14.3	11.5	9.6	6.1	4.7	3.5	3.0	2.7	2.4	2.2	2.1
Other Sub-Saharan Africa	-16.4%	23.2	18.6	14.3	11.5	9.6	6.1	4.7	3.5	3.0	2.7	2.4	2.2	2.1
MSCI All Country World Index (ACWI)	-20.5%	26.8	21.5	16.4	13.3	11.1	7.0	5.4	4.1	3.5	3.1	2.7	2.6	2.4
MSCI EAFE Index	-19.7%	27.4	22.0	16.8	13.6	11.4	7.2	5.5	4.2	3.6	3.1	2.8	2.6	2.4
MSCI EM Index	-22.4%	28.1	22.5	17.2	13.9	11.7	7.3	5.7	4.3	3.7	3.2	2.9	2.7	2.5
MSCI EMEA Index	-21.5%	46.2	37.1	28.3	22.9	19.2	12.1	9.3	7.0	6.0	5.3	4.7	4.4	4.1
MSCI World Index	-20.5%	26.8	21.5	16.4	13.3	11.1	7.0	5.4	4.1	3.5	3.1	2.7	2.6	2.4
Other Cross-Country Indices	-20.5%	26.8	21.5	16.4	13.3	11.1	7.0	5.4	4.1	3.5	3.1	2.7	2.6	2.4

2025 Exploratory Market Shock Scenario
Other Equity

Relative Dividend Shocks (%)

Region	1Y	2Y	3Y	5Y	7Y	10Y	Unspecified Tenor
US	-19.9%	-19.9%	-18.0%	-15.2%	-13.3%	-9.5%	-19.9%
Europe	-24.5%	-24.5%	-21.8%	-17.6%	-14.2%	-10.9%	-24.5%
Japan	-18.5%	-18.5%	-17.6%	-13.3%	-11.4%	-7.6%	-18.5%
Other / Unspecified	-19.9%	-19.9%	-18.0%	-15.2%	-13.3%	-9.5%	-19.9%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
AED	AUD	12.4%
AED	CHF	9.6%
AED	DKK	7.5%
AED	EUR	7.5%
AED	GBP	8.6%
AED	JPY	5.3%
AED	NOK	11.9%
AED	SEK	10.1%
AED	USD	0.0%
ALL	USD	-8.0%
AMD	USD	-25.0%
ANG	USD	0.0%
AOA	EUR	-9.2%
AOA	GBP	-8.4%
AOA	USD	-15.6%
ARS	AUD	-4.0%
ARS	CHF	-6.4%
ARS	DKK	-8.2%
ARS	EUR	-8.2%
ARS	GBP	-7.3%
ARS	JPY	-10.1%
ARS	NOK	-4.5%
ARS	SEK	-5.9%
ARS	USD	-14.6%
AUD	BBD	-11.0%
AUD	BDT	-4.1%
AUD	BGN	-4.3%
AUD	BHD	-11.0%
AUD	BMD	-11.0%
AUD	BRL	14.5%
AUD	BSD	-11.0%
AUD	BWP	5.5%
AUD	CAD	-4.4%
AUD	CHF	-2.4%
AUD	CLP	2.9%
AUD	CNY	-9.1%
AUD	COP	5.8%
AUD	CYP	-4.3%
AUD	CZK	-4.4%
AUD	DJF	-11.0%
AUD	DKK	-4.3%
AUD	DOP	4.2%
AUD	DZD	5.5%
AUD	EGP	5.5%
AUD	EUR	-4.3%
AUD	FJD	-4.1%
AUD	GBP	-3.4%
AUD	GEL	18.7%
AUD	HKD	-11.0%
AUD	HRK	-4.3%
AUD	HUF	-1.4%
AUD	IDR	2.9%
AUD	ILS	-7.1%
AUD	INR	-6.4%
AUD	IRR	-11.0%
AUD	ISK	-2.5%
AUD	JMD	4.2%
AUD	JOD	-11.0%
AUD	JPY	-6.3%
AUD	KES	5.5%
AUD	KGS	18.7%
AUD	KHR	5.5%
AUD	KRW	-4.4%
AUD	KWD	0.5%
AUD	KZT	18.7%
AUD	LAK	-9.0%
AUD	LBP	-11.0%
AUD	LKR	-4.1%
AUD	LVL	-4.3%
AUD	MAD	5.5%
AUD	MMK	-4.1%
AUD	MOP	-11.0%
AUD	MRO	5.5%
AUD	MTL	-4.3%
AUD	MUR	5.5%
AUD	MVR	-11.0%
AUD	MWK	5.5%
AUD	MXN	-1.1%
AUD	MYR	-4.8%
AUD	MZM	5.5%
AUD	NGN	5.5%
AUD	NOK	-0.4%
AUD	NPR	-6.4%
AUD	NZD	-0.8%
AUD	OMR	-11.0%
AUD	PEN	0.2%
AUD	PGK	-4.1%
AUD	PHP	-7.1%
AUD	PKR	0.5%
AUD	PLN	-2.5%
AUD	PYG	4.2%
AUD	QAR	-11.0%
AUD	RON	-4.4%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
AUD	RSD	-3.3%
AUD	RUB	18.7%
AUD	RWF	5.5%
AUD	SAR	-11.0%
AUD	SBD	-4.1%
AUD	SEK	-2.0%
AUD	SGD	-6.6%
AUD	SKK	-4.3%
AUD	THB	-7.0%
AUD	TJS	18.7%
AUD	TND	5.5%
AUD	TOP	-7.3%
AUD	TRY	0.5%
AUD	TTD	4.2%
AUD	TWD	-3.1%
AUD	UAH	-3.3%
AUD	USD	-11.0%
AUD	UZS	18.6%
AUD	VEF	-11.0%
AUD	VND	-11.0%
AUD	VUV	-4.1%
AUD	WST	-4.1%
AUD	XAF	-4.3%
AUD	XCD	-11.0%
AUD	XPF	-4.3%
AUD	ZAR	5.5%
AWG	EUR	7.5%
AWG	GBP	8.6%
AWG	USD	0.0%
AZN	USD	-25.0%
BAM	EUR	0.0%
BAM	GBP	1.0%
BAM	USD	-7.0%
BBD	EUR	7.5%
BBD	GBP	8.6%
BBD	JPY	5.3%
BBD	USD	0.0%
BDT	CHF	1.8%
BDT	DKK	-0.2%
BDT	EUR	-0.2%
BDT	GBP	0.8%
BDT	JPY	-2.3%
BDT	NOK	3.8%
BDT	USD	-7.2%
BGN	CHF	2.0%
BGN	DKK	0.0%
BGN	EUR	0.0%
BGN	GBP	1.0%
BGN	JPY	-2.1%
BGN	NOK	4.0%
BGN	SEK	2.4%
BGN	USD	-7.0%
BHD	CHF	9.6%
BHD	EUR	7.5%
BHD	GBP	8.6%
BHD	JPY	5.3%
BHD	USD	0.0%
BIF	EUR	-9.2%
BIF	GBP	-8.4%
BIF	USD	-15.6%
BMD	CHF	9.6%
BMD	EUR	7.5%
BMD	GBP	8.6%
BMD	JPY	5.3%
BMD	USD	0.0%
BND	USD	-4.7%
BRL	CAD	-16.5%
BRL	CHF	-14.8%
BRL	CNY	-20.6%
BRL	DKK	-16.5%
BRL	EUR	-16.5%
BRL	GBP	-15.6%
BRL	HUF	-14.0%
BRL	IDR	-10.2%
BRL	INR	-18.3%
BRL	JPY	-18.2%
BRL	KRW	-16.5%
BRL	MXN	-13.7%
BRL	MYR	-16.9%
BRL	NOK	-13.1%
BRL	PLN	-14.9%
BRL	RUB	3.6%
BRL	SEK	-14.4%
BRL	TRY	-12.3%
BRL	TWD	-15.4%
BRL	USD	-22.3%
BRL	ZAR	-7.9%
BSD	EUR	7.5%
BSD	GBP	8.6%
BSD	JPY	5.3%
BSD	USD	0.0%
BWP	CHF	-7.5%
BWP	DKK	-9.2%
BWP	EUR	-9.2%
BWP	GBP	-8.4%
BWP	JPY	-11.2%
BWP	NOK	-5.6%
BWP	SEK	-7.0%
BWP	USD	-15.6%
BYR	EUR	-19.4%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
BYR	GBP	-18.6%
BYR	USD	-25.0%
BZD	EUR	7.5%
BZD	GBP	8.6%
BZD	USD	0.0%
CAD	CHF	2.1%
CAD	CNY	-4.9%
CAD	DKK	0.1%
CAD	EUR	0.1%
CAD	GBP	1.1%
CAD	IDR	7.6%
CAD	ILS	-2.8%
CAD	INR	-2.1%
CAD	JPY	-2.0%
CAD	KRW	0.0%
CAD	MXN	3.4%
CAD	NOK	4.1%
CAD	NZD	3.8%
CAD	PLN	2.0%
CAD	RUB	24.1%
CAD	SEK	2.5%
CAD	SGD	-2.3%
CAD	USD	-6.9%
CAD	ZAR	10.3%
CHF	CLP	5.4%
CHF	CNY	-6.8%
CHF	COP	8.4%
CHF	CRC	6.8%
CHF	CYP	-1.9%
CHF	CZK	-2.0%
CHF	DKK	-1.9%
CHF	DOP	6.8%
CHF	DZD	8.1%
CHF	ECS	-8.8%
CHF	EEK	-1.9%
CHF	EGP	8.1%
CHF	EUR	-1.9%
CHF	GBP	-1.0%
CHF	GEL	21.6%
CHF	HKD	-8.8%
CHF	HRK	-1.9%
CHF	HUF	1.0%
CHF	IDR	5.4%
CHF	ILS	-4.8%
CHF	INR	-4.1%
CHF	IRR	-8.8%
CHF	ISK	-0.1%
CHF	JMD	6.8%
CHF	JOD	-8.8%
CHF	JPY	-4.0%
CHF	KES	8.1%
CHF	KGS	21.6%
CHF	KHR	8.1%
CHF	KRW	-2.0%
CHF	KWD	2.9%
CHF	LBP	-8.8%
CHF	LKR	-1.7%
CHF	LTL	-1.9%
CHF	LVL	-1.9%
CHF	MAD	8.1%
CHF	MRO	8.1%
CHF	MTL	-1.9%
CHF	MWK	8.1%
CHF	MXN	1.3%
CHF	MYR	-2.5%
CHF	NGN	8.1%
CHF	NOK	2.0%
CHF	NPR	-4.1%
CHF	NZD	1.7%
CHF	OMR	-8.8%
CHF	PEN	2.7%
CHF	PGK	-1.7%
CHF	PHP	-4.8%
CHF	PKR	2.9%
CHF	PLN	-0.1%
CHF	QAR	-8.8%
CHF	RON	-2.0%
CHF	RSD	-0.9%
CHF	RUB	21.6%
CHF	SAR	-8.8%
CHF	SEK	0.4%
CHF	SGD	-4.3%
CHF	SKK	-1.9%
CHF	SYP	-8.8%
CHF	THB	-4.7%
CHF	TND	8.1%
CHF	TRY	2.9%
CHF	TWD	-0.7%
CHF	UAH	-0.9%
CHF	USD	-8.8%
CHF	VEF	-8.8%
CHF	VND	-8.8%
CHF	XAF	-2.0%
CHF	YER	3.0%
CHF	ZAR	8.1%
CHF	ZMK	8.1%
CLP	DKK	-7.0%
CLP	EUR	-7.0%
CLP	GBP	-6.1%
CLP	JPY	-8.9%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
CLP	KRW	-7.1%
CLP	NOK	-3.2%
CLP	PHP	-9.7%
CLP	SEK	-4.7%
CLP	USD	-13.5%
CNY	DKK	5.3%
CNY	EUR	5.3%
CNY	GBP	6.3%
CNY	HUF	8.4%
CNY	IDR	13.2%
CNY	INR	2.9%
CNY	JPY	3.1%
CNY	KRW	5.2%
CNY	MXN	8.8%
CNY	MYR	4.7%
CNY	NOK	9.5%
CNY	NZD	9.1%
CNY	PHP	2.2%
CNY	PLN	7.2%
CNY	RUB	30.5%
CNY	SEK	7.8%
CNY	SGD	2.7%
CNY	TRY	10.5%
CNY	TWD	6.6%
CNY	USD	-2.1%
COP	DKK	-9.6%
COP	EUR	-9.6%
COP	GBP	-8.7%
COP	JPY	-11.5%
COP	NOK	-5.9%
COP	SEK	-7.4%
COP	USD	-15.9%
CRC	EUR	-8.2%
CRC	GBP	-7.3%
CRC	JPY	-10.1%
CRC	USD	-14.6%
CSD	USD	-8.0%
CUP	EUR	7.5%
CUP	GBP	8.6%
CUP	USD	0.0%
CVE	EUR	0.0%
CVE	GBP	1.0%
CVE	USD	-7.0%
CYP	DKK	0.0%
CYP	EUR	0.0%
CYP	GBP	1.0%
CYP	JPY	-2.1%
CYP	SEK	2.4%
CYP	USD	-7.0%
CZK	DKK	0.1%
CZK	EUR	0.1%
CZK	GBP	1.1%
CZK	JPY	-2.0%
CZK	NOK	4.1%
CZK	SEK	2.5%
CZK	USD	-6.9%
DEM	USD	-7.0%
DJF	EUR	7.5%
DJF	GBP	8.6%
DJF	USD	0.0%
DKK	DZD	10.2%
DKK	ECS	-7.0%
DKK	EEK	0.0%
DKK	EGP	10.2%
DKK	EUR	0.0%
DKK	GBP	1.0%
DKK	GEL	24.0%
DKK	HKD	-7.0%
DKK	HRK	0.0%
DKK	HUF	3.0%
DKK	IDR	7.5%
DKK	ILS	-2.9%
DKK	INR	-2.2%
DKK	IQD	-7.0%
DKK	ISK	1.9%
DKK	JMD	8.9%
DKK	JOD	-7.0%
DKK	JPY	-2.1%
DKK	KES	10.2%
DKK	KHR	10.2%
DKK	KRW	-0.1%
DKK	KWD	5.0%
DKK	KZT	24.0%
DKK	LAK	-4.9%
DKK	LBP	-7.0%
DKK	LKR	0.2%
DKK	LTL	0.0%
DKK	LVL	0.0%
DKK	MAD	10.2%
DKK	MMK	0.2%
DKK	MTL	0.0%
DKK	MXN	3.3%
DKK	MYR	-0.5%
DKK	NGN	10.2%
DKK	NOK	4.0%
DKK	NPR	-2.2%
DKK	NZD	3.7%
DKK	PEN	4.7%
DKK	PGK	0.2%
DKK	PHP	-2.9%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
DKK	PKR	5.0%
DKK	PLN	1.9%
DKK	QAR	-7.0%
DKK	RON	-0.1%
DKK	RSD	1.1%
DKK	RUB	24.0%
DKK	SAR	-7.0%
DKK	SEK	2.4%
DKK	SGD	-2.4%
DKK	SKK	0.0%
DKK	SYP	-7.0%
DKK	THB	-2.8%
DKK	TND	10.2%
DKK	TRY	5.0%
DKK	TWD	1.3%
DKK	UAH	1.1%
DKK	UGX	10.2%
DKK	USD	-7.0%
DKK	VEF	-7.0%
DKK	VND	-7.0%
DKK	XAF	0.0%
DKK	ZAR	10.2%
DOP	EUR	-8.2%
DOP	GBP	-7.3%
DOP	JPY	-10.1%
DOP	USD	-14.6%
DZD	EUR	-9.2%
DZD	GBP	-8.4%
DZD	JPY	-11.2%
DZD	USD	-15.6%
ECS	EUR	7.5%
ECS	GBP	8.6%
ECS	USD	0.0%
ECU	USD	-7.0%
EEK	EUR	0.0%
EEK	GBP	1.0%
EEK	JPY	-2.1%
EEK	NOK	4.0%
EEK	SEK	2.4%
EEK	USD	-7.0%
EGP	EUR	-9.2%
EGP	GBP	-8.4%
EGP	JPY	-11.2%
EGP	NOK	-5.6%
EGP	SEK	-7.0%
EGP	USD	-15.6%
ERN	EUR	7.5%
ERN	USD	0.0%
ETB	EUR	-9.2%
ETB	GBP	-8.4%
ETB	JPY	-11.2%
ETB	USD	-15.6%
EUR	FJD	0.2%
EUR	GBP	1.0%
EUR	GEL	24.0%
EUR	GMD	10.2%
EUR	GNF	10.2%
EUR	GTQ	8.9%
EUR	GYD	8.9%
EUR	HKD	-7.0%
EUR	HNL	8.9%
EUR	HRK	0.0%
EUR	HTG	8.9%
EUR	HUF	3.0%
EUR	IDR	7.5%
EUR	ILS	-2.9%
EUR	INR	-2.2%
EUR	IQD	-7.0%
EUR	IRR	-7.0%
EUR	ISK	1.9%
EUR	JMD	8.9%
EUR	JOD	-7.0%
EUR	JPY	-2.1%
EUR	KES	10.2%
EUR	KGS	24.0%
EUR	KHR	10.2%
EUR	KMF	0.0%
EUR	KRW	-0.1%
EUR	KWD	5.0%
EUR	KZT	24.0%
EUR	LAK	-4.9%
EUR	LBP	-7.0%
EUR	LKR	0.2%
EUR	LRD	10.2%
EUR	LTL	0.0%
EUR	LVL	0.0%
EUR	LYD	10.2%
EUR	MAD	10.2%
EUR	MDL	1.1%
EUR	MGA	10.2%
EUR	MMK	0.2%
EUR	MNT	0.2%
EUR	MOP	-7.0%
EUR	MRO	10.2%
EUR	MTL	0.0%
EUR	MUR	10.2%
EUR	MVR	-7.0%
EUR	MWK	10.2%
EUR	MXN	3.3%
EUR	MYR	-0.5%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
EUR	MZM	10.2%
EUR	NGN	10.2%
EUR	NIO	-4.8%
EUR	NOK	4.0%
EUR	NPR	-2.2%
EUR	NZD	3.7%
EUR	OMR	-7.0%
EUR	PAB	-7.0%
EUR	PEN	4.7%
EUR	PGK	0.2%
EUR	PHP	-2.9%
EUR	PKR	5.0%
EUR	PLN	1.9%
EUR	PYG	8.9%
EUR	QAR	-7.0%
EUR	RON	-0.1%
EUR	RSD	1.1%
EUR	RUB	24.0%
EUR	RWF	10.2%
EUR	SAR	-7.0%
EUR	SBD	0.2%
EUR	SCR	10.2%
EUR	SDD	10.2%
EUR	SEK	2.4%
EUR	SGD	-2.4%
EUR	SIT	0.0%
EUR	SKK	0.0%
EUR	SLL	10.2%
EUR	SOS	24.0%
EUR	SRD	8.9%
EUR	STD	24.0%
EUR	SVC	-7.0%
EUR	SYP	-7.0%
EUR	THB	-2.8%
EUR	TJS	24.0%
EUR	TND	10.2%
EUR	TOP	-3.1%
EUR	TRY	5.0%
EUR	TTD	8.9%
EUR	TWD	1.3%
EUR	UAH	1.1%
EUR	UGX	10.2%
EUR	USD	-7.0%
EUR	UZS	24.0%
EUR	VEF	-7.0%
EUR	VND	-7.0%
EUR	VUV	0.3%
EUR	WST	0.3%
EUR	XAF	0.0%
EUR	XCD	-7.0%
EUR	XOF	0.0%
EUR	XPF	0.0%
EUR	YER	5.0%
EUR	ZAR	10.2%
EUR	ZMK	10.2%
FJD	GBP	0.8%
FJD	JPY	-2.3%
FJD	USD	-7.2%
FKP	USD	-7.9%
FRF	USD	-7.0%
GBP	GEL	22.8%
GBP	GMD	9.1%
GBP	GNF	9.1%
GBP	GTQ	7.8%
GBP	GYD	7.8%
GBP	HKD	-7.9%
GBP	HNL	7.8%
GBP	HRK	-1.0%
GBP	HTG	7.8%
GBP	HUF	2.0%
GBP	IDR	6.5%
GBP	ILS	-3.9%
GBP	INR	-3.2%
GBP	IQD	-7.9%
GBP	IRR	-7.9%
GBP	ISK	0.9%
GBP	JMD	7.8%
GBP	JOD	-7.9%
GBP	JPY	-3.1%
GBP	KES	9.1%
GBP	KGS	22.8%
GBP	KHR	9.1%
GBP	KMF	-1.0%
GBP	KRW	-1.1%
GBP	KWD	4.0%
GBP	KZT	22.8%
GBP	LBP	-7.9%
GBP	LKR	-0.8%
GBP	LRD	9.1%
GBP	LTL	-1.0%
GBP	LVL	-1.0%
GBP	LYD	9.1%
GBP	MAD	9.1%
GBP	MDL	0.1%
GBP	MGA	9.1%
GBP	MMK	-0.8%
GBP	MNT	-0.8%
GBP	MOP	-7.9%
GBP	MRO	9.1%
GBP	MTL	-1.0%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
GBP	MUR	9.1%
GBP	MVR	-7.9%
GBP	MWK	9.1%
GBP	MXN	2.3%
GBP	MYR	-1.5%
GBP	MZM	9.1%
GBP	NGN	9.1%
GBP	NIO	-5.7%
GBP	NOK	3.0%
GBP	NPR	-3.2%
GBP	NZD	2.7%
GBP	OMR	-7.9%
GBP	PEN	3.7%
GBP	PGK	-0.8%
GBP	PHP	-3.9%
GBP	PKR	4.0%
GBP	PLN	0.9%
GBP	PYG	7.8%
GBP	QAR	-7.9%
GBP	RON	-1.1%
GBP	RSD	0.1%
GBP	RUB	22.8%
GBP	RWF	9.1%
GBP	SAR	-7.9%
GBP	SBD	-0.8%
GBP	SCR	9.1%
GBP	SDD	9.1%
GBP	SEK	1.4%
GBP	SGD	-3.4%
GBP	SIT	-1.0%
GBP	SKK	-1.0%
GBP	SLL	9.1%
GBP	SOS	22.8%
GBP	SRD	7.8%
GBP	SVC	-7.9%
GBP	SYP	-7.9%
GBP	THB	-3.8%
GBP	TJS	22.8%
GBP	TND	9.1%
GBP	TOP	-4.1%
GBP	TRY	4.0%
GBP	TTD	7.8%
GBP	TWD	0.3%
GBP	UAH	0.1%
GBP	UGX	9.1%
GBP	USD	-7.9%
GBP	UZS	22.8%
GBP	VEF	-7.9%
GBP	VND	-7.9%
GBP	VUV	-0.7%
GBP	WST	-0.7%
GBP	XAF	-1.0%
GBP	XCD	-7.9%
GBP	XOF	-1.0%
GBP	XPF	-1.0%
GBP	YER	4.0%
GBP	ZAR	9.1%
GBP	ZMK	9.1%
GEL	JPY	-21.1%
GEL	NOK	-16.1%
GEL	SEK	-17.4%
GEL	USD	-25.0%
GHC	USD	-15.6%
GHS	USD	-15.6%
GMD	JPY	-11.2%
GMD	USD	-15.6%
GNF	USD	-15.6%
GTQ	USD	-14.6%
GWP	USD	-7.0%
GYD	USD	-14.6%
HKD	IDR	15.6%
HKD	JPY	5.3%
HKD	MYR	7.0%
HKD	NOK	11.9%
HKD	PHP	4.4%
HKD	SEK	10.1%
HKD	SGD	4.9%
HKD	TWD	8.9%
HKD	USD	0.0%
HNL	JPY	-10.1%
HNL	USD	-14.6%
HRK	JPY	-2.1%
HRK	NOK	4.0%
HRK	SEK	2.4%
HRK	USD	-7.0%
HTG	USD	-14.6%
HUF	INR	-5.0%
HUF	JPY	-4.9%
HUF	MXN	0.3%
HUF	NOK	1.0%
HUF	SEK	-0.6%
HUF	TRY	1.9%
HUF	USD	-9.7%
IDR	INR	-9.0%
IDR	JPY	-8.9%
IDR	KRW	-7.1%
IDR	MXN	-3.9%
IDR	MYR	-7.5%
IDR	NOK	-3.2%
IDR	PHP	-9.7%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
IDR	RUB	15.3%
IDR	SEK	-4.7%
IDR	SGD	-9.2%
IDR	TRY	-2.4%
IDR	TWD	-5.8%
IDR	USD	-13.5%
ILS	JPY	0.8%
ILS	KRW	2.9%
ILS	NOK	7.2%
ILS	SEK	5.5%
ILS	USD	-4.2%
INR	JPY	0.1%
INR	KRW	2.1%
INR	MXN	5.7%
INR	MYR	1.7%
INR	NOK	6.4%
INR	PHP	-0.7%
INR	PLN	4.2%
INR	RUB	26.8%
INR	SEK	4.7%
INR	SGD	-0.2%
INR	TRY	7.3%
INR	TWD	3.6%
INR	USD	-4.9%
INR	ZAR	12.7%
IQD	USD	0.0%
IRR	JPY	5.3%
IRR	USD	0.0%
ISK	JPY	-3.9%
ISK	NOK	2.1%
ISK	SEK	0.6%
ISK	USD	-8.7%
ITL	USD	-7.0%
JMD	JPY	-10.1%
JMD	NOK	-4.5%
JMD	SEK	-5.9%
JMD	USD	-14.6%
JOD	JPY	5.3%
JOD	NOK	11.9%
JOD	SEK	10.1%
JOD	USD	0.0%
JPY	KES	12.6%
JPY	KHR	12.6%
JPY	KRW	2.0%
JPY	KWD	7.2%
JPY	KZT	26.7%
JPY	LAK	-2.9%
JPY	LBP	-5.0%
JPY	LKR	2.4%
JPY	LTL	2.2%
JPY	LVL	2.2%
JPY	LYD	12.6%
JPY	MAD	12.6%
JPY	MDL	3.3%
JPY	MNT	2.4%
JPY	MOP	-5.0%
JPY	MRO	12.6%
JPY	MTL	2.2%
JPY	MUR	12.6%
JPY	MVR	-5.0%
JPY	MWK	12.6%
JPY	MXN	5.6%
JPY	MYR	1.6%
JPY	NGN	12.6%
JPY	NIO	-2.8%
JPY	NOK	6.3%
JPY	NPR	-0.1%
JPY	NZD	5.9%
JPY	OMR	-5.0%
JPY	PEN	7.0%
JPY	PGK	2.4%
JPY	PHP	-0.8%
JPY	PKR	7.2%
JPY	PLN	4.1%
JPY	PYG	11.2%
JPY	QAR	-5.0%
JPY	RON	2.0%
JPY	RSD	3.3%
JPY	RUB	26.7%
JPY	SAR	-5.0%
JPY	SBD	2.4%
JPY	SEK	4.6%
JPY	SGD	-0.3%
JPY	SKK	2.2%
JPY	SLL	12.6%
JPY	SYP	-5.0%
JPY	THB	-0.7%
JPY	TND	12.6%
JPY	TOP	-1.0%
JPY	TRY	7.2%
JPY	TTD	11.2%
JPY	TWD	3.5%
JPY	UAH	3.3%
JPY	UGX	12.6%
JPY	USD	-5.0%
JPY	UZS	26.6%
JPY	VEF	-5.0%
JPY	VND	-5.0%
JPY	WST	2.4%
JPY	XAF	2.1%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
JPY	XCD	-5.0%
JPY	XOF	2.1%
JPY	XPF	2.1%
JPY	YER	7.3%
JPY	ZAR	12.6%
JPY	ZMK	12.6%
KES	NOK	-5.6%
KES	SEK	-7.0%
KES	USD	-15.6%
KGS	USD	-25.0%
KHR	SEK	-7.0%
KHR	USD	-15.6%
KMF	USD	-7.0%
KRW	MXN	3.4%
KRW	MYR	-0.4%
KRW	NOK	4.1%
KRW	PHP	-2.8%
KRW	PLN	2.0%
KRW	RUB	24.1%
KRW	SEK	2.5%
KRW	SGD	-2.3%
KRW	TRY	5.1%
KRW	TWD	1.4%
KRW	USD	-6.9%
KRW	ZAR	10.3%
KWD	NOK	-0.9%
KWD	SEK	-2.4%
KWD	USD	-11.4%
KZT	NOK	-16.1%
KZT	SEK	-17.4%
KZT	USD	-25.0%
LAK	USD	-2.2%
LBP	NOK	11.9%
LBP	SEK	10.1%
LBP	USD	0.0%
LKR	SEK	2.2%
LKR	USD	-7.2%
LRD	USD	-15.6%
LSL	USD	-15.6%
LTL	NOK	4.0%
LTL	SEK	2.4%
LTL	USD	-7.0%
LVL	NOK	4.0%
LVL	SEK	2.4%
LVL	USD	-7.0%
LYD	USD	-15.6%
MAD	NOK	-5.6%
MAD	SEK	-7.0%
MAD	USD	-15.6%
MDL	USD	-8.0%
MGA	USD	-15.6%
MKD	USD	-7.0%
MMK	USD	-7.2%
MNT	SEK	2.2%
MNT	USD	-7.2%
MOP	USD	0.0%
MRO	USD	-15.6%
MTL	NOK	4.0%
MTL	SEK	2.4%
MTL	USD	-7.0%
MUR	USD	-15.6%
MVR	USD	0.0%
MWK	USD	-15.6%
MXN	NOK	0.7%
MXN	NZD	0.3%
MXN	PLN	-1.4%
MXN	RUB	20.0%
MXN	SEK	-0.9%
MXN	TRY	1.6%
MXN	USD	-10.0%
MXN	ZAR	6.7%
MYR	NOK	4.6%
MYR	PHP	-2.4%
MYR	RUB	24.7%
MYR	SEK	3.0%
MYR	SGD	-1.9%
MYR	TWD	1.9%
MYR	USD	-6.5%
MZM	USD	-15.6%
MZN	USD	-15.6%
NAD	USD	-15.6%
NGN	NOK	-5.6%
NGN	SEK	-7.0%
NGN	USD	-15.6%
NIO	USD	-2.3%
NOK	NZD	-0.3%
NOK	PEN	0.7%
NOK	PGK	-3.7%
NOK	PHP	-6.7%
NOK	PKR	0.9%
NOK	PLN	-2.1%
NOK	QAR	-10.6%
NOK	RON	-4.0%
NOK	RSD	-2.8%
NOK	RUB	19.2%
NOK	SAR	-10.6%
NOK	SEK	-1.5%
NOK	SGD	-6.2%
NOK	SKK	-3.9%
NOK	SYP	-10.6%

2025 Exploratory Market Shock Scenario
FX Spot Sensitivities

Currency 1	Currency 2	% Change in Spot Price Defined as Currency1 vs. Currency2
NOK	THB	-6.6%
NOK	TND	5.9%
NOK	TRY	0.9%
NOK	TWD	-2.6%
NOK	UAH	-2.8%
NOK	USD	-10.6%
NOK	VEF	-10.6%
NOK	VND	-10.6%
NOK	ZAR	5.9%
NPR	SEK	4.7%
NPR	USD	-4.9%
NZD	PLN	-1.8%
NZD	SEK	-1.2%
NZD	USD	-10.3%
NZD	ZAR	6.3%
OMR	USD	0.0%
PAB	USD	0.0%
PEN	SEK	-2.2%
PEN	USD	-11.2%
PGK	SEK	2.2%
PGK	USD	-7.2%
PHP	SEK	5.5%
PHP	SGD	0.5%
PHP	TWD	4.4%
PHP	USD	-4.2%
PKR	SEK	-2.4%
PKR	USD	-11.4%
PLN	RUB	21.7%
PLN	SEK	0.6%
PLN	USD	-8.7%
PYG	USD	-14.6%
QAR	SEK	10.1%
QAR	USD	0.0%
ROL	USD	-6.9%
RON	SEK	2.5%
RON	USD	-6.9%
RSD	SEK	1.3%
RSD	USD	-8.0%
RUB	SEK	-17.4%
RUB	TRY	-15.3%
RUB	USD	-25.0%
RUB	ZAR	-11.1%
RWF	USD	-15.6%
SAR	SEK	10.1%
SAR	USD	0.0%
SBD	USD	-7.2%
SCR	USD	-15.6%
SDD	USD	-15.6%
SEK	SGD	-4.7%
SEK	SKK	-2.4%
SEK	SYP	-9.2%
SEK	THB	-5.1%
SEK	TND	7.6%
SEK	TRY	2.5%
SEK	TTD	6.3%
SEK	TWD	-1.1%
SEK	UAH	-1.3%
SEK	USD	-9.2%
SEK	VEF	-9.2%
SEK	VND	-9.2%
SEK	ZAR	7.6%
SGD	TWD	3.8%
SGD	USD	-4.7%
SIT	USD	-7.0%
SKK	USD	-7.0%
SLL	USD	-15.6%
SRD	USD	-14.6%
SVC	USD	0.0%
SYP	USD	0.0%
SZL	USD	-15.6%
THB	USD	-4.3%
TJS	USD	-25.0%
TND	USD	-15.6%
TOP	USD	-4.0%
TRL	USD	-11.4%
TRY	USD	-11.4%
TRY	ZAR	5.0%
TTD	USD	-14.6%
TWD	USD	-8.2%
TZS	USD	-15.6%
UAH	USD	-8.0%
UGX	USD	-15.6%
USD	UYP	17.1%
USD	UYU	17.1%
USD	UZS	33.3%
USD	VEB	0.0%
USD	VEF	0.0%
USD	VND	0.0%
USD	VUV	7.8%
USD	WST	7.8%
USD	XAF	7.5%
USD	XCD	0.0%
USD	XEU	7.5%
USD	XOF	7.5%
USD	XPF	7.5%
USD	YER	12.9%
USD	ZAR	18.5%
USD	ZMK	18.5%

OTHER	**USD**	-25.0%

2025 Exploratory Market Shock Scenario
FX Vega

Absolute Vega Shock (Vol Pts)

Currency 1	Currency 2	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
AED	AUD	7.2	6.4	5.6	5.0	4.5	3.6	3.3	2.9	2.8	2.7	2.6	2.6	2.6
AED	BRL	9.2	8.4	7.5	6.8	6.3	5.1	4.5	4.1	3.9	3.7	3.6	3.5	3.5
AED	CLP	7.5	6.8	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
AED	CNY	1.2	1.1	1.0	0.9	0.8	0.7	0.6	0.5	0.5	0.5	0.5	0.5	0.5
AED	CZK	4.5	4.1	3.7	3.3	3.1	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
AED	EGP	6.0	5.5	4.9	4.5	4.1	3.3	3.0	2.7	2.5	2.4	2.3	2.3	2.3
AED	EUR	5.6	5.2	4.7	4.3	4.0	3.2	2.8	2.5	2.3	2.2	2.1	2.1	2.0
AED	GBP	5.5	4.9	4.3	3.8	3.5	2.8	2.5	2.3	2.2	2.1	2.0	2.0	2.0
AED	HKD	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
AED	INR	2.9	2.7	2.4	2.2	2.0	1.6	1.4	1.3	1.2	1.2	1.1	1.1	1.1
AED	KWD	1.4	1.3	1.1	1.0	1.0	0.8	0.7	0.6	0.6	0.6	0.5	0.5	0.5
AED	MYR	1.0	0.9	0.8	0.7	0.7	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
AED	NOK	6.6	6.1	5.4	4.9	4.5	3.7	3.3	2.9	2.8	2.7	2.6	2.5	2.5
AED	SAR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
AED	SGD	2.8	2.5	2.3	2.0	1.9	1.5	1.4	1.2	1.2	1.1	1.1	1.1	1.0
AED	TRY	4.8	4.4	3.9	3.6	3.3	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
AED	TWD	2.1	1.9	1.7	1.6	1.4	1.2	1.0	0.9	0.9	0.8	0.8	0.8	0.8
AED	USD	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
ARS	AUD	10.2	9.3	8.2	7.4	6.8	5.4	4.8	4.4	4.1	4.0	3.9	3.8	3.7
ARS	BRL	8.9	8.1	7.3	6.6	6.1	4.9	4.4	3.9	3.7	3.6	3.4	3.4	3.3
ARS	CHF	10.2	9.4	8.4	7.6	7.1	5.7	5.0	4.5	4.2	4.0	3.9	3.8	3.7
ARS	EUR	9.2	8.5	7.6	6.9	6.4	5.1	4.6	4.1	3.8	3.7	3.5	3.5	3.4
ARS	GBP	9.2	8.3	7.4	6.7	6.1	4.9	4.4	4.0	3.8	3.6	3.5	3.5	3.4
ARS	HUF	8.5	7.8	6.9	6.3	5.8	4.7	4.2	3.7	3.5	3.4	3.3	3.2	3.2
ARS	IDR	7.8	7.1	6.4	5.8	5.3	4.3	3.8	3.4	3.3	3.1	3.0	3.0	2.9
ARS	INR	7.9	7.2	6.5	5.9	5.4	4.4	3.9	3.5	3.3	3.2	3.1	3.0	3.0
ARS	JPY	8.7	7.9	7.0	6.3	5.8	4.6	4.1	3.6	3.4	3.3	3.2	3.1	3.0
ARS	MXN	7.0	6.4	5.7	5.2	4.8	3.9	3.5	3.1	2.9	2.8	2.7	2.7	2.6
ARS	NOK	9.9	9.1	8.1	7.4	6.8	5.5	4.9	4.4	4.2	4.0	3.9	3.8	3.7
ARS	NZD	10.1	9.3	8.3	7.5	6.9	5.6	5.0	4.5	4.2	4.1	3.9	3.9	3.8
ARS	RUB	9.1	8.3	7.4	6.7	6.2	5.0	4.4	4.0	3.8	3.6	3.5	3.4	3.4
ARS	TRY	8.7	7.9	7.1	6.4	5.9	4.8	4.3	3.8	3.6	3.5	3.4	3.3	3.2
ARS	TWD	7.7	7.1	6.3	5.7	5.3	4.3	3.8	3.4	3.2	3.1	3.0	3.0	2.9
ARS	USD	7.5	6.8	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
ARS	ZAR	9.5	8.7	7.8	7.1	6.5	5.3	4.7	4.2	4.0	3.8	3.7	3.6	3.6
AUD	BRL	7.7	7.1	6.3	5.7	5.2	4.2	3.8	3.4	3.2	3.1	3.0	2.9	2.9
AUD	CAD	4.7	4.2	3.6	3.2	2.9	2.3	2.1	2.0	1.9	1.8	1.8	1.8	1.7
AUD	CHF	8.0	7.3	6.4	5.8	5.3	4.3	3.8	3.4	3.2	3.1	3.0	2.9	2.9
AUD	CLP	7.0	6.3	5.6	5.1	4.6	3.7	3.3	3.0	2.8	2.7	2.6	2.6	2.5
AUD	CNY	6.9	6.1	5.3	4.7	4.3	3.4	3.1	2.8	2.7	2.6	2.5	2.5	2.4
AUD	CZK	5.5	5.0	4.3	3.9	3.5	2.8	2.5	2.2	2.1	2.1	2.0	2.0	1.9
AUD	DKK	5.9	5.3	4.7	4.2	3.8	3.1	2.7	2.5	2.3	2.3	2.2	2.1	2.1
AUD	EUR	5.9	5.3	4.7	4.2	3.8	3.1	2.7	2.5	2.3	2.3	2.2	2.1	2.1
AUD	GBP	6.0	5.3	4.6	4.1	3.7	3.0	2.7	2.4	2.3	2.2	2.2	2.1	2.1
AUD	HKD	7.2	6.4	5.6	5.0	4.5	3.6	3.3	2.9	2.8	2.7	2.6	2.6	2.6
AUD	HUF	4.8	4.3	3.7	3.3	3.0	2.4	2.1	1.9	1.8	1.7	1.6	1.6	1.6
AUD	IDR	6.1	5.4	4.7	4.2	3.8	3.0	2.7	2.4	2.3	2.2	2.2	2.1	2.1
AUD	ILS	4.6	4.0	3.4	3.0	2.7	2.0	1.8	1.6	1.5	1.4	1.4	1.3	1.3
AUD	INR	6.3	5.6	4.9	4.3	4.0	3.2	2.8	2.6	2.5	2.4	2.3	2.3	2.3
AUD	JPY	8.3	7.5	6.6	5.9	5.3	4.2	3.7	3.3	3.1	3.0	2.9	2.8	2.8
AUD	KRW	5.8	5.2	4.6	4.1	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.1
AUD	MXN	5.5	5.0	4.4	3.9	3.6	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
AUD	MYR	6.4	5.7	5.0	4.4	4.0	3.2	2.8	2.6	2.4	2.4	2.3	2.3	2.2
AUD	NOK	5.0	4.6	4.0	3.6	3.3	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
AUD	NZD	3.7	3.3	2.9	2.7	2.4	2.0	1.8	1.6	1.5	1.4	1.4	1.4	1.3
AUD	PLN	4.5	4.0	3.5	3.1	2.8	2.2	1.9	1.7	1.6	1.6	1.5	1.5	1.5
AUD	RUB	6.7	6.1	5.4	4.8	4.4	3.5	3.1	2.8	2.6	2.5	2.4	2.4	2.4
AUD	SAR	7.2	6.4	5.6	5.0	4.5	3.6	3.3	2.9	2.8	2.7	2.6	2.6	2.6
AUD	SEK	5.2	4.7	4.2	3.7	3.4	2.7	2.4	2.2	2.1	2.0	1.9	1.9	1.8
AUD	SGD	5.4	4.8	4.2	3.7	3.4	2.7	2.4	2.2	2.1	2.0	2.0	1.9	1.9
AUD	THB	5.7	5.1	4.3	3.8	3.4	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
AUD	TRY	6.0	5.4	4.7	4.2	3.9	3.1	2.7	2.4	2.3	2.2	2.1	2.1	2.1
AUD	TWD	6.2	5.6	4.8	4.3	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.2
AUD	USD	7.2	6.4	5.6	5.0	4.5	3.6	3.3	2.9	2.8	2.7	2.6	2.6	2.6
AUD	ZAR	4.8	4.4	3.9	3.5	3.2	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
BRL	CAD	7.9	7.2	6.4	5.8	5.4	4.3	3.9	3.5	3.3	3.2	3.1	3.0	3.0
BRL	CHF	10.0	9.2	8.2	7.5	6.9	5.6	5.0	4.4	4.2	4.0	3.9	3.8	3.7
BRL	CLP	8.7	8.0	7.1	6.5	6.0	4.8	4.3	3.8	3.6	3.5	3.4	3.3	3.3
BRL	CNY	9.0	8.2	7.4	6.7	6.2	5.0	4.4	4.0	3.8	3.6	3.5	3.4	3.4
BRL	CZK	8.4	7.7	6.8	6.2	5.7	4.6	4.1	3.7	3.5	3.4	3.3	3.2	3.1
BRL	DKK	8.7	8.0	7.1	6.5	6.0	4.8	4.3	3.8	3.6	3.5	3.4	3.3	3.2
BRL	EUR	8.7	8.0	7.1	6.5	6.0	4.8	4.3	3.8	3.6	3.5	3.4	3.3	3.2
BRL	GBP	8.9	8.1	7.2	6.5	6.0	4.9	4.4	3.9	3.7	3.6	3.4	3.4	3.3
BRL	HKD	9.2	8.4	7.5	6.8	6.3	5.1	4.5	4.1	3.9	3.7	3.6	3.5	3.5
BRL	HUF	7.9	7.3	6.5	5.9	5.4	4.3	3.9	3.5	3.3	3.1	3.0	3.0	2.9
BRL	IDR	8.4	7.7	6.8	6.2	5.7	4.6	4.1	3.7	3.5	3.4	3.2	3.2	3.1
BRL	ILS	7.9	7.2	6.3	5.7	5.3	4.2	3.7	3.3	3.2	3.0	2.9	2.9	2.8
BRL	INR	8.4	7.7	6.8	6.2	5.7	4.6	4.1	3.7	3.5	3.4	3.3	3.2	3.1
BRL	JPY	10.4	9.5	8.4	7.6	7.0	5.6	5.0	4.4	4.2	4.0	3.8	3.8	3.7
BRL	KRW	8.6	7.8	7.0	6.3	5.9	4.7	4.2	3.8	3.6	3.4	3.3	3.3	3.2
BRL	MXN	7.3	6.7	6.0	5.4	5.0	4.0	3.6	3.2	3.0	2.9	2.8	2.7	2.7
BRL	MYR	8.7	8.0	7.1	6.4	5.9	4.8	4.3	3.8	3.6	3.5	3.4	3.3	3.3
BRL	NOK	8.2	7.5	6.7	6.1	5.6	4.5	4.0	3.6	3.4	3.3	3.2	3.1	3.1
BRL	NZD	8.2	7.5	6.7	6.1	5.6	4.5	4.0	3.6	3.4	3.3	3.2	3.1	3.1
BRL	PHP	8.6	7.8	7.0	6.3	5.8	4.7	4.2	3.8	3.6	3.4	3.3	3.3	3.2
BRL	PLN	7.9	7.2	6.4	5.8	5.4	4.3	3.9	3.5	3.3	3.1	3.0	3.0	2.9
BRL	RUB	8.5	7.7	6.9	6.2	5.7	4.6	4.1	3.6	3.4	3.3	3.2	3.1	3.1
BRL	SAR	9.2	8.4	7.5	6.8	6.3	5.1	4.5	4.1	3.9	3.7	3.6	3.5	3.5
BRL	SEK	8.5	7.8	6.9	6.3	5.8	4.7	4.2	3.7	3.5	3.4	3.3	3.2	3.2
BRL	SGD	8.2	7.5	6.7	6.1	5.6	4.5	4.0	3.6	3.4	3.3	3.2	3.1	3.1
BRL	THB	8.4	7.6	6.8	6.1	5.7	4.5	4.0	3.6	3.4	3.3	3.2	3.1	3.1
BRL	TRY	8.3	7.6	6.7	6.1	5.6	4.5	4.0	3.6	3.4	3.3	3.2	3.1	3.0
BRL	TWD	8.6	7.9	7.1	6.4	5.9	4.8	4.3	3.8	3.6	3.5	3.4	3.3	3.2
BRL	USD	9.2	8.4	7.5	6.8	6.3	5.1	4.5	4.1	3.9	3.7	3.6	3.5	3.5
BRL	ZAR	7.4	6.8	6.0	5.5	5.0	4.1	3.6	3.2	3.1	2.9	2.8	2.8	2.7
CAD	CHF	7.7	7.2	6.5	6.0	5.6	4.7	4.2	3.8	3.6	3.5	3.3	3.3	3.2
CAD	CLP	6.8	6.2	5.5	5.0	4.7	3.8	3.4	3.1	2.9	2.8	2.7	2.7	2.6
CAD	CNY	4.9	4.6	4.3	4.1	3.9	3.4	3.1	2.9	2.8	2.7	2.7	2.7	2.6
CAD	CZK	4.4	4.1	3.7	3.4	3.2	2.7	2.4	2.2	2.2	2.1	2.0	2.0	2.0
CAD	DKK	5.3	4.9	4.5	4.1	3.9	3.2	2.9	2.7	2.6	2.5	2.4	2.4	2.3
CAD	EUR	5.3	4.9	4.5	4.1	3.9	3.2	2.9	2.7	2.6	2.5	2.4	2.4	2.3
CAD	GBP	5.1	4.7	4.2	3.8	3.5	2.9	2.7	2.5	2.4	2.3	2.3	2.2	2.2
CAD	HKD	5.2	4.9	4.6	4.3	4.1	3.6	3.3	3.1	3.0	2.9	2.8	2.8	2.8
CAD	HUF	3.7	3.4	3.0	2.7	2.5	2.1	1.9	1.7	1.6	1.6	1.5	1.5	1.5
CAD	IDR	4.2	3.9	3.6	3.3	3.2	2.7	2.5	2.4	2.3	2.2	2.2	2.1	2.1
CAD	ILS	2.3	2.1	1.9	1.7	1.6	1.3	1.2	1.1	1.1	1.1	1.0	1.0	1.0
CAD	INR	4.8	4.5	4.2	4.0	3.8	3.3	3.0	2.8	2.7	2.6	2.6	2.6	2.5
CAD	JPY	6.8	6.3	5.7	5.3	4.9	4.1	3.7	3.3	3.2	3.1	3.0	2.9	2.9

2025 Exploratory Market Shock Scenario
FX Vega

Absolute Vega Shock (Vol Pts)

Currency 1	Currency 2	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
CAD	KRW	4.9	4.5	4.1	3.7	3.5	2.9	2.7	2.4	2.3	2.3	2.2	2.2	2.2
CAD	MXN	4.6	4.2	3.7	3.4	3.1	2.5	2.2	2.0	1.9	1.8	1.8	1.7	1.7
CAD	MYR	4.2	4.0	3.7	3.4	3.3	2.9	2.7	2.5	2.4	2.3	2.3	2.3	2.3
CAD	NOK	4.8	4.3	3.8	3.5	3.2	2.6	2.3	2.1	2.0	1.9	1.8	1.8	1.8
CAD	NZD	5.0	4.5	4.0	3.7	3.4	2.7	2.5	2.2	2.1	2.0	2.0	1.9	1.9
CAD	PHP	4.1	3.9	3.6	3.3	3.2	2.7	2.5	2.4	2.3	2.2	2.2	2.2	2.1
CAD	PLN	3.5	3.2	2.9	2.6	2.4	2.0	1.8	1.6	1.6	1.5	1.5	1.4	1.4
CAD	RUB	5.6	5.1	4.6	4.1	3.8	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
CAD	SEK	4.9	4.5	4.0	3.6	3.3	2.7	2.4	2.2	2.1	2.0	2.0	1.9	1.9
CAD	SGD	3.9	3.7	3.5	3.3	3.1	2.7	2.5	2.4	2.3	2.2	2.2	2.2	2.2
CAD	TRY	4.9	4.5	4.0	3.7	3.4	2.8	2.5	2.3	2.2	2.1	2.0	2.0	2.0
CAD	TWD	4.3	4.0	3.7	3.5	3.3	2.9	2.7	2.5	2.4	2.3	2.3	2.3	2.2
CAD	USD	5.2	4.9	4.6	4.3	4.1	3.6	3.3	3.1	3.0	2.9	2.8	2.8	2.8
CAD	ZAR	4.6	4.2	3.7	3.4	3.1	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
CHF	CLP	8.6	7.9	7.1	6.4	5.9	4.8	4.2	3.7	3.5	3.4	3.3	3.2	3.1
CHF	CNY	7.1	6.6	6.0	5.5	5.1	4.1	3.6	3.2	3.0	2.8	2.7	2.7	2.6
CHF	CZK	5.1	4.7	4.2	3.9	3.6	2.8	2.5	2.2	2.0	1.9	1.9	1.8	1.8
CHF	DKK	5.1	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.1	2.0	1.9	1.9	1.9
CHF	EUR	5.1	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.1	2.0	1.9	1.9	1.9
CHF	GBP	7.0	6.4	5.7	5.1	4.7	3.8	3.3	2.9	2.8	2.7	2.6	2.5	2.5
CHF	HKD	7.5	7.0	6.3	5.8	5.4	4.3	3.8	3.3	3.1	3.0	2.9	2.8	2.7
CHF	HUF	4.9	4.5	4.0	3.6	3.3	2.6	2.3	2.0	1.9	1.8	1.7	1.7	1.6
CHF	IDR	6.9	6.4	5.7	5.2	4.8	3.9	3.4	3.0	2.8	2.7	2.6	2.5	2.4
CHF	ILS	4.4	4.0	3.5	3.2	2.9	2.2	1.9	1.6	1.5	1.4	1.3	1.3	1.3
CHF	INR	7.4	6.8	6.2	5.7	5.2	4.2	3.7	3.3	3.1	2.9	2.8	2.8	2.7
CHF	ISK	5.6	5.1	4.6	4.2	3.9	3.1	2.7	2.4	2.3	2.1	2.1	2.0	2.0
CHF	JPY	6.4	5.9	5.4	4.9	4.6	3.7	3.2	2.8	2.6	2.5	2.4	2.3	2.3
CHF	KRW	7.4	6.8	6.2	5.6	5.2	4.2	3.7	3.2	3.1	2.9	2.8	2.8	2.7
CHF	MXN	7.5	6.9	6.2	5.6	5.2	4.1	3.6	3.2	3.0	2.9	2.8	2.7	2.7
CHF	MYR	6.7	6.2	5.6	5.1	4.7	3.8	3.3	2.9	2.7	2.6	2.5	2.4	2.4
CHF	NOK	6.3	5.8	5.2	4.7	4.3	3.5	3.1	2.7	2.6	2.5	2.4	2.3	2.3
CHF	NZD	7.7	7.1	6.4	5.8	5.4	4.3	3.8	3.4	3.2	3.1	3.0	2.9	2.9
CHF	PHP	6.7	6.2	5.6	5.1	4.7	3.8	3.3	2.9	2.7	2.6	2.5	2.4	2.4
CHF	PLN	4.9	4.5	4.0	3.6	3.3	2.6	2.3	2.0	1.9	1.8	1.7	1.7	1.6
CHF	RUB	7.4	6.8	6.1	5.5	5.1	4.1	3.6	3.2	3.0	2.9	2.8	2.7	2.7
CHF	SEK	5.7	5.3	4.7	4.3	3.9	3.1	2.8	2.4	2.3	2.2	2.1	2.1	2.0
CHF	SGD	6.2	5.7	5.2	4.8	4.4	3.5	3.1	2.7	2.6	2.4	2.3	2.3	2.2
CHF	THB	5.6	5.1	4.6	4.1	3.8	3.0	2.6	2.2	2.1	2.0	1.9	1.8	1.8
CHF	TRY	7.2	6.6	5.9	5.3	4.9	3.9	3.5	3.1	2.9	2.7	2.6	2.6	2.5
CHF	TWD	6.7	6.3	5.6	5.2	4.8	3.8	3.4	2.9	2.8	2.6	2.5	2.5	2.4
CHF	USD	7.5	7.0	6.3	5.8	5.4	4.3	3.8	3.3	3.1	3.0	2.9	2.8	2.7
CHF	ZAR	7.0	6.4	5.8	5.2	4.8	3.8	3.4	3.0	2.8	2.7	2.6	2.6	2.5
CLP	CNY	7.2	6.6	5.8	5.3	4.9	4.0	3.5	3.2	3.0	2.9	2.8	2.7	2.7
CLP	CZK	7.2	6.6	5.9	5.4	4.9	4.0	3.6	3.2	3.0	2.9	2.8	2.8	2.7
CLP	EUR	7.3	6.7	6.0	5.4	5.0	4.0	3.6	3.2	3.0	2.9	2.8	2.7	2.7
CLP	GBP	7.6	6.9	6.1	5.6	5.1	4.1	3.7	3.3	3.2	3.0	2.9	2.9	2.8
CLP	HKD	7.5	6.8	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
CLP	HUF	7.0	6.4	5.7	5.2	4.8	3.9	3.4	3.1	2.9	2.8	2.7	2.7	2.6
CLP	IDR	7.0	6.4	5.7	5.2	4.8	3.8	3.4	3.1	2.9	2.8	2.7	2.7	2.6
CLP	ILS	6.4	5.8	5.2	4.7	4.3	3.4	3.1	2.7	2.6	2.5	2.4	2.4	2.3
CLP	INR	6.8	6.2	5.5	5.0	4.6	3.7	3.3	3.0	2.8	2.7	2.6	2.6	2.5
CLP	JPY	8.4	7.7	6.9	6.2	5.7	4.5	4.0	3.6	3.4	3.2	3.1	3.0	3.0
CLP	KRW	7.0	6.4	5.7	5.2	4.8	3.9	3.4	3.1	2.9	2.8	2.7	2.7	2.6
CLP	MXN	6.8	6.3	5.6	5.1	4.7	3.8	3.4	3.0	2.8	2.7	2.6	2.6	2.6
CLP	MYR	7.0	6.4	5.7	5.2	4.8	3.9	3.5	3.1	2.9	2.8	2.7	2.7	2.6
CLP	NOK	7.5	6.9	6.1	5.6	5.1	4.2	3.7	3.3	3.1	3.0	2.9	2.9	2.8
CLP	NZD	7.4	6.7	6.0	5.4	5.0	4.0	3.6	3.2	3.1	2.9	2.8	2.8	2.7
CLP	RUB	7.8	7.1	6.3	5.7	5.3	4.2	3.8	3.4	3.2	3.1	3.0	2.9	2.9
CLP	SEK	7.6	6.9	6.2	5.6	5.2	4.2	3.7	3.3	3.2	3.0	2.9	2.9	2.8
CLP	SGD	6.6	6.0	5.4	4.9	4.5	3.6	3.2	2.9	2.7	2.6	2.5	2.5	2.5
CLP	TRY	7.5	6.9	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
CLP	TWD	6.9	6.3	5.6	5.1	4.7	3.8	3.4	3.0	2.9	2.8	2.7	2.6	2.6
CLP	USD	7.5	6.8	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
CLP	ZAR	7.0	6.4	5.7	5.2	4.8	3.9	3.4	3.1	2.9	2.8	2.7	2.7	2.6
CNY	HKD	1.2	1.1	1.0	0.9	0.8	0.7	0.6	0.5	0.5	0.5	0.5	0.5	0.5
CNY	JPY	4.3	3.9	3.4	3.1	2.8	2.1	1.8	1.5	1.4	1.3	1.2	1.2	1.2
CNY	USD	1.2	1.1	1.0	0.9	0.8	0.7	0.6	0.5	0.5	0.5	0.5	0.5	0.5
CNY	CZK	4.3	3.9	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
CNY	DKK	5.3	4.9	4.4	4.0	3.7	3.0	2.6	2.3	2.2	2.1	2.0	1.9	1.9
CNY	EUR	5.3	4.9	4.4	4.0	3.7	3.0	2.6	2.3	2.2	2.1	2.0	1.9	1.9
CNY	GBP	5.2	4.6	4.0	3.6	3.3	2.6	2.4	2.2	2.1	2.0	1.9	1.9	1.9
CNY	HUF	4.1	3.7	3.3	3.0	2.8	2.3	2.0	1.8	1.7	1.6	1.6	1.6	1.5
CNY	IDR	2.3	2.1	1.9	1.7	1.6	1.3	1.1	1.0	1.0	0.9	0.9	0.9	0.9
CNY	ILS	1.4	1.3	1.1	1.0	0.9	0.8	0.7	0.6	0.6	0.5	0.5	0.5	0.5
CNY	INR	2.7	2.5	2.2	2.0	1.8	1.5	1.3	1.2	1.1	1.1	1.0	1.0	1.0
CNY	KRW	4.8	4.4	3.9	3.5	3.3	2.6	2.4	2.1	2.0	1.9	1.9	1.8	1.8
CNY	KWD	1.7	1.5	1.4	1.2	1.1	0.9	0.8	0.7	0.7	0.7	0.6	0.6	0.6
CNY	MXN	5.6	5.1	4.5	4.1	3.8	3.1	2.7	2.5	2.3	2.2	2.2	2.1	2.1
CNY	MYR	1.1	1.0	0.9	0.8	0.8	0.6	0.5	0.5	0.5	0.4	0.4	0.4	0.4
CNY	NOK	6.3	5.7	5.1	4.7	4.3	3.5	3.1	2.8	2.6	2.5	2.4	2.4	2.4
CNY	NZD	6.7	6.1	5.5	5.0	4.6	3.7	3.3	3.0	2.8	2.7	2.6	2.6	2.5
CNY	PHP	1.8	1.6	1.4	1.3	1.2	1.0	0.9	0.8	0.7	0.7	0.7	0.7	0.7
CNY	PLN	4.1	3.8	3.4	3.1	2.8	2.3	2.0	1.8	1.7	1.7	1.6	1.6	1.6
CNY	RUB	5.8	5.3	4.7	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
CNY	SAR	1.2	1.1	1.0	0.9	0.8	0.7	0.6	0.5	0.5	0.5	0.5	0.5	0.5
CNY	SEK	5.8	5.3	4.7	4.3	4.0	3.2	2.9	2.6	2.4	2.3	2.3	2.2	2.2
CNY	SGD	2.4	2.2	2.0	1.8	1.7	1.3	1.2	1.1	1.0	1.0	0.9	0.9	0.9
CNY	THB	0.9	0.8	0.8	0.7	0.6	0.5	0.4	0.4	0.4	0.4	0.3	0.3	0.3
CNY	TRY	4.8	4.4	3.9	3.6	3.3	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
CNY	TWD	1.9	1.7	1.5	1.4	1.3	1.0	0.9	0.8	0.8	0.8	0.7	0.7	0.7
CNY	ZAR	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
COP	EUR	7.8	7.2	6.4	5.8	5.4	4.3	3.9	3.4	3.3	3.1	3.0	3.0	2.9
COP	JPY	8.8	8.0	7.1	6.4	5.9	4.7	4.1	3.7	3.5	3.3	3.2	3.1	3.1
COP	USD	7.5	6.8	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
CZK	DKK	2.3	2.1	1.9	1.7	1.6	1.2	1.1	0.9	0.9	0.8	0.8	0.8	0.8
CZK	EUR	2.3	2.1	1.9	1.7	1.6	1.2	1.1	0.9	0.9	0.8	0.8	0.8	0.8
CZK	GBP	4.2	3.8	3.3	3.0	2.8	2.2	2.0	1.8	1.7	1.7	1.6	1.6	1.6
CZK	HKD	4.5	4.1	3.7	3.3	3.1	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
CZK	HUF	2.2	2.0	1.8	1.6	1.5	1.2	1.1	1.0	0.9	0.9	0.8	0.8	0.8
CZK	IDR	4.3	3.9	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
CZK	INR	4.3	4.0	3.5	3.2	3.0	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
CZK	ISK	7.6	7.0	6.3	5.7	5.2	4.2	3.8	3.4	3.2	3.0	2.9	2.9	2.8
CZK	JPY	5.7	5.2	4.6	4.1	3.8	3.0	2.6	2.3	2.1	2.0	1.9	1.9	1.9
CZK	KRW	5.2	4.8	4.2	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
CZK	MXN	5.4	5.0	4.4	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
CZK	MYR	4.0	3.7	3.3	3.0	2.7	2.2	2.0	1.8	1.7	1.6	1.5	1.5	1.5
CZK	NOK	4.5	4.1	3.7	3.3	3.1	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
CZK	NZD	5.5	5.0	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0

2025 Exploratory Market Shock Scenario
FX Vega

Absolute Vega Shock (Vol Pts)

Currency 1	Currency 2	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
CZK	PHP	4.1	3.8	3.4	3.0	2.8	2.3	2.0	1.8	1.7	1.6	1.6	1.6	1.5
CZK	PLN	2.1	1.9	1.7	1.5	1.4	1.1	1.0	0.9	0.8	0.8	0.8	0.8	0.7
CZK	RON	2.7	2.4	2.2	2.0	1.8	1.5	1.3	1.2	1.1	1.1	1.0	1.0	1.0
CZK	RUB	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
CZK	SEK	3.8	3.4	3.1	2.8	2.6	2.1	1.9	1.7	1.6	1.5	1.5	1.4	1.4
CZK	SGD	3.2	3.0	2.6	2.4	2.2	1.8	1.6	1.4	1.4	1.3	1.3	1.2	1.2
CZK	THB	3.6	3.3	2.9	2.6	2.4	1.9	1.7	1.5	1.4	1.4	1.3	1.3	1.3
CZK	TRY	5.4	4.9	4.4	4.0	3.7	3.0	2.6	2.4	2.2	2.1	2.1	2.0	2.0
CZK	TWD	4.1	3.8	3.4	3.1	2.8	2.3	2.0	1.8	1.7	1.7	1.6	1.6	1.6
CZK	USD	4.5	4.1	3.7	3.3	3.1	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
CZK	ZAR	5.4	5.0	4.4	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
DKK	EUR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
DKK	GBP	4.8	4.3	3.8	3.5	3.2	2.5	2.3	2.0	1.9	1.8	1.8	1.7	1.7
DKK	HKD	5.6	5.2	4.7	4.3	4.0	3.2	2.8	2.5	2.3	2.2	2.1	2.1	2.0
DKK	HUF	2.1	1.9	1.7	1.5	1.3	1.0	0.9	0.8	0.7	0.7	0.7	0.7	0.7
DKK	INR	5.4	4.9	4.5	4.1	3.8	3.0	2.7	2.3	2.2	2.1	2.0	2.0	1.9
DKK	JPY	6.1	5.6	5.0	4.5	4.2	3.3	2.9	2.5	2.3	2.2	2.1	2.1	2.0
DKK	KRW	5.7	5.3	4.7	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.1	2.1
DKK	NOK	4.3	3.9	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
DKK	PLN	2.1	1.9	1.7	1.5	1.3	1.0	0.9	0.8	0.7	0.7	0.7	0.7	0.7
DKK	RUB	6.2	5.7	5.0	4.6	4.2	3.4	3.0	2.6	2.5	2.4	2.3	2.3	2.2
DKK	SEK	3.3	3.0	2.7	2.4	2.2	1.8	1.6	1.4	1.4	1.3	1.3	1.2	1.2
DKK	THB	4.1	3.8	3.4	3.0	2.8	2.2	1.9	1.6	1.5	1.4	1.4	1.3	1.3
DKK	TRY	5.7	5.2	4.6	4.2	3.9	3.1	2.7	2.4	2.3	2.2	2.1	2.1	2.0
DKK	TWD	5.0	4.6	4.2	3.8	3.5	2.8	2.5	2.2	2.0	1.9	1.9	1.8	1.8
DKK	USD	5.6	5.2	4.7	4.3	4.0	3.2	2.8	2.5	2.3	2.2	2.1	2.1	2.0
DKK	ZAR	5.5	5.1	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
EGP	EUR	8.0	7.4	6.6	6.0	5.5	4.4	3.9	3.5	3.3	3.2	3.0	3.0	2.9
EGP	SAR	6.0	5.5	4.9	4.5	4.1	3.3	3.0	2.7	2.5	2.4	2.3	2.3	2.3
EGP	USD	6.0	5.5	4.9	4.5	4.1	3.3	3.0	2.7	2.5	2.4	2.3	2.3	2.3
EUR	GBP	4.8	4.3	3.8	3.5	3.2	2.5	2.3	2.0	1.9	1.8	1.8	1.7	1.7
EUR	HKD	5.6	5.2	4.7	4.3	4.0	3.2	2.8	2.5	2.3	2.2	2.1	2.1	2.0
EUR	HUF	2.1	1.9	1.7	1.5	1.3	1.0	0.9	0.8	0.7	0.7	0.7	0.7	0.7
EUR	IDR	5.1	4.7	4.2	3.8	3.5	2.8	2.5	2.2	2.1	2.0	1.9	1.8	1.8
EUR	ILS	2.9	2.6	2.3	2.0	1.8	1.4	1.2	1.0	0.9	0.9	0.8	0.8	0.8
EUR	INR	5.4	4.9	4.5	4.1	3.8	3.0	2.7	2.3	2.2	2.1	2.0	2.0	1.9
EUR	ISK	5.0	4.6	4.1	3.8	3.5	2.8	2.5	2.2	2.1	2.0	1.9	1.9	1.8
EUR	JPY	6.1	5.6	5.0	4.5	4.2	3.3	2.9	2.5	2.3	2.2	2.1	2.1	2.0
EUR	KRW	5.7	5.3	4.7	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.1	2.1
EUR	KRO	5.7	5.3	4.7	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.1	2.1
EUR	MXN	6.0	5.5	4.9	4.4	4.1	3.3	2.9	2.6	2.4	2.3	2.2	2.2	2.2
EUR	MYR	5.0	4.6	4.1	3.7	3.5	2.7	2.4	2.1	2.0	1.9	1.8	1.8	1.7
EUR	NOK	4.3	3.9	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
EUR	NZD	5.8	5.3	4.7	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.1
EUR	PEN	8.0	7.4	6.6	6.0	5.5	4.4	3.9	3.5	3.3	3.2	3.1	3.0	3.0
EUR	PHP	5.0	4.6	4.1	3.8	3.5	2.7	2.4	2.1	2.0	1.9	1.8	1.8	1.7
EUR	PLN	2.1	1.9	1.7	1.5	1.3	1.0	0.9	0.8	0.7	0.7	0.7	0.7	0.7
EUR	RON	1.8	1.6	1.4	1.2	1.1	0.8	0.7	0.6	0.6	0.6	0.6	0.5	0.5
EUR	RUB	6.2	5.7	5.0	4.6	4.2	3.4	3.0	2.6	2.5	2.4	2.3	2.3	2.2
EUR	SAR	5.6	5.2	4.7	4.3	4.0	3.2	2.8	2.5	2.3	2.2	2.1	2.1	2.0
EUR	SEK	3.3	3.0	2.7	2.4	2.2	1.8	1.6	1.4	1.4	1.3	1.3	1.2	1.2
EUR	SGD	4.1	3.8	3.4	3.1	2.9	2.3	2.0	1.8	1.7	1.6	1.5	1.5	1.5
EUR	SKK	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
EUR	THB	4.1	3.8	3.4	3.0	2.8	2.2	1.9	1.6	1.5	1.4	1.4	1.3	1.3
EUR	TRY	5.7	5.2	4.6	4.2	3.9	3.1	2.7	2.4	2.3	2.2	2.1	2.1	2.0
EUR	TWD	5.0	4.6	4.2	3.8	3.5	2.8	2.5	2.2	2.0	1.9	1.9	1.8	1.8
EUR	UAH	6.9	6.3	5.7	5.2	4.8	3.8	3.4	3.0	2.8	2.7	2.6	2.6	2.5
EUR	USD	5.6	5.2	4.7	4.3	4.0	3.2	2.8	2.5	2.3	2.2	2.1	2.1	2.0
EUR	XAU	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1
EUR	ZAR	5.5	5.1	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
GBP	HKD	5.5	4.9	4.3	3.8	3.5	2.8	2.5	2.3	2.2	2.1	2.0	2.0	2.0
GBP	HUF	3.9	3.6	3.2	2.9	2.6	2.1	1.9	1.7	1.6	1.6	1.5	1.5	1.5
GBP	IDR	4.9	4.4	3.8	3.4	3.1	2.5	2.3	2.0	2.0	1.9	1.8	1.8	1.8
GBP	ILS	3.1	2.8	2.4	2.1	1.9	1.5	1.4	1.2	1.2	1.1	1.1	1.1	1.1
GBP	INR	5.3	4.7	4.1	3.6	3.3	2.7	2.4	2.2	2.1	2.0	2.0	1.9	1.9
GBP	JPY	6.7	6.1	5.3	4.7	4.3	3.4	3.0	2.6	2.5	2.4	2.3	2.3	2.2
GBP	KRW	5.7	5.1	4.5	4.1	3.7	3.0	2.7	2.4	2.3	2.2	2.2	2.1	2.1
GBP	MXN	5.8	5.3	4.7	4.2	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
GBP	MYR	4.9	4.3	3.8	3.3	3.1	2.4	2.2	2.0	1.9	1.9	1.8	1.8	1.8
GBP	NOK	5.2	4.8	4.2	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
GBP	NZD	5.9	5.4	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.3	2.2	2.2
GBP	PHP	4.8	4.3	3.8	3.4	3.1	2.5	2.2	2.0	1.9	1.9	1.8	1.8	1.8
GBP	PLN	3.7	3.3	3.0	2.7	2.5	2.0	1.8	1.6	1.5	1.5	1.4	1.4	1.4
GBP	RUB	6.4	5.8	5.2	4.7	4.3	3.5	3.1	2.8	2.6	2.5	2.5	2.4	2.4
GBP	SEK	5.0	4.6	4.1	3.7	3.4	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
GBP	SGD	4.4	3.9	3.4	3.0	2.8	2.2	2.0	1.8	1.8	1.7	1.6	1.6	1.6
GBP	THB	4.1	3.6	3.1	2.8	2.5	2.0	1.8	1.6	1.6	1.5	1.5	1.4	1.4
GBP	TRY	5.7	5.1	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.2	2.1	2.1
GBP	TWD	4.9	4.4	3.8	3.4	3.1	2.5	2.2	2.0	2.0	1.9	1.8	1.8	1.8
GBP	USD	5.5	4.9	4.3	3.8	3.5	2.8	2.5	2.3	2.2	2.1	2.0	2.0	2.0
GBP	ZAR	5.8	5.3	4.7	4.2	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
HKD	HUF	4.2	3.9	3.4	3.1	2.9	2.3	2.1	1.9	1.8	1.7	1.6	1.6	1.6
HKD	IDR	2.4	2.2	2.0	1.8	1.6	1.3	1.2	1.1	1.0	1.0	0.9	0.9	0.9
HKD	INR	2.9	2.7	2.4	2.2	2.0	1.6	1.4	1.3	1.2	1.2	1.1	1.1	1.1
HKD	JPY	4.4	4.0	3.5	3.1	2.8	2.1	1.8	1.5	1.4	1.3	1.2	1.2	1.2
HKD	KRW	5.1	4.6	4.1	3.8	3.5	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
HKD	KWD	1.4	1.3	1.1	1.0	1.0	0.8	0.7	0.6	0.6	0.6	0.5	0.5	0.5
HKD	MXN	5.7	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
HKD	MYR	1.0	0.9	0.8	0.7	0.7	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
HKD	NOK	6.6	6.1	5.4	4.9	4.5	3.7	3.3	2.9	2.8	2.7	2.6	2.5	2.5
HKD	NZD	7.0	6.4	5.7	5.2	4.8	3.9	3.5	3.1	2.9	2.8	2.7	2.7	2.6
HKD	PLN	4.3	3.9	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
HKD	RUB	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
HKD	SAR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
HKD	SEK	6.1	5.6	5.0	4.5	4.2	3.4	3.0	2.7	2.5	2.4	2.4	2.3	2.3
HKD	SGD	2.8	2.5	2.3	2.0	1.9	1.5	1.4	1.2	1.2	1.1	1.1	1.1	1.0
HKD	THB	1.0	0.9	0.8	0.7	0.7	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
HKD	TRY	4.8	4.4	3.9	3.6	3.3	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
HKD	TWD	2.1	1.9	1.7	1.6	1.4	1.2	1.0	0.9	0.9	0.8	0.8	0.8	0.8
HKD	USD	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
HKD	ZAR	6.0	5.5	4.9	4.5	4.1	3.3	3.0	2.7	2.5	2.4	2.3	2.3	2.3
HUF	IDR	4.0	3.7	3.3	3.0	2.8	2.2	2.0	1.8	1.7	1.6	1.6	1.5	1.5
HUF	ILS	3.1	2.8	2.5	2.3	2.1	1.7	1.5	1.3	1.3	1.2	1.2	1.1	1.1
HUF	INR	3.8	3.5	3.1	2.8	2.6	2.1	1.8	1.6	1.6	1.5	1.4	1.4	1.4
HUF	JPY	5.8	5.2	4.6	4.1	3.8	3.0	2.6	2.3	2.1	2.0	2.0	1.9	1.9
HUF	KRW	4.7	4.3	3.8	3.4	3.2	2.5	2.3	2.0	1.9	1.8	1.8	1.7	1.7
HUF	MXN	5.1	4.7	4.2	3.8	3.5	2.8	2.5	2.3	2.1	2.1	2.0	2.0	1.9
HUF	MYR	3.8	3.5	3.1	2.9	2.6	2.1	1.9	1.7	1.6	1.5	1.5	1.5	1.4

2025 Exploratory Market Shock Scenario
FX Vega

Absolute Vega Shock (Vol Pts)

Currency 1	Currency 2	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
HUF	NOK	4.3	3.9	3.5	3.1	2.9	2.3	2.1	1.8	1.7	1.7	1.6	1.6	1.6
HUF	NZD	4.8	4.4	3.9	3.5	3.2	2.6	2.3	2.0	1.9	1.8	1.8	1.7	1.7
HUF	PLN	2.2	2.0	1.8	1.7	1.5	1.2	1.1	1.0	0.9	0.9	0.9	0.9	0.8
HUF	RON	2.7	2.5	2.2	2.0	1.9	1.5	1.3	1.2	1.1	1.1	1.1	1.0	1.0
HUF	RUB	5.7	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
HUF	SEK	3.6	3.3	2.9	2.6	2.4	1.9	1.7	1.5	1.5	1.4	1.3	1.3	1.3
HUF	SGD	3.0	2.7	2.4	2.2	2.0	1.6	1.4	1.3	1.2	1.2	1.1	1.1	1.1
HUF	THB	3.6	3.3	3.0	2.7	2.5	2.0	1.8	1.6	1.5	1.4	1.4	1.4	1.3
HUF	TRY	5.3	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
HUF	TWD	3.9	3.5	3.2	2.9	2.6	2.1	1.9	1.7	1.6	1.6	1.5	1.5	1.4
HUF	USD	4.2	3.9	3.4	3.1	2.9	2.3	2.1	1.9	1.8	1.7	1.6	1.6	1.6
HUF	ZAR	5.1	4.6	4.1	3.8	3.5	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
IDR	ILS	1.9	1.7	1.5	1.4	1.3	1.0	0.9	0.8	0.8	0.7	0.7	0.7	0.7
IDR	INR	2.4	2.2	1.9	1.8	1.6	1.3	1.1	1.0	1.0	0.9	0.9	0.9	0.9
IDR	JPY	5.0	4.6	4.0	3.6	3.2	2.5	2.2	1.9	1.7	1.6	1.6	1.5	1.5
IDR	KRW	4.3	4.0	3.5	3.2	3.0	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
IDR	MXN	5.1	4.7	4.2	3.8	3.5	2.8	2.5	2.3	2.1	2.1	2.0	2.0	1.9
IDR	MYR	1.9	1.8	1.6	1.4	1.3	1.1	1.0	0.9	0.8	0.8	0.7	0.7	0.7
IDR	NOK	5.9	5.4	4.8	4.3	4.0	3.2	2.9	2.6	2.4	2.3	2.3	2.2	2.2
IDR	NZD	6.0	5.5	4.9	4.4	4.1	3.3	2.9	2.6	2.5	2.4	2.3	2.3	2.2
IDR	PHP	2.2	2.0	1.8	1.6	1.5	1.2	1.1	1.0	0.9	0.9	0.9	0.8	0.8
IDR	PLN	4.0	3.7	3.3	3.0	2.7	2.2	2.0	1.8	1.7	1.6	1.6	1.5	1.5
IDR	RUB	5.6	5.1	4.6	4.2	3.8	3.1	2.8	2.5	2.3	2.3	2.2	2.1	2.1
IDR	SEK	5.7	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
IDR	SGD	2.4	2.2	2.0	1.8	1.7	1.3	1.2	1.1	1.0	1.0	0.9	0.9	0.9
IDR	THB	1.8	1.6	1.4	1.3	1.2	1.0	0.8	0.8	0.7	0.7	0.7	0.7	0.6
IDR	TRY	4.8	4.4	3.9	3.6	3.3	2.6	2.4	2.1	2.0	1.9	1.9	1.8	1.8
IDR	TWD	2.4	2.2	2.0	1.8	1.7	1.3	1.2	1.1	1.0	1.0	0.9	0.9	0.9
IDR	USD	2.4	2.2	2.0	1.8	1.6	1.3	1.2	1.1	1.0	1.0	0.9	0.9	0.9
IDR	ZAR	5.5	5.0	4.5	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
ILS	INR	1.5	1.3	1.2	1.0	1.0	0.7	0.7	0.6	0.5	0.5	0.5	0.5	0.5
ILS	JPY	3.9	3.4	3.0	2.6	2.3	1.7	1.5	1.3	1.2	1.1	1.1	1.0	1.0
ILS	KRW	3.5	3.1	2.7	2.5	2.2	1.8	1.6	1.4	1.3	1.3	1.2	1.2	1.2
ILS	MXN	4.8	4.4	3.9	3.5	3.2	2.6	2.3	2.1	2.0	1.9	1.8	1.8	1.8
ILS	MYR	1.3	1.2	1.0	1.0	0.9	0.7	0.6	0.6	0.5	0.5	0.5	0.5	0.5
ILS	NOK	4.6	4.2	3.7	3.3	3.0	2.4	2.1	1.9	1.8	1.7	1.6	1.6	1.6
ILS	PHP	1.6	1.4	1.3	1.2	1.1	0.9	0.8	0.7	0.6	0.6	0.6	0.6	0.6
ILS	RUB	5.5	5.0	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.1
ILS	SEK	4.3	3.9	3.5	3.1	2.8	2.3	2.0	1.8	1.7	1.6	1.5	1.5	1.5
ILS	SGD	1.1	1.0	0.9	0.8	0.7	0.6	0.5	0.4	0.4	0.4	0.4	0.4	0.4
ILS	TRY	4.4	4.1	3.6	3.3	3.0	2.4	2.2	1.9	1.8	1.8	1.7	1.7	1.6
ILS	TWD	1.6	1.4	1.3	1.1	1.1	0.8	0.8	0.7	0.6	0.6	0.6	0.6	0.6
ILS	USD	1.4	1.3	1.1	1.0	1.0	0.8	0.7	0.6	0.6	0.6	0.5	0.5	0.5
ILS	ZAR	5.1	4.6	4.1	3.7	3.4	2.8	2.5	2.2	2.1	2.0	1.9	1.9	1.9
INR	JPY	5.2	4.8	4.2	3.8	3.4	2.6	2.3	2.0	1.8	1.7	1.6	1.6	1.6
INR	KRW	4.3	4.0	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
INR	MXN	4.8	4.4	3.9	3.6	3.3	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
INR	MYR	1.7	1.5	1.3	1.2	1.1	0.8	0.7	0.6	0.6	0.6	0.5	0.5	0.5
INR	NOK	6.0	5.5	4.9	4.4	4.1	3.3	2.9	2.6	2.5	2.4	2.3	2.3	2.2
INR	NZD	6.2	5.7	5.1	4.6	4.3	3.4	3.1	2.7	2.6	2.5	2.4	2.4	2.3
INR	PHP	1.7	1.5	1.3	1.2	1.1	0.9	0.7	0.7	0.6	0.6	0.6	0.6	0.6
INR	PLN	3.8	3.4	3.1	2.8	2.6	2.1	1.8	1.6	1.5	1.5	1.4	1.4	1.4
INR	RUB	5.4	4.9	4.4	4.0	3.7	3.0	2.6	2.4	2.2	2.1	2.1	2.0	2.0
INR	SEK	5.5	5.1	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.1
INR	SGD	2.7	2.5	2.2	2.0	1.8	1.5	1.3	1.2	1.1	1.1	1.0	1.0	1.0
INR	THB	1.3	1.1	1.0	0.8	0.8	0.6	0.5	0.4	0.4	0.4	0.4	0.4	0.4
INR	TRY	4.5	4.1	3.6	3.3	3.0	2.4	2.2	2.0	1.8	1.8	1.7	1.7	1.7
INR	TWD	2.4	2.2	1.9	1.7	1.6	1.3	1.1	1.0	0.9	0.9	0.9	0.9	0.8
INR	USD	2.9	2.7	2.4	2.2	2.0	1.6	1.4	1.3	1.2	1.2	1.1	1.1	1.1
INR	ZAR	5.2	4.8	4.2	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	1.9
ISK	JPY	7.6	6.9	6.1	5.6	5.1	4.0	3.5	3.1	2.9	2.8	2.7	2.6	2.6
ISK	PLN	7.4	6.7	6.0	5.4	5.0	4.0	3.6	3.2	3.0	2.9	2.8	2.8	2.7
ISK	SGD	6.8	6.3	5.6	5.1	4.7	3.8	3.4	3.0	2.8	2.7	2.6	2.6	2.5
ISK	TWD	6.5	6.0	5.3	4.8	4.5	3.6	3.2	2.9	2.7	2.6	2.5	2.5	2.4
ISK	USD	6.3	5.7	5.1	4.7	4.3	3.5	3.1	2.7	2.6	2.5	2.4	2.4	2.3
JPY	KRW	6.7	6.1	5.4	4.9	4.5	3.5	3.1	2.7	2.5	2.4	2.3	2.3	2.2
JPY	MXN	7.3	6.6	5.9	5.3	4.9	3.8	3.4	3.0	2.8	2.7	2.6	2.5	2.5
JPY	MYR	4.4	3.9	3.4	3.0	2.8	2.1	1.8	1.5	1.4	1.3	1.2	1.2	1.2
JPY	NOK	7.4	6.8	6.0	5.5	5.0	4.0	3.5	3.1	2.9	2.8	2.7	2.6	2.6
JPY	NZD	8.0	7.3	6.5	5.9	5.4	4.3	3.8	3.3	3.2	3.0	2.9	2.8	2.8
JPY	PHP	4.7	4.2	3.7	3.3	3.0	2.3	1.9	1.7	1.5	1.5	1.4	1.3	1.3
JPY	PLN	5.9	5.3	4.7	4.2	3.9	3.0	2.6	2.3	2.2	2.1	2.0	2.0	1.9
JPY	RUB	7.3	6.6	5.9	5.3	4.8	3.8	3.4	3.0	2.8	2.7	2.6	2.5	2.5
JPY	SEK	7.0	6.4	5.7	5.1	4.7	3.7	3.3	2.9	2.7	2.6	2.5	2.5	2.4
JPY	SGD	4.5	4.1	3.6	3.2	2.9	2.3	1.9	1.7	1.6	1.5	1.4	1.4	1.3
JPY	THB	3.8	3.4	2.9	2.6	2.3	1.7	1.4	1.2	1.1	1.0	1.0	1.0	0.9
JPY	TRY	6.7	6.0	5.3	4.8	4.4	3.4	3.0	2.7	2.5	2.4	2.3	2.2	2.2
JPY	TWD	4.7	4.3	3.7	3.3	3.0	2.3	2.0	1.7	1.6	1.5	1.4	1.4	1.4
JPY	USD	4.4	4.0	3.5	3.1	2.8	2.1	1.8	1.5	1.4	1.3	1.2	1.2	1.2
JPY	ZAR	7.4	6.8	6.0	5.4	5.0	3.9	3.5	3.1	2.9	2.7	2.6	2.6	2.5
KRW	USD	5.1	4.6	4.1	3.8	3.5	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
KRO	USD	5.1	4.6	4.1	3.8	3.5	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
KRW	MXN	5.5	5.0	4.5	4.1	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
KRW	MYR	4.4	4.0	3.5	3.2	3.0	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
KRW	NOK	6.1	5.5	4.9	4.5	4.1	3.3	3.0	2.7	2.5	2.4	2.4	2.3	2.3
KRW	NZD	5.9	5.4	4.8	4.4	4.1	3.3	2.9	2.6	2.5	2.4	2.3	2.3	2.2
KRW	PHP	4.2	3.8	3.4	3.1	2.8	2.3	2.0	1.8	1.7	1.6	1.6	1.6	1.5
KRW	PLN	4.4	4.0	3.6	3.3	3.0	2.4	2.1	1.9	1.8	1.7	1.7	1.7	1.6
KRW	RUB	6.4	5.8	5.2	4.7	4.3	3.5	3.1	2.8	2.6	2.5	2.4	2.4	2.4
KRW	SEK	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
KRW	SGD	3.9	3.6	3.2	2.9	2.7	2.2	1.9	1.7	1.6	1.6	1.5	1.5	1.5
KRW	THB	3.9	3.5	3.1	2.8	2.5	2.0	1.8	1.6	1.5	1.4	1.4	1.4	1.3
KRW	TRY	5.5	5.0	4.5	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
KRW	TWD	3.8	3.5	3.1	2.8	2.6	2.1	1.9	1.7	1.6	1.5	1.5	1.5	1.4
KRW	ZAR	5.2	4.8	4.2	3.9	3.6	2.9	2.5	2.3	2.2	2.1	2.0	2.0	1.9
KWD	RUB	5.8	5.3	4.7	4.3	4.0	3.2	2.9	2.6	2.4	2.3	2.2	2.2	2.2
KWD	SAR	1.4	1.3	1.1	1.0	1.0	0.8	0.7	0.6	0.6	0.6	0.5	0.5	0.5
KWD	USD	1.4	1.3	1.1	1.0	1.0	0.8	0.7	0.6	0.6	0.6	0.5	0.5	0.5
KZT	USD	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
MXN	MYR	5.3	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
MXN	NOK	5.8	5.3	4.7	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
MXN	NZD	5.9	5.4	4.8	4.3	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.1
MXN	PHP	5.3	4.9	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.1	2.0	2.0
MXN	PLN	5.0	4.6	4.1	3.7	3.4	2.8	2.5	2.2	2.1	2.0	1.9	1.9	1.9
MXN	RUB	6.3	5.8	5.1	4.7	4.3	3.5	3.1	2.8	2.6	2.5	2.4	2.4	2.4
MXN	SEK	6.1	5.6	5.0	4.5	4.2	3.4	3.0	2.7	2.6	2.5	2.4	2.3	2.3
MXN	SGD	4.8	4.3	3.9	3.5	3.2	2.6	2.3	2.1	2.0	1.9	1.8	1.8	1.8
MXN	THB	5.2	4.7	4.2	3.8	3.5	2.8	2.5	2.3	2.1	2.0	2.0	1.9	1.9

2025 Exploratory Market Shock Scenario
FX Vega

Absolute Vega Shock (Vol Pts)

Currency 1	Currency 2	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
MXN	TRY	6.2	5.6	5.0	4.6	4.2	3.4	3.0	2.7	2.6	2.5	2.4	2.3	2.3
MXN	TWD	5.3	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.1	2.0	2.0
MXN	USD	5.7	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
MXN	ZAR	5.3	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
MXV	USD	5.7	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
MYR	NOK	6.0	5.5	4.9	4.5	4.1	3.3	3.0	2.6	2.5	2.4	2.3	2.3	2.2
MYR	NZD	6.3	5.8	5.1	4.7	4.3	3.4	3.1	2.7	2.6	2.5	2.4	2.4	2.3
MYR	PHP	1.4	1.2	1.1	1.0	0.9	0.8	0.7	0.6	0.6	0.5	0.5	0.5	0.5
MYR	PLN	3.9	3.6	3.2	2.9	2.7	2.2	1.9	1.7	1.6	1.6	1.5	1.5	1.5
MYR	RUB	5.6	5.1	4.6	4.1	3.8	3.1	2.8	2.5	2.3	2.2	2.2	2.1	2.1
MYR	SAR	1.0	0.9	0.8	0.7	0.7	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
MYR	SEK	5.6	5.1	4.6	4.1	3.8	3.1	2.7	2.5	2.3	2.2	2.2	2.1	2.1
MYR	SGD	1.7	1.5	1.3	1.2	1.1	0.8	0.7	0.7	0.6	0.6	0.6	0.6	0.6
MYR	TRY	4.6	4.2	3.8	3.4	3.2	2.6	2.3	2.0	1.9	1.9	1.8	1.8	1.7
MYR	TWD	1.6	1.4	1.3	1.1	1.1	0.8	0.8	0.7	0.6	0.6	0.6	0.6	0.6
MYR	USD	1.0	0.9	0.8	0.7	0.7	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
MYR	ZAR	5.5	5.1	4.5	4.1	3.8	3.1	2.7	2.4	2.3	2.2	2.2	2.1	2.1
NOK	NZD	5.5	5.0	4.5	4.1	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
NOK	PHP	6.0	5.5	4.9	4.4	4.1	3.3	2.9	2.6	2.5	2.4	2.3	2.3	2.2
NOK	PLN	4.2	3.8	3.4	3.0	2.8	2.2	2.0	1.8	1.7	1.6	1.6	1.5	1.5
NOK	RUB	6.6	6.0	5.4	4.9	4.5	3.6	3.2	2.9	2.7	2.6	2.5	2.5	2.4
NOK	SEK	3.9	3.6	3.2	2.9	2.7	2.2	1.9	1.7	1.6	1.6	1.5	1.5	1.5
NOK	SGD	5.0	4.6	4.1	3.7	3.5	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
NOK	TRY	6.4	5.9	5.2	4.7	4.3	3.5	3.1	2.8	2.6	2.5	2.4	2.4	2.4
NOK	TWD	5.9	5.4	4.8	4.4	4.1	3.3	2.9	2.6	2.5	2.4	2.3	2.3	2.2
NOK	USD	6.6	6.1	5.4	4.9	4.5	3.7	3.3	2.9	2.8	2.7	2.6	2.5	2.5
NOK	ZAR	5.6	5.1	4.6	4.1	3.8	3.1	2.7	2.4	2.3	2.2	2.1	2.1	2.1
NZD	PLN	4.6	4.2	3.7	3.4	3.1	2.5	2.2	1.9	1.8	1.8	1.7	1.7	1.6
NZD	RUB	7.0	6.4	5.7	5.1	4.7	3.8	3.4	3.0	2.9	2.7	2.6	2.6	2.6
NZD	SEK	5.3	4.9	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
NZD	SGD	5.4	4.9	4.4	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
NZD	THB	5.6	5.0	4.4	4.0	3.7	2.9	2.6	2.3	2.2	2.1	2.0	2.0	1.9
NZD	TRY	6.0	5.4	4.8	4.4	4.0	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.1
NZD	TWD	6.1	5.6	5.0	4.5	4.2	3.4	3.0	2.7	2.5	2.4	2.4	2.3	2.3
NZD	USD	7.0	6.4	5.7	5.2	4.8	3.9	3.5	3.1	2.9	2.8	2.7	2.7	2.6
NZD	ZAR	5.3	4.8	4.3	3.9	3.6	2.8	2.5	2.3	2.1	2.0	2.0	1.9	1.9
PEN	USD	7.5	6.8	6.1	5.5	5.1	4.1	3.7	3.3	3.1	3.0	2.9	2.8	2.8
PHP	PLN	3.9	3.6	3.2	2.9	2.7	2.2	1.9	1.7	1.6	1.6	1.5	1.5	1.5
PHP	RUB	5.6	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
PHP	SEK	5.6	5.1	4.5	4.1	3.8	3.1	2.7	2.4	2.3	2.2	2.2	2.1	2.1
PHP	SGD	2.1	1.9	1.7	1.5	1.4	1.1	1.0	0.9	0.8	0.8	0.8	0.8	0.7
PHP	TRY	4.7	4.3	3.9	3.5	3.2	2.6	2.3	2.1	2.0	1.9	1.8	1.8	1.8
PHP	TWD	1.9	1.8	1.6	1.4	1.3	1.1	0.9	0.8	0.8	0.8	0.7	0.7	0.7
PHP	USD	1.6	1.5	1.3	1.2	1.1	0.9	0.8	0.7	0.7	0.7	0.6	0.6	0.6
PHP	ZAR	5.6	5.1	4.5	4.1	3.8	3.1	2.7	2.5	2.3	2.2	2.2	2.1	2.1
PLN	RON	2.8	2.5	2.2	2.0	1.9	1.5	1.4	1.2	1.2	1.1	1.1	1.1	1.0
PLN	RUB	5.6	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
PLN	SEK	3.6	3.2	2.9	2.6	2.4	1.9	1.7	1.5	1.5	1.4	1.3	1.3	1.3
PLN	SGD	3.0	2.7	2.4	2.2	2.0	1.6	1.5	1.3	1.2	1.2	1.1	1.1	1.1
PLN	THB	3.7	3.4	3.0	2.7	2.5	2.0	1.8	1.6	1.5	1.4	1.4	1.4	1.4
PLN	TRY	5.3	4.8	4.3	3.9	3.6	2.9	2.6	2.3	2.2	2.1	2.0	2.0	2.0
PLN	TWD	3.8	3.5	3.1	2.8	2.6	2.1	1.9	1.7	1.6	1.5	1.5	1.5	1.4
PLN	USD	4.3	3.9	3.5	3.2	2.9	2.4	2.1	1.9	1.8	1.7	1.7	1.6	1.6
PLN	ZAR	5.0	4.6	4.1	3.7	3.5	2.8	2.5	2.2	2.1	2.0	2.0	1.9	1.9
QAR	USD	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
RON	RUB	6.1	5.6	5.0	4.5	4.2	3.4	3.0	2.7	2.5	2.4	2.4	2.3	2.3
RON	TRY	5.4	4.9	4.4	4.0	3.7	3.0	2.6	2.4	2.2	2.2	2.1	2.1	2.0
RON	USD	4.3	4.0	3.5	3.2	3.0	2.4	2.1	1.9	1.8	1.7	1.7	1.7	1.6
RUB	SAR	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
RUB	SEK	6.4	5.9	5.2	4.7	4.4	3.5	3.1	2.8	2.6	2.5	2.5	2.4	2.4
RUB	SGD	5.4	5.0	4.4	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
RUB	THB	5.6	5.1	4.6	4.1	3.8	3.1	2.7	2.5	2.3	2.2	2.2	2.1	2.1
RUB	TRY	6.7	6.2	5.5	5.0	4.6	3.7	3.3	3.0	2.8	2.7	2.6	2.6	2.5
RUB	TWD	5.6	5.1	4.6	4.2	3.8	3.1	2.8	2.5	2.3	2.2	2.2	2.1	2.1
RUB	UAH	7.1	6.5	5.8	5.3	4.9	3.9	3.5	3.1	3.0	2.8	2.8	2.7	2.7
RUB	USD	5.8	5.3	4.7	4.3	3.9	3.2	2.8	2.5	2.4	2.3	2.2	2.2	2.2
RUB	ZAR	6.8	6.2	5.5	5.0	4.6	3.7	3.3	3.0	2.8	2.7	2.6	2.6	2.5
SAR	USD	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SEK	SGD	4.6	4.2	3.8	3.4	3.2	2.6	2.3	2.0	1.9	1.9	1.8	1.8	1.7
SEK	THB	5.2	4.7	4.2	3.8	3.5	2.8	2.5	2.2	2.1	2.0	1.9	1.9	1.9
SEK	TRY	6.2	5.7	5.1	4.6	4.2	3.4	3.0	2.7	2.6	2.5	2.4	2.3	2.3
SEK	TWD	5.5	5.0	4.5	4.1	3.8	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.1
SEK	USD	6.1	5.6	5.0	4.5	4.2	3.4	3.0	2.7	2.5	2.4	2.4	2.3	2.3
SEK	ZAR	5.7	5.2	4.6	4.2	3.9	3.1	2.8	2.5	2.4	2.3	2.2	2.2	2.1
SGD	THB	1.2	1.0	0.9	0.8	0.7	0.6	0.5	0.4	0.4	0.4	0.4	0.4	0.4
SGD	TRY	4.5	4.1	3.7	3.3	3.1	2.5	2.2	2.0	1.9	1.8	1.7	1.7	1.7
SGD	TWD	2.1	1.9	1.7	1.5	1.4	1.1	1.0	0.9	0.9	0.8	0.8	0.8	0.8
SGD	USD	2.8	2.5	2.3	2.0	1.9	1.5	1.4	1.2	1.2	1.1	1.1	1.1	1.0
SGD	ZAR	4.7	4.3	3.9	3.5	3.2	2.6	2.3	2.1	2.0	1.9	1.8	1.8	1.8
THB	TRY	4.5	4.2	3.7	3.4	3.1	2.5	2.2	2.0	1.9	1.8	1.8	1.7	1.7
THB	TWD	1.4	1.2	1.1	1.0	0.9	0.7	0.6	0.6	0.5	0.5	0.5	0.5	0.5
THB	USD	1.0	0.9	0.8	0.7	0.7	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
THB	ZAR	5.4	4.9	4.4	4.0	3.7	3.0	2.6	2.4	2.2	2.1	2.1	2.0	2.0
TRY	TWD	4.7	4.3	3.8	3.5	3.2	2.6	2.3	2.1	2.0	1.9	1.8	1.8	1.8
TRY	USD	4.8	4.4	3.9	3.6	3.3	2.7	2.4	2.1	2.0	1.9	1.9	1.8	1.8
TRY	ZAR	5.9	5.4	4.8	4.4	4.0	3.3	2.9	2.6	2.5	2.4	2.3	2.2	2.2
TWD	USD	2.1	1.9	1.7	1.6	1.4	1.2	1.0	0.9	0.9	0.8	0.8	0.8	0.8
TWD	ZAR	5.4	4.9	4.4	4.0	3.7	3.0	2.7	2.4	2.3	2.2	2.1	2.1	2.0
UAH	USD	4.3	4.0	3.5	3.2	3.0	2.4	2.1	1.9	1.8	1.7	1.7	1.7	1.6
USD	VND	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
USD	XAU	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1
USD	ZAR	6.0	5.5	4.9	4.5	4.1	3.3	3.0	2.7	2.5	2.4	2.3	2.3	2.3

2025 Exploratory Market Shock Scenario
Rates DV01

	MATURITY												
Rates Shocks (bps)	**1M**	**3M**	**6M**	**9M**	**1Y**	**2Y**	**3Y**	**5Y**	**7Y**	**10Y**	**15Y**	**20Y**	**30Y**
AUD Directional Risks													
Governments	107.1	105.0	102.4	100.3	98.5	93.9	91.4	89.0	87.9	87.1	86.5	86.2	85.9
Agencies	107.1	105.0	102.4	100.3	98.5	93.9	91.4	89.0	87.9	87.1	86.5	86.2	85.9
Municipals	107.1	105.0	102.4	100.3	98.5	93.9	91.4	89.0	87.9	87.1	86.5	86.2	85.9
Swaps / Discounting Curve	102.1	100.1	97.6	95.6	93.8	89.4	87.1	85.0	84.2	83.5	83.1	82.9	82.7
Instruments shocked by MV**													
Other	102.1	100.1	97.6	95.6	93.8	89.4	87.1	85.0	84.2	83.5	83.1	82.9	82.7

AUD Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													

CAD Directional Risks													
Governments	83.5	82.7	81.7	80.7	79.9	77.1	75.1	72.5	71.0	69.7	68.7	68.2	67.7
Agencies	83.5	82.7	81.7	80.7	79.9	77.1	75.1	72.5	71.0	69.7	68.7	68.2	67.7
Municipals	83.5	82.7	81.7	80.7	79.9	77.1	75.1	72.5	71.0	69.7	68.7	68.2	67.7
Swaps / Discounting Curve	78.6	77.9	77.1	76.2	75.5	73.1	71.3	69.0	67.6	66.5	65.6	65.1	64.6
Instruments shocked by MV**													
Other	78.6	77.9	77.1	76.2	75.5	73.1	71.3	69.0	67.6	66.5	65.6	65.1	64.6

CAD Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													

CHF Directional Risks													
Governments	61.1	60.7	60.2	59.8	59.3	57.8	56.6	54.8	53.6	52.5	51.4	50.9	50.3
Agencies	61.1	60.7	60.2	59.8	59.3	57.8	56.6	54.8	53.6	52.5	51.4	50.9	50.3
Municipals	61.1	60.7	60.2	59.8	59.3	57.8	56.6	54.8	53.6	52.5	51.4	50.9	50.3
Swaps / Discounting Curve	56.2	56.0	55.7	55.4	55.1	54.0	53.0	51.5	50.4	49.3	48.3	47.8	47.2
Instruments shocked by MV**													
Other	56.2	56.0	55.7	55.4	55.1	54.0	53.0	51.5	50.4	49.3	48.3	47.8	47.2

CHF Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													

DKK Directional Risks													
Governments	102.1	101.6	100.9	100.2	99.6	97.4	95.6	93.0	91.3	89.6	88.1	87.3	86.4
Agencies	102.1	101.6	100.9	100.2	99.6	97.4	95.6	93.0	91.3	89.6	88.1	87.3	86.4
Municipals	102.1	101.6	100.9	100.2	99.6	97.4	95.6	93.0	91.3	89.6	88.1	87.3	86.4
Swaps / Discounting Curve	97.1	96.6	95.9	95.3	94.6	92.5	90.7	88.2	86.5	84.9	83.5	82.7	82.1
Instruments shocked by MV**													
Other	97.1	96.6	95.9	95.3	94.6	92.5	90.7	88.2	86.5	84.9	83.5	82.7	82.1

DKK Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													

EUR Directional Risks													
Governments: Austria	83.8	82.8	81.6	80.5	79.6	77.2	75.9	74.6	74.0	73.5	73.2	73.0	72.8
Governments: Belgium	80.3	79.8	79.1	78.4	77.8	75.8	74.4	72.5	71.4	70.4	69.6	69.2	68.8
Governments: Finland	86.9	86.3	85.5	84.8	84.2	82.5	81.5	80.5	80.0	79.7	79.4	79.2	79.1
Governments: France	83.1	82.6	81.8	81.1	80.5	78.3	76.7	74.5	73.2	72.0	71.0	70.5	70.0
Governments: Germany	106.3	105.7	104.9	104.2	103.5	101.3	99.6	97.4	96.1	94.9	93.9	93.4	92.9
Governments: Greece	373.6	362.8	347.9	334.4	322.3	283.6	256.8	223.8	205.4	190.0	177.6	171.4	165.1
Governments: Ireland	295.2	288.1	278.2	269.1	260.9	233.9	214.5	189.6	175.1	162.8	152.7	147.6	142.4
Governments: Italy	366.9	356.6	342.4	329.6	318.0	281.3	255.9	224.6	207.2	192.9	181.3	175.5	169.7
Governments: Netherlands	96.2	95.6	94.8	94.0	93.4	91.1	89.4	87.3	86.0	84.9	84.0	83.5	83.1
Governments: Portugal	301.5	294.7	285.2	276.5	268.5	242.4	223.5	199.2	185.0	172.8	162.8	157.7	152.6
Governments: Spain	301.5	294.7	285.2	276.5	268.5	242.4	223.5	199.2	185.0	172.8	162.8	157.7	152.6
Governments: Other	88.4	87.7	86.7	85.9	85.1	82.7	81.1	79.2	78.0	77.1	76.2	75.8	75.4
Agencies	88.4	87.7	86.7	85.9	85.1	82.7	81.1	79.2	78.0	77.1	76.2	75.8	75.4
Municipals	88.4	87.7	86.7	85.9	85.1	82.7	81.1	79.2	78.0	77.1	76.2	75.8	75.4
Swaps / Discounting Curve	99.3	98.8	98.1	97.5	96.9	95.0	93.6	91.9	90.9	90.2	89.8	89.6	89.5
Instruments shocked by MV**													
Other	99.3	98.8	98.1	97.5	96.9	95.0	93.6	91.9	90.9	90.2	89.8	89.6	89.5

EUR Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis	20.0	20.0	20.0	20.0	15.0	14.0	12.0	10.0	8.0	7.0	6.0	6.0	6.0
3m Basis	25.0	25.0	25.0	25.0	18.0	18.0	15.0	14.0	13.0	11.0	11.0	10.0	9.0
6m Basis	30.0	30.0	30.0	30.0	20.0	19.0	17.0	15.0	13.0	11.0	11.0	11.0	10.0
12m Basis	30.0	30.0	30.0	30.0	20.0	19.0	17.0	15.0	13.0	11.0	11.0	11.0	10.0
Other Basis	30.0	30.0	30.0	30.0	20.0	19.0	17.0	15.0	13.0	11.0	11.0	11.0	10.0

2025 Exploratory Market Shock Scenario
Rates DV01

Rates Shocks (bps)	MATURITY												
	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
GBP Directional Risks													
Governments	96.4	95.4	94.1	92.9	91.9	88.7	86.6	84.2	83.0	82.0	81.2	80.8	80.4
Agencies	96.4	95.4	94.1	92.9	91.9	88.7	86.6	84.2	83.0	82.0	81.2	80.8	80.4
Municipals	96.4	95.4	94.1	92.9	91.9	88.7	86.6	84.2	83.0	82.0	81.2	80.8	80.4
Swaps / Discounting Curve	94.4	93.5	92.3	91.2	90.3	87.5	85.6	83.6	82.5	81.7	81.1	80.7	80.4
Instruments shocked by MV**	[redacted]												
Other	94.4	93.5	92.3	91.2	90.3	87.5	85.6	83.6	82.5	81.7	81.1	80.7	80.4
GBP Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													
JPY Directional Risks													
Governments	20.1	19.9	19.7	19.4	19.2	18.5	17.9	17.0	16.4	15.8	15.2	14.9	14.6
Agencies	20.1	19.9	19.7	19.4	19.2	18.5	17.9	17.0	16.4	15.8	15.2	14.9	14.6
Municipals	20.1	19.9	19.7	19.4	19.2	18.5	17.9	17.0	16.4	15.8	15.2	14.9	14.6
Swaps / Discounting Curve	19.2	19.0	18.8	18.5	18.3	17.5	16.9	15.9	15.2	14.5	13.7	13.3	12.6
Instruments shocked by MV**	[redacted]												
Other	19.2	19.0	18.8	18.5	18.3	17.5	16.9	15.9	15.2	14.5	13.7	13.3	12.6
JPY Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
[redacted]													
Other Basis													
NOK Directional Risks													
Governments	85.6	84.5	83.0	81.8	80.7	77.8	76.2	74.7	73.9	73.4	72.9	72.7	72.5
Agencies	85.6	84.5	83.0	81.8	80.7	77.8	76.2	74.7	73.9	73.4	72.9	72.7	72.5
Municipals	85.6	84.5	83.0	81.8	80.7	77.8	76.2	74.7	73.9	73.4	72.9	72.7	72.5
Swaps / Discounting Curve	80.8	80.0	78.8	77.8	76.9	74.4	72.9	71.5	70.8	70.3	69.9	69.7	69.5
Instruments shocked by MV**	[redacted]												
Other	80.8	80.0	78.8	77.8	76.9	74.4	72.9	71.5	70.8	70.3	69.9	69.7	69.5
NOK Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													
NZD Directional Risks													
Governments	82.4	80.9	79.0	77.4	76.1	72.8	71.1	69.5	68.7	68.2	67.8	67.6	67.3
Agencies	82.4	80.9	79.0	77.4	76.1	72.8	71.1	69.5	68.7	68.2	67.8	67.6	67.3
Municipals	82.4	80.9	79.0	77.4	76.1	72.8	71.1	69.5	68.7	68.2	67.8	67.6	67.3
Swaps / Discounting Curve	77.6	76.3	74.7	73.4	72.2	69.3	67.7	66.3	65.6	65.1	64.7	64.5	64.3
Instruments shocked by MV**	[redacted]												
Other	77.6	76.3	74.7	73.4	72.2	69.3	67.7	66.3	65.6	65.1	64.7	64.5	64.3
NZD Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													
SEK Directional Risks													
Governments	90.4	89.4	87.9	86.6	85.5	82.1	79.8	77.3	75.9	74.9	74.0	73.6	73.2
Agencies	90.4	89.4	87.9	86.6	85.5	82.1	79.8	77.3	75.9	74.9	74.0	73.6	73.2
Municipals	90.4	89.4	87.9	86.6	85.5	82.1	79.8	77.3	75.9	74.9	74.0	73.6	73.2
Swaps / Discounting Curve	85.5	84.6	83.3	82.2	81.2	78.1	76.1	73.8	72.6	71.7	70.9	70.5	70.2
Instruments shocked by MV**	[redacted]												
Other	85.5	84.6	83.3	82.2	81.2	78.1	76.1	73.8	72.6	71.7	70.9	70.5	70.2
SEK Basis Risks (Do not include the swap/discounting curve specified above)													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													

2025 Exploratory Market Shock Scenario
Rates DV01

Rates Shocks (bps)	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	30Y
USD Directional Risks													
Governments	113.1	112.0	110.4	109.0	107.7	103.5	100.5	96.8	94.7	93.0	91.6	90.9	90.2
Agencies	113.1	112.0	110.4	109.0	107.7	103.5	100.5	96.8	94.7	93.0	91.6	90.9	90.2
Municipals	113.1	112.0	110.4	109.0	107.7	103.5	100.5	96.8	94.7	93.0	91.6	90.9	90.2
Swaps / Discounting Curve	103.3	102.3	100.9	99.7	98.6	95.2	92.9	90.3	89.1	88.4	88.1	88.1	88.2
Instruments shocked by MV**													
Other	103.3	102.3	100.9	99.7	98.6	95.2	92.9	90.3	89.1	88.4	88.1	88.1	88.2
USD Basis Risks (Do not include the swap/discounting curve specified above)													
Prime Basis													
CP Basis													
OIS Basis													
1m Basis													
3m Basis													
6m Basis													
12m Basis													
Other Basis													
Absolute increase in Muni SIFMA/Libor Ratio (Pts)	26.4	26.4	26.4	26.4	26.4	26.4	26.4	26.4	26.4	26.4	26.4	26.4	26.4
Other Advanced Economies Directional Risks													
Governments	113.1	112.0	110.4	109.0	107.7	103.5	100.5	96.8	94.7	93.0	91.6	90.9	90.2
Agencies	113.1	112.0	110.4	109.0	107.7	103.5	100.5	96.8	94.7	93.0	91.6	90.9	90.2
Municipals	113.1	112.0	110.4	109.0	107.7	103.5	100.5	96.8	94.7	93.0	91.6	90.9	90.2
Swaps / Discounting Curve	103.3	102.3	100.9	99.7	98.6	95.2	92.9	90.3	89.1	88.4	88.1	88.1	88.2
Instruments shocked by MV**													
Other	103.3	102.3	100.9	99.7	98.6	95.2	92.9	90.3	89.1	88.4	88.1	88.1	88.2
Directional Risks: Emerging Europe													
BGN	282.5	276.1	267.1	258.9	251.4	227.0	209.3	186.5	173.3	161.9	152.6	147.9	143.1
CZK	282.5	276.1	267.1	258.9	251.4	227.0	209.3	186.5	173.3	161.9	152.6	147.9	143.1
HRK	282.5	276.1	267.1	258.9	251.4	227.0	209.3	186.5	173.3	161.9	152.6	147.9	143.1
HUF	282.5	276.1	267.1	258.9	251.4	227.0	209.3	186.5	173.3	161.9	152.6	147.9	143.1
PLN	197.5	195.0	191.4	188.1	185.0	174.3	166.1	154.4	147.0	140.1	134.0	130.9	127.7
RON	282.5	276.1	267.1	258.9	251.4	227.0	209.3	186.5	173.3	161.9	152.6	147.9	143.1
RUB	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
Other Emerging Europe	282.5	276.1	267.1	258.9	251.4	227.0	209.3	186.5	173.3	161.9	152.6	147.9	143.1
Directional Risks: Latin America & Caribbean													
ARS	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
BRL	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
CLP	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
COP	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
MXN	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
PEN	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
VEF	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
Other Latam & Caribbean	472.8	465.0	455.1	447.0	440.3	422.8	413.7	405.0	401.1	398.1	395.8	394.7	393.5
Directional Risks: Asia Ex-Japan													
CNY	39.7	38.9	37.8	36.9	36.0	33.0	30.9	28.2	26.6	25.2	24.1	23.5	22.9
HKD	88.9	87.5	85.5	83.9	82.4	78.3	75.9	73.4	72.1	71.2	70.4	70.1	69.7
IDR	69.7	68.6	67.1	65.9	64.8	61.7	59.7	57.6	56.5	55.7	54.9	54.6	54.2
INR	69.7	68.6	67.1	65.9	64.8	61.7	59.7	57.6	56.5	55.7	54.9	54.6	54.2
KRW	44.7	44.3	43.8	43.3	42.8	41.3	40.3	38.8	37.9	37.2	36.6	36.3	35.9
MYR	69.7	68.6	67.1	65.9	64.8	61.7	59.7	57.6	56.5	55.7	54.9	54.6	54.2
PHP	69.7	68.6	67.1	65.9	64.8	61.7	59.7	57.6	56.5	55.7	54.9	54.6	54.2
SGD	66.5	65.9	65.0	64.1	63.4	61.0	59.3	57.1	55.9	54.9	54.1	53.7	53.3
THB	58.4	57.5	56.2	55.1	54.1	51.3	49.5	47.5	46.5	45.7	45.1	44.8	44.5
TWD	88.9	87.5	85.5	83.9	82.4	78.3	75.9	73.4	72.1	71.2	70.4	70.1	69.7
Other Asia Ex-Japan	69.7	68.6	67.1	65.9	64.8	61.7	59.7	57.6	56.5	55.7	54.9	54.6	54.2
Directional Risks: Middle East/North Africa													
ILS	57.8	57.0	56.0	55.1	54.3	52.0	50.6	49.0	48.2	47.6	47.1	46.9	46.6
TRY	179.3	179.3	179.4	179.4	179.5	179.7	179.9	180.3	180.6	181.0	181.5	181.9	182.4
Other Middle East/Africa	179.3	179.3	179.4	179.4	179.5	179.7	179.9	180.3	180.6	181.0	181.5	181.9	182.4
Directional Risks: Sub-Saharan Africa													
ZAR	179.3	179.3	179.4	179.4	179.5	179.7	179.9	180.3	180.6	181.0	181.5	181.9	182.4
Other Sub-Saharan Africa	179.3	179.3	179.4	179.4	179.5	179.7	179.9	180.3	180.6	181.0	181.5	181.9	182.4

2025 Exploratory Market Shock Scenario

Rates Vega

Relative Normal Interest Rate Shocks (%)

AUD

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	101.9%	99.8%	96.8%	94.3%	91.9%	83.3%	78.0%	74.8%	72.2%	71.1%	71.2%	71.4%	71.5%	71.6%
3M	103.2%	100.9%	97.6%	94.8%	92.4%	84.3%	79.2%	76.1%	73.9%	74.0%	74.1%	74.3%	74.4%	74.5%
6M	95.5%	93.2%	90.1%	87.2%	84.7%	77.8%	73.1%	69.0%	67.5%	68.2%	68.3%	68.4%	68.5%	68.6%
9M	89.8%	87.4%	84.2%	81.3%	78.7%	71.5%	66.9%	62.6%	61.4%	62.0%	62.1%	62.2%	62.4%	62.4%
1Y	84.3%	82.0%	78.6%	75.8%	73.3%	65.5%	61.3%	57.0%	56.0%	56.4%	56.6%	56.8%	56.9%	57.0%
2Y	68.3%	65.9%	62.6%	59.6%	57.1%	50.0%	45.7%	40.9%	40.0%	40.2%	40.3%	40.5%	40.6%	40.7%
3Y	60.9%	58.4%	54.9%	51.9%	49.3%	41.7%	36.5%	32.3%	31.0%	31.2%	31.3%	31.5%	31.6%	31.8%
5Y	52.2%	49.7%	46.3%	43.3%	40.6%	33.2%	28.6%	24.4%	23.0%	23.1%	23.2%	23.3%	23.4%	23.6%
7Y	52.5%	49.8%	46.0%	42.8%	39.9%	31.4%	26.4%	21.6%	20.1%	20.1%	20.1%	20.3%	20.5%	20.6%
10Y	53.9%	50.9%	46.8%	43.4%	40.2%	30.9%	25.4%	20.2%	18.5%	18.2%	18.4%	18.7%	18.8%	18.9%
15Y	51.6%	48.7%	44.6%	41.0%	38.0%	28.6%	23.1%	17.8%	16.2%	15.8%	16.0%	16.3%	16.4%	16.5%
20Y	50.4%	47.5%	43.5%	40.0%	36.8%	27.4%	21.9%	16.7%	15.1%	14.7%	14.8%	15.0%	15.1%	15.3%
30Y	49.4%	46.4%	42.3%	38.8%	35.6%	26.4%	20.9%	15.5%	13.8%	13.4%	13.6%	13.9%	14.0%	14.1%

EUR

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	77.6%	76.8%	75.8%	75.0%	74.1%	62.2%	60.9%	64.1%	66.2%	70.8%	73.8%	76.5%	79.4%	81.2%
3M	79.6%	78.9%	77.8%	76.9%	75.9%	65.8%	63.9%	65.4%	66.4%	69.9%	72.5%	74.8%	77.2%	78.4%
6M	70.1%	69.4%	68.4%	67.5%	66.6%	59.6%	58.4%	59.5%	60.0%	62.4%	64.8%	67.0%	69.5%	70.6%
9M	63.6%	62.8%	61.8%	60.9%	60.1%	55.0%	54.1%	54.9%	55.6%	57.5%	59.9%	62.4%	64.6%	65.6%
1Y	58.4%	57.8%	56.9%	56.0%	55.1%	51.1%	50.4%	50.8%	51.4%	53.0%	55.4%	57.9%	60.0%	60.8%
2Y	46.0%	45.4%	44.4%	43.5%	42.7%	39.8%	38.9%	38.3%	38.2%	39.2%	41.4%	43.4%	45.2%	46.0%
3Y	38.4%	37.8%	36.8%	35.8%	35.1%	32.4%	31.3%	30.3%	30.0%	30.7%	32.7%	34.6%	36.3%	37.0%
5Y	30.5%	29.8%	28.8%	27.9%	27.2%	24.5%	23.0%	21.4%	20.9%	21.3%	23.4%	25.2%	26.7%	27.6%
7Y	26.9%	26.2%	25.1%	24.2%	23.3%	20.7%	19.1%	17.2%	16.7%	16.9%	18.9%	20.9%	22.4%	23.4%
10Y	24.2%	23.5%	22.5%	21.6%	20.6%	17.8%	16.2%	14.3%	13.8%	14.0%	16.2%	18.1%	19.6%	20.6%
15Y	23.0%	22.3%	21.2%	20.2%	19.3%	16.3%	14.7%	12.7%	12.1%	12.4%	14.7%	16.8%	18.4%	19.4%
20Y	22.9%	22.2%	21.1%	20.1%	19.1%	16.0%	14.2%	12.2%	11.5%	12.0%	14.5%	16.4%	18.4%	19.6%
30Y	23.6%	22.8%	21.6%	20.5%	19.4%	16.0%	14.2%	12.2%	11.7%	12.2%	14.9%	17.3%	19.2%	20.5%

GBP

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	90.9%	89.9%	88.3%	86.9%	85.6%	68.9%	72.4%	91.2%	85.9%	82.6%	83.5%	86.1%	88.1%	90.4%
3M	87.3%	86.3%	84.8%	83.3%	82.0%	65.8%	69.6%	86.7%	81.4%	78.2%	78.6%	81.4%	83.3%	85.3%
6M	82.2%	81.1%	79.6%	78.2%	76.9%	65.0%	66.6%	76.0%	72.4%	71.2%	71.9%	73.8%	75.9%	77.4%
9M	78.1%	77.0%	75.5%	74.0%	72.7%	64.7%	64.2%	67.8%	65.1%	65.1%	65.4%	67.4%	68.9%	70.6%
1Y	74.9%	73.8%	72.2%	70.8%	69.5%	64.2%	62.4%	61.1%	59.0%	59.8%	59.7%	61.7%	63.0%	64.5%
2Y	61.8%	60.7%	59.2%	57.8%	56.5%	52.3%	49.9%	48.5%	46.2%	45.6%	44.7%	45.4%	46.3%	47.4%
3Y	55.6%	54.5%	52.9%	51.4%	50.0%	45.7%	43.1%	40.0%	37.2%	35.7%	34.6%	34.8%	35.6%	36.4%
5Y	48.8%	47.6%	45.9%	44.4%	42.9%	38.1%	34.6%	29.9%	26.9%	24.8%	23.4%	23.4%	23.8%	24.3%
7Y	47.1%	45.8%	44.0%	42.3%	40.7%	35.1%	31.1%	25.7%	22.4%	19.8%	18.3%	18.1%	18.5%	18.9%
10Y	44.9%	43.6%	41.7%	39.8%	38.1%	32.7%	28.5%	22.9%	19.0%	16.0%	14.6%	14.7%	15.2%	15.9%
15Y	47.7%	46.2%	44.0%	41.9%	39.9%	33.5%	27.4%	19.3%	15.4%	12.3%	10.7%	10.6%	11.1%	11.6%
20Y	50.3%	48.6%	46.2%	43.9%	41.7%	34.8%	27.6%	18.2%	14.2%	10.9%	9.1%	8.9%	9.2%	9.8%
30Y	52.8%	51.0%	48.3%	45.8%	43.5%	35.9%	27.7%	17.3%	13.0%	9.5%	7.6%	7.4%	7.6%	7.9%

JPY

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	186.9%	183.8%	179.2%	175.0%	171.1%	126.5%	110.1%	82.4%	75.3%	69.2%	65.8%	64.0%	62.8%	62.0%
3M	141.5%	139.0%	135.4%	132.1%	129.0%	109.2%	98.8%	79.4%	72.3%	66.2%	62.8%	60.9%	60.0%	59.5%
6M	120.9%	118.4%	115.1%	112.4%	109.3%	93.2%	84.6%	70.8%	65.2%	59.5%	57.9%	55.0%	54.5%	54.3%
9M	108.1%	106.0%	102.9%	100.0%	97.4%	84.7%	77.5%	65.8%	60.5%	55.1%	52.9%	51.4%	50.4%	49.8%
1Y	98.1%	96.1%	93.1%	90.4%	87.9%	77.9%	71.4%	61.4%	56.5%	51.2%	48.7%	47.2%	46.3%	45.8%
2Y	80.8%	78.6%	75.8%	73.4%	70.8%	62.9%	56.5%	47.8%	43.8%	38.9%	36.5%	34.9%	34.0%	33.2%
3Y	73.0%	71.1%	68.3%	65.7%	63.3%	55.2%	49.0%	40.2%	35.9%	31.9%	28.8%	27.2%	26.2%	25.8%
5Y	63.8%	61.9%	59.2%	56.6%	54.3%	46.5%	40.7%	32.8%	28.4%	24.6%	21.5%	20.1%	19.1%	18.4%
7Y	61.0%	59.1%	56.3%	53.8%	51.5%	43.8%	38.0%	30.0%	25.5%	21.4%	18.2%	16.7%	15.8%	15.1%
10Y	58.3%	56.4%	53.7%	51.1%	48.8%	41.6%	36.0%	27.8%	23.2%	19.0%	15.8%	14.1%	13.1%	12.7%
15Y	58.0%	56.1%	53.3%	50.7%	48.3%	40.4%	34.4%	26.0%	21.4%	17.3%	14.2%	12.6%	11.6%	11.1%
20Y	59.4%	57.4%	54.4%	51.7%	49.3%	40.7%	34.4%	25.9%	20.9%	16.6%	13.4%	11.8%	11.0%	10.3%
30Y	58.7%	56.7%	53.8%	51.0%	48.6%	39.3%	32.9%	24.7%	20.0%	15.5%	11.0%	9.7%	8.8%	8.1%

USD

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	61.7%	60.7%	59.3%	57.9%	56.7%	45.8%	44.1%	42.2%	42.1%	42.6%	43.6%	44.4%	44.9%	45.3%
3M	59.3%	58.3%	56.9%	55.5%	54.4%	47.9%	46.2%	44.1%	44.3%	44.8%	45.8%	47.3%	48.0%	48.6%
6M	54.0%	53.1%	51.7%	50.4%	49.3%	46.1%	44.8%	42.9%	42.6%	42.7%	43.8%	45.4%	46.2%	46.7%
9M	51.9%	50.9%	49.6%	48.4%	47.2%	44.3%	42.9%	40.9%	40.4%	40.5%	41.7%	43.2%	44.1%	44.6%
1Y	50.0%	49.1%	47.7%	46.4%	45.3%	42.5%	41.1%	39.0%	38.5%	38.5%	39.7%	41.2%	42.0%	42.4%
2Y	45.7%	44.7%	43.2%	42.0%	40.7%	37.7%	35.3%	32.9%	31.8%	31.5%	32.5%	33.7%	34.4%	34.8%
3Y	42.7%	41.6%	40.1%	38.8%	37.4%	33.9%	31.3%	28.4%	27.0%	26.4%	27.2%	28.1%	28.8%	29.2%
5Y	37.9%	36.8%	35.3%	33.8%	32.5%	28.7%	25.9%	22.4%	20.8%	20.0%	20.6%	21.4%	21.9%	22.1%
7Y	35.6%	34.4%	32.9%	31.3%	30.0%	25.9%	22.9%	19.2%	17.5%	16.7%	17.2%	17.7%	18.2%	18.5%
10Y	34.6%	33.4%	31.6%	30.0%	28.6%	24.3%	21.2%	17.3%	15.5%	14.6%	15.0%	15.6%	16.0%	16.2%
15Y	36.1%	34.8%	32.9%	31.2%	29.5%	24.7%	21.2%	17.1%	14.9%	13.9%	14.2%	14.7%	15.1%	15.4%
20Y	38.7%	37.2%	35.1%	33.2%	31.4%	26.1%	22.3%	17.7%	15.5%	14.4%	14.4%	14.9%	15.3%	15.4%
30Y	40.6%	39.0%	36.8%	34.7%	32.8%	26.5%	22.4%	17.6%	15.4%	14.6%	14.4%	14.7%	15.1%	15.2%

US MBS Vega [redacted]

Other Advanced Economies

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	68.0%	67.1%	65.9%	64.6%	63.6%	58.6%	55.2%	52.2%	49.6%	47.9%	47.3%	47.3%	47.3%	47.4%
3M	70.2%	69.2%	67.9%	66.6%	65.4%	61.0%	57.6%	54.6%	52.2%	51.1%	50.5%	50.5%	50.6%	50.6%
6M	66.7%	65.7%	64.4%	63.1%	61.9%	58.4%	55.3%	51.6%	49.6%	49.0%	48.3%	48.3%	48.3%	48.4%
9M	64.1%	63.1%	61.7%	60.4%	59.2%	55.4%	52.4%	48.7%	46.8%	46.1%	45.4%	45.4%	45.5%	45.5%
1Y	61.4%	60.4%	58.9%	57.6%	56.4%	52.3%	49.5%	45.8%	44.2%	43.4%	42.8%	42.7%	42.8%	42.9%
2Y	52.0%	51.1%	49.6%	48.2%	47.0%	43.4%	40.8%	36.6%	35.1%	34.1%	33.4%	33.4%	33.4%	33.5%
3Y	46.9%	45.9%	44.4%	43.1%	41.7%	37.9%	34.3%	30.7%	28.8%	27.9%	27.2%	27.2%	27.2%	27.3%
5Y	39.3%	38.2%	36.7%	35.4%	34.1%	30.5%	27.5%	23.9%	21.9%	20.8%	20.0%	20.0%	20.1%	20.2%
7Y	38.3%	37.2%	35.6%	34.2%	32.7%	28.4%	25.2%	20.9%	18.8%	17.5%	16.7%	16.7%	16.8%	16.8%
10Y	38.2%	36.9%	35.2%	33.6%	32.2%	27.2%	23.7%	19.1%	16.7%	15.3%	14.3%	14.3%	14.4%	14.6%
15Y	35.7%	34.5%	32.8%	31.2%	29.8%	24.8%	21.3%	16.7%	14.2%	12.6%	11.7%	11.7%	11.9%	12.0%

2025 Exploratory Market Shock Scenario

Rates Vega

Relative Normal Interest Rate Shocks (%)

	MATURITY													
	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
20Y	34.7%	33.5%	31.8%	30.0%	28.6%	23.6%	20.0%	15.5%	13.1%	11.5%	10.6%	10.5%	10.6%	10.7%
30Y	33.6%	32.3%	30.6%	29.0%	27.5%	22.5%	19.0%	14.4%	11.9%	10.2%	9.3%	9.3%	9.5%	9.6%

Total Emerging Europe

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	118.3%	116.5%	113.8%	111.4%	109.2%	107.0%	102.6%	95.9%	91.5%	87.5%	85.1%	84.5%	84.3%	84.3%
3M	116.2%	114.3%	111.6%	109.1%	106.9%	102.5%	97.4%	90.3%	85.9%	82.0%	79.7%	79.1%	79.1%	79.0%
6M	114.3%	112.3%	109.4%	106.8%	104.4%	96.6%	90.6%	83.0%	78.3%	74.5%	72.4%	72.0%	71.8%	71.8%
9M	107.9%	105.9%	103.0%	100.3%	97.9%	89.6%	83.5%	75.8%	71.3%	67.7%	65.9%	65.4%	65.4%	65.5%
1Y	102.4%	100.2%	97.3%	94.7%	92.3%	83.4%	77.2%	69.6%	65.1%	61.7%	60.2%	59.8%	59.8%	59.8%
2Y	81.6%	79.5%	76.8%	74.2%	71.8%	63.7%	57.8%	50.7%	46.7%	44.3%	43.3%	43.2%	43.2%	43.3%
3Y	69.3%	67.3%	64.5%	62.0%	59.7%	51.8%	46.3%	39.3%	35.8%	33.8%	33.0%	33.1%	33.3%	33.4%
5Y	56.0%	54.2%	51.5%	49.0%	46.8%	39.0%	33.6%	27.5%	24.7%	23.1%	22.7%	22.8%	23.1%	23.2%
7Y	48.4%	46.6%	44.1%	41.8%	39.7%	32.6%	27.9%	22.4%	19.9%	18.5%	18.2%	18.3%	18.5%	18.7%
10Y	44.5%	42.6%	40.1%	37.9%	35.8%	29.2%	24.7%	19.4%	16.8%	15.4%	15.2%	15.4%	15.5%	15.7%
15Y	43.2%	41.4%	38.9%	36.5%	34.4%	27.7%	23.0%	17.6%	14.9%	13.5%	13.2%	13.4%	13.5%	13.7%
20Y	43.2%	41.2%	38.6%	36.3%	34.2%	27.1%	22.4%	16.8%	14.1%	12.6%	12.3%	12.5%	12.6%	12.8%
30Y	43.9%	42.0%	39.3%	36.8%	34.5%	27.2%	22.2%	16.3%	13.6%	12.0%	11.6%	11.8%	11.9%	12.1%

Total Latam & Caribbean

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	145.7%	143.3%	140.1%	137.2%	134.5%	131.4%	134.7%	147.2%	138.6%	130.4%	129.1%	130.2%	131.5%	132.5%
3M	137.0%	134.7%	131.5%	128.6%	125.9%	121.5%	123.9%	135.3%	127.6%	120.7%	120.0%	121.0%	121.9%	122.5%
6M	131.0%	128.6%	125.4%	122.4%	119.7%	113.8%	114.8%	123.6%	116.4%	110.0%	109.5%	110.5%	111.3%	111.8%
9M	126.1%	123.7%	120.3%	117.2%	114.4%	109.4%	107.9%	111.5%	105.6%	100.9%	100.4%	101.3%	102.1%	102.5%
1Y	121.3%	118.8%	115.4%	112.3%	109.4%	105.2%	101.4%	100.9%	96.1%	92.8%	92.3%	93.2%	93.9%	94.4%
2Y	99.1%	96.6%	93.2%	90.1%	87.2%	81.2%	76.9%	73.8%	70.4%	68.8%	68.5%	69.3%	69.9%	70.3%
3Y	85.3%	82.8%	79.4%	76.3%	73.5%	67.3%	62.5%	57.7%	55.0%	54.3%	54.2%	54.8%	55.4%	55.7%
5Y	74.6%	72.1%	68.5%	65.3%	62.3%	54.5%	48.3%	41.5%	39.3%	39.9%	39.7%	40.3%	40.7%	41.0%
7Y	68.9%	66.4%	62.8%	59.5%	56.5%	48.4%	42.2%	34.6%	32.2%	32.5%	32.2%	32.7%	33.0%	33.3%
10Y	64.0%	61.4%	57.8%	54.6%	51.6%	43.3%	37.0%	29.8%	27.5%	27.4%	27.1%	27.5%	27.8%	28.0%
15Y	66.0%	63.2%	59.4%	55.9%	52.6%	43.4%	36.5%	28.5%	25.5%	24.9%	24.2%	24.4%	24.7%	24.8%
20Y	67.4%	64.5%	60.4%	56.7%	53.3%	43.5%	36.2%	27.7%	24.3%	23.3%	22.5%	22.6%	22.9%	23.0%
30Y	65.8%	62.8%	58.8%	55.1%	51.7%	41.7%	34.3%	25.8%	22.3%	21.1%	20.3%	20.5%	20.7%	20.8%

Total Asia Ex-Japan

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	74.7%	73.5%	71.9%	70.3%	68.9%	69.4%	62.3%	59.2%	59.6%	60.7%	59.5%	60.2%	60.6%	60.9%
3M	72.6%	71.4%	69.7%	68.1%	66.7%	66.2%	59.1%	55.8%	56.0%	56.9%	55.8%	56.4%	56.8%	57.1%
6M	72.2%	70.9%	69.1%	67.5%	65.9%	63.8%	54.0%	51.2%	51.3%	52.1%	50.5%	51.0%	51.4%	51.6%
9M	69.9%	68.6%	66.7%	65.0%	63.4%	59.3%	52.5%	49.0%	48.6%	48.7%	46.8%	47.3%	47.6%	47.9%
1Y	67.5%	66.2%	64.2%	62.5%	60.9%	55.1%	51.2%	47.0%	46.4%	45.8%	43.6%	44.1%	44.4%	44.6%
2Y	62.9%	61.2%	59.1%	57.1%	55.3%	48.8%	44.2%	37.9%	39.7%	39.8%	37.0%	37.4%	37.7%	37.9%
3Y	58.3%	56.6%	54.2%	52.2%	50.2%	43.1%	39.3%	35.9%	34.3%	33.8%	31.0%	31.4%	31.6%	31.7%
5Y	56.6%	54.6%	51.9%	49.5%	47.3%	41.5%	36.0%	29.8%	27.9%	26.3%	23.7%	24.0%	24.3%	24.5%
7Y	57.6%	55.4%	52.4%	49.7%	47.2%	39.8%	34.1%	27.1%	24.6%	22.7%	20.1%	20.3%	20.5%	20.7%
10Y	54.3%	52.2%	49.2%	46.3%	43.7%	36.8%	31.2%	24.0%	21.1%	19.3%	17.3%	17.5%	17.7%	17.9%
15Y	56.1%	53.6%	50.4%	47.4%	44.6%	36.8%	30.8%	22.9%	19.5%	17.2%	15.3%	15.4%	15.6%	15.7%
20Y	55.3%	52.9%	49.6%	46.6%	43.8%	35.8%	29.7%	21.7%	18.2%	16.0%	14.2%	14.4%	14.5%	14.5%
30Y	55.3%	52.9%	49.5%	46.4%	43.5%	35.1%	28.9%	20.7%	17.0%	14.9%	13.3%	13.4%	13.6%	13.6%

Total ME/N. Africa

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	76.2%	75.0%	73.4%	71.8%	70.4%	68.9%	66.1%	61.7%	58.9%	56.4%	54.9%	54.5%	54.3%	54.3%
3M	74.9%	73.7%	72.0%	70.3%	68.9%	66.0%	62.8%	58.2%	55.3%	52.8%	51.4%	51.1%	50.9%	50.9%
6M	73.7%	72.4%	70.5%	68.8%	67.3%	62.2%	58.3%	53.5%	50.5%	48.0%	46.7%	46.3%	46.3%	46.3%
9M	69.5%	68.2%	66.4%	64.6%	63.2%	57.7%	53.9%	48.9%	45.9%	43.6%	42.5%	42.2%	42.1%	42.2%
1Y	65.9%	64.6%	62.8%	61.0%	59.5%	53.7%	49.8%	44.8%	41.9%	39.8%	38.8%	38.6%	38.5%	38.5%
2Y	52.6%	51.3%	49.4%	47.7%	46.2%	41.0%	37.2%	32.7%	30.1%	28.5%	27.9%	27.8%	27.8%	27.9%
3Y	44.7%	43.4%	41.6%	39.9%	38.4%	33.4%	29.7%	25.3%	23.1%	21.8%	21.4%	21.3%	21.4%	21.5%
5Y	36.1%	34.9%	33.1%	31.6%	30.1%	25.2%	21.7%	17.8%	15.9%	14.9%	14.7%	14.7%	14.8%	15.0%
7Y	31.2%	30.0%	28.4%	26.9%	25.5%	21.0%	17.9%	14.4%	12.8%	11.9%	11.7%	11.8%	11.9%	12.1%
10Y	28.6%	27.4%	25.9%	24.4%	23.1%	18.9%	15.9%	12.4%	10.9%	10.0%	9.8%	9.9%	10.0%	10.1%
15Y	27.9%	26.7%	25.1%	23.6%	22.2%	17.8%	14.9%	11.3%	9.6%	8.7%	8.5%	8.6%	8.7%	8.8%
20Y	27.8%	26.6%	24.9%	23.4%	22.0%	17.5%	14.5%	10.8%	9.1%	8.1%	7.9%	8.1%	8.1%	8.2%
30Y	28.3%	27.0%	25.3%	23.7%	22.2%	17.5%	14.3%	10.5%	8.7%	7.7%	7.5%	7.6%	7.8%	7.8%

Total Sub-Saharan Africa

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	208.8%	205.5%	200.9%	196.7%	192.8%	155.2%	142.2%	117.9%	111.0%	106.1%	105.6%	105.7%	105.9%	106.1%
3M	189.1%	185.8%	181.5%	177.5%	173.8%	139.3%	126.0%	101.8%	95.7%	91.4%	90.9%	91.1%	91.2%	91.3%
6M	161.7%	158.8%	154.8%	151.2%	147.7%	120.5%	108.6%	90.4%	83.9%	79.2%	78.8%	78.9%	79.1%	79.2%
9M	137.2%	134.5%	130.9%	127.6%	124.5%	107.9%	96.6%	81.1%	75.1%	71.6%	71.2%	71.3%	71.4%	71.6%
1Y	120.4%	118.0%	114.6%	111.5%	108.6%	97.5%	87.0%	73.4%	67.9%	65.0%	64.6%	64.7%	64.8%	65.0%
2Y	83.2%	81.2%	78.3%	75.6%	73.3%	64.9%	58.7%	51.2%	47.4%	45.3%	44.8%	45.0%	45.1%	45.2%
3Y	67.0%	65.1%	62.5%	60.0%	57.7%	50.1%	44.9%	38.8%	35.7%	33.9%	33.5%	33.6%	33.7%	33.9%
5Y	50.2%	48.5%	46.1%	44.0%	41.9%	35.5%	31.4%	26.4%	24.0%	22.6%	22.2%	22.2%	22.4%	22.5%
7Y	46.0%	44.3%	41.9%	39.7%	37.7%	31.3%	27.0%	22.1%	19.9%	19.1%	18.7%	18.8%	19.0%	19.0%
10Y	46.0%	44.2%	41.6%	39.3%	37.2%	30.4%	25.1%	19.0%	16.4%	15.1%	14.7%	14.9%	15.0%	15.1%
15Y	43.6%	41.8%	39.3%	36.9%	34.8%	28.0%	22.8%	16.8%	14.2%	12.8%	12.5%	12.6%	12.7%	12.8%
20Y	42.5%	40.7%	38.1%	35.7%	33.6%	26.8%	21.6%	15.7%	13.1%	11.8%	11.4%	11.5%	11.6%	11.7%
30Y	41.4%	39.5%	36.9%	34.6%	32.5%	25.6%	20.5%	14.6%	12.0%	10.7%	10.3%	10.4%	10.6%	10.6%

2025 Exploratory Market Shock Scenario

Rates Vega

Absolute Normal Interest Rate Shocks (bps)

AUD

EXPIRY	MATURITY 1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	105.2	103.0	99.9	97.3	94.9	87.8	83.5	79.4	77.9	77.4	77.5	77.7	77.8	77.9
3M	99.1	96.9	93.8	91.1	88.8	81.7	77.4	73.3	71.8	71.3	71.4	71.6	71.7	71.8
6M	91.1	88.9	85.9	83.2	80.8	73.7	69.4	65.3	63.8	63.4	63.5	63.6	63.7	63.8
9M	84.4	82.1	79.1	76.4	74.0	67.0	62.7	58.5	57.1	56.6	56.7	56.8	57.0	57.0
1Y	78.6	76.4	73.3	70.6	68.3	61.2	56.9	52.8	51.3	50.8	50.9	51.1	51.2	51.3
2Y	62.9	60.7	57.6	54.9	52.6	45.5	41.2	37.0	35.6	35.1	35.2	35.4	35.5	35.6
3Y	54.3	52.1	49.0	46.3	44.0	36.9	32.6	28.4	27.0	26.5	26.6	26.8	26.9	27.0
5Y	46.3	44.1	41.1	38.4	36.0	28.9	24.6	20.5	19.0	18.6	18.7	18.8	18.9	19.0
7Y	43.0	40.8	37.7	35.1	32.7	25.6	21.3	17.2	15.7	15.3	15.3	15.5	15.6	15.7
10Y	40.7	38.5	35.4	32.8	30.4	23.3	19.0	14.9	13.4	12.9	13.0	13.2	13.3	13.4
15Y	39.0	36.8	33.7	31.0	28.7	21.6	17.3	13.1	11.7	11.2	11.3	11.5	11.6	11.7
20Y	38.1	35.9	32.9	30.2	27.8	20.7	16.4	12.3	10.9	10.4	10.5	10.6	10.7	10.8
30Y	37.3	35.1	32.0	29.3	26.9	19.9	15.6	11.4	10.0	9.5	9.6	9.8	9.9	10.0

EUR

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	61.5	60.9	60.1	59.4	58.7	56.6	55.0	53.3	52.7	52.7	53.6	54.6	55.3	55.9
3M	58.5	58.0	57.2	56.5	55.8	53.6	52.1	50.4	49.8	49.8	50.7	51.7	52.4	52.9
6M	54.5	54.0	53.2	52.5	51.8	49.6	48.1	46.4	45.7	45.8	46.7	47.6	48.4	48.9
9M	51.0	50.4	49.6	48.9	48.2	46.0	44.5	42.8	42.2	42.2	43.1	44.1	44.8	45.3
1Y	47.7	47.2	46.4	45.7	45.0	42.8	41.3	39.6	39.0	39.0	39.9	40.9	41.6	42.1
2Y	37.9	37.4	36.6	35.9	35.2	33.0	31.5	29.8	29.1	29.2	30.1	31.0	31.8	32.3
3Y	31.5	31.0	30.2	29.4	28.8	26.6	25.1	23.4	22.7	22.8	23.7	24.6	25.4	25.9
5Y	24.4	23.8	23.0	22.3	21.7	19.5	17.9	16.2	15.6	15.7	16.6	17.5	18.2	18.8
7Y	21.0	20.4	19.6	18.9	18.2	16.1	14.5	12.8	12.2	12.2	13.1	14.1	14.8	15.4
10Y	18.5	18.0	17.2	16.5	15.8	13.6	12.1	10.4	9.8	9.8	10.7	11.7	12.4	12.9
15Y	16.8	16.3	15.5	14.8	14.1	11.9	10.4	8.7	8.1	8.1	9.0	10.0	10.7	11.2
20Y	16.0	15.5	14.7	14.0	13.3	11.1	9.6	7.9	7.2	7.3	8.2	9.1	9.9	10.4
30Y	15.2	14.7	13.9	13.2	12.5	10.3	8.8	7.1	6.5	6.5	7.4	8.4	9.1	9.6

GBP

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	102.0	100.9	99.1	97.5	96.0	90.9	86.9	81.3	78.0	75.2	73.5	72.9	72.7	72.7
3M	98.0	96.8	95.1	93.5	92.0	86.9	82.8	77.3	73.9	71.2	69.4	68.9	68.7	68.6
6M	92.5	91.3	89.6	88.0	86.5	81.3	77.3	71.8	68.4	65.7	63.9	63.3	63.2	63.1
9M	87.5	86.3	84.6	83.0	81.5	76.3	72.3	66.8	63.4	60.7	58.9	58.4	58.2	58.1
1Y	83.0	81.8	80.1	78.5	77.0	71.9	67.8	62.3	58.9	56.2	54.4	53.9	53.7	53.6
2Y	69.1	67.9	66.2	64.6	63.1	58.0	54.0	48.4	45.1	42.3	40.5	40.0	39.8	39.7
3Y	59.9	58.7	57.0	55.4	53.9	48.7	44.7	39.2	35.8	33.1	31.3	30.7	30.6	30.5
5Y	49.2	48.0	46.3	44.7	43.2	38.0	34.0	28.5	25.1	22.4	20.6	20.1	19.9	19.8
7Y	43.8	42.6	40.9	39.3	37.8	32.6	28.6	23.1	19.7	17.0	15.2	14.6	14.5	14.4
10Y	39.7	38.5	36.8	35.2	33.7	28.6	24.5	19.0	15.6	12.9	11.1	10.6	10.4	10.3
15Y	36.7	35.5	33.8	32.2	30.7	25.5	21.5	16.0	12.6	9.9	8.1	7.6	7.4	7.3
20Y	35.2	34.0	32.3	30.7	29.2	24.1	20.1	14.5	11.2	8.4	6.6	6.1	5.9	5.9
30Y	33.8	32.6	30.9	29.3	27.8	22.6	18.6	13.1	9.7	7.0	5.2	4.7	4.5	4.4

JPY

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	48.7	47.9	46.7	45.6	44.6	41.2	38.7	35.3	33.2	31.5	30.1	29.4	29.0	28.8
3M	46.6	45.8	44.6	43.5	42.5	39.1	36.6	33.2	31.1	29.4	28.0	27.3	26.9	26.7
6M	43.9	43.0	41.8	40.8	39.7	36.4	33.8	30.4	28.4	26.6	25.3	24.6	24.2	23.9
9M	41.5	40.7	39.5	38.4	37.4	34.0	31.5	28.1	26.0	24.3	22.9	22.2	21.8	21.6
1Y	39.5	38.7	37.5	36.4	35.4	32.0	29.5	26.1	24.0	22.3	20.9	20.2	19.8	19.6
2Y	34.0	33.1	31.9	30.9	29.8	26.5	23.9	20.5	18.5	16.7	15.4	14.7	14.3	14.0
3Y	30.8	30.0	28.8	27.7	26.7	23.3	20.8	17.4	15.3	13.6	12.2	11.5	11.1	10.9
5Y	27.7	26.9	25.7	24.6	23.6	20.2	17.7	14.3	12.3	10.5	9.1	8.5	8.1	7.8
7Y	26.3	25.5	24.3	23.2	22.2	18.8	16.3	12.9	10.9	9.1	7.7	7.1	6.7	6.4
10Y	25.3	24.5	23.3	22.2	21.2	17.8	15.3	11.9	9.8	8.1	6.7	6.0	5.6	5.4
15Y	24.5	23.7	22.5	21.4	20.4	17.0	14.5	11.1	9.0	7.3	5.9	5.2	4.8	4.6
20Y	24.1	23.3	22.1	21.0	20.0	16.6	14.1	10.7	8.6	6.9	5.5	4.8	4.5	4.2
30Y	23.7	22.9	21.7	20.6	19.6	16.2	13.7	10.3	8.3	6.5	5.1	4.5	4.1	3.8

USD

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	68.6	67.5	65.9	64.4	63.1	58.7	55.6	51.8	50.0	48.9	48.7	48.9	49.1	49.2
3M	66.5	65.4	63.8	62.3	61.0	56.6	53.5	49.7	47.9	46.8	46.6	46.8	47.0	47.1
6M	63.6	62.5	60.9	59.4	58.1	53.7	50.6	46.8	45.0	43.9	43.7	43.9	44.1	44.2
9M	60.9	59.8	58.2	56.8	55.4	51.1	48.0	44.2	42.3	41.2	41.0	41.2	41.4	41.6
1Y	58.5	57.4	55.8	54.3	53.0	48.6	45.5	41.7	39.9	38.8	38.6	38.8	39.0	39.1
2Y	50.6	49.5	47.9	46.5	45.1	40.8	37.6	33.9	32.0	30.9	30.7	30.9	31.1	31.3
3Y	45.0	43.9	42.3	40.9	39.5	35.2	32.1	28.3	26.4	25.3	25.1	25.3	25.5	25.7
5Y	38.2	37.1	35.5	34.0	32.7	28.3	25.2	21.4	19.6	18.5	18.3	18.5	18.7	18.8
7Y	34.6	33.4	31.9	30.4	29.1	24.7	21.6	17.8	16.0	14.9	14.7	14.8	15.0	15.2
10Y	31.9	30.8	29.2	27.7	26.4	22.0	18.9	15.1	13.3	12.2	12.0	12.2	12.4	12.5
15Y	30.1	29.0	27.4	26.0	24.6	20.3	17.2	13.4	11.5	10.4	10.2	10.4	10.6	10.8
20Y	29.4	28.3	26.7	25.2	23.9	19.5	16.4	12.6	10.8	9.7	9.5	9.7	9.9	10.0
30Y	28.7	27.6	26.0	24.5	23.2	18.8	15.7	11.9	10.1	9.0	8.8	9.0	9.2	9.3

US MBS Vega [redacted]

Other Advanced Economies

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	70.2	69.3	68.0	66.7	65.6	61.8	59.1	55.4	53.5	52.1	51.5	51.5	51.5	51.6
3M	67.4	66.5	65.2	64.0	62.8	59.1	56.3	52.6	50.7	49.3	48.7	48.7	48.8	48.8
6M	63.6	62.7	61.4	60.2	59.0	55.3	52.5	48.8	46.9	45.5	44.9	44.9	44.9	45.0
9M	60.2	59.3	58.0	56.8	55.6	51.9	49.1	45.5	43.5	42.1	41.5	41.5	41.6	41.6
1Y	57.2	56.3	54.9	53.7	52.6	48.8	46.0	42.4	40.5	39.1	38.5	38.4	38.5	38.6
2Y	47.9	47.0	45.7	44.4	43.3	39.5	36.8	33.1	31.2	29.8	29.2	29.2	29.2	29.3
3Y	41.8	40.9	39.6	38.4	37.2	33.5	30.7	27.0	25.1	23.7	23.1	23.1	23.1	23.2
5Y	34.9	33.9	32.6	31.4	30.3	26.5	23.7	20.1	18.1	16.8	16.1	16.1	16.2	16.3
7Y	31.4	30.5	29.2	28.0	26.8	23.1	20.3	16.6	14.7	13.3	12.7	12.7	12.8	12.8
10Y	28.9	27.9	26.6	25.4	24.3	20.5	17.7	14.1	12.1	10.8	10.1	10.1	10.2	10.3
15Y	27.0	26.1	24.8	23.6	22.5	18.7	15.9	12.3	10.3	8.9	8.3	8.3	8.4	8.5

2025 Exploratory Market Shock Scenario

Rates Vega

Absolute Normal Interest Rate Shocks (bps)

	MATURITY													
	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
20Y	26.2	25.3	24.0	22.7	21.6	17.8	15.0	11.4	9.5	8.1	7.5	7.4	7.5	7.6
30Y	25.4	24.4	23.1	21.9	20.8	17.0	14.2	10.6	8.6	7.2	6.6	6.6	6.7	6.8

Total Emerging Europe

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	108.0	106.3	103.9	101.7	99.7	93.3	88.9	83.7	81.2	79.8	79.4	79.5	79.7	79.8
3M	102.9	101.2	98.8	96.6	94.6	88.2	83.7	78.5	76.1	74.7	74.3	74.4	74.6	74.7
6M	96.0	94.3	91.9	89.7	87.7	81.3	76.9	71.7	69.2	67.8	67.4	67.6	67.7	67.8
9M	90.0	88.3	85.9	83.7	81.7	75.3	70.9	65.6	63.2	61.8	61.4	61.5	61.7	61.8
1Y	84.8	83.0	80.6	78.5	76.5	70.0	65.6	60.4	57.9	56.5	56.2	56.3	56.4	56.5
2Y	69.4	67.6	65.3	63.1	61.1	54.7	50.2	45.0	42.5	41.2	40.8	40.9	41.0	41.1
3Y	60.0	58.3	55.9	53.7	51.7	45.3	40.9	35.7	33.2	31.8	31.4	31.5	31.7	31.8
5Y	50.4	48.7	46.3	44.1	42.1	35.7	31.2	26.0	23.6	22.2	21.8	21.9	22.1	22.2
7Y	46.1	44.4	42.0	39.8	37.8	31.4	26.9	21.7	19.3	17.9	17.5	17.6	17.7	17.8
10Y	43.1	41.3	38.9	36.7	34.7	28.3	23.9	18.7	16.2	14.8	14.5	14.6	14.7	14.8
15Y	40.8	39.1	36.7	34.5	32.5	26.1	21.7	16.5	14.0	12.6	12.3	12.4	12.5	12.6
20Y	39.8	38.0	35.6	33.5	31.5	25.0	20.6	15.4	12.9	11.5	11.2	11.3	11.4	11.5
30Y	38.7	37.0	34.6	32.4	30.4	24.0	19.5	14.3	11.9	10.5	10.1	10.2	10.3	10.4

Total Latam & Caribbean

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	279.3	274.8	268.6	263.0	257.8	241.2	229.7	216.2	209.9	206.3	205.4	205.6	206.0	206.2
3M	266.0	261.6	255.4	249.7	244.5	228.0	216.5	203.0	196.7	193.1	192.1	192.4	192.7	193.0
6M	248.3	243.8	237.6	232.0	226.8	210.2	198.7	185.2	178.9	175.3	174.4	174.6	175.0	175.2
9M	232.7	228.3	222.1	216.4	211.2	194.7	183.2	169.7	163.4	159.8	158.8	159.1	159.4	159.7
1Y	219.1	214.7	208.5	202.8	197.6	181.1	169.6	156.1	149.8	146.2	145.2	145.5	145.8	146.1
2Y	179.3	174.9	168.7	163.0	157.8	141.3	129.8	116.3	110.0	106.4	105.4	105.7	106.0	106.3
3Y	155.2	150.7	144.5	138.9	133.7	117.1	105.6	92.2	85.8	82.2	81.3	81.5	81.9	82.1
5Y	130.3	125.9	119.7	114.0	108.8	92.3	80.8	67.3	61.0	57.4	56.4	56.7	57.0	57.3
7Y	119.1	114.7	108.5	102.8	97.7	81.1	69.6	56.1	49.8	46.2	45.2	45.5	45.8	46.1
10Y	111.3	106.8	100.6	95.0	89.8	73.2	61.7	48.3	42.0	38.3	37.4	37.7	38.0	38.2
15Y	105.6	101.1	94.9	89.3	84.1	67.5	56.0	42.6	36.2	32.6	31.7	31.9	32.3	32.5
20Y	102.8	98.3	92.1	86.5	81.3	64.7	53.2	39.8	33.4	29.8	28.9	29.1	29.5	29.7
30Y	100.0	95.5	89.4	83.7	78.5	61.9	50.4	37.0	30.7	27.1	26.1	26.4	26.7	26.9

Total Asia Ex-Japan

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	90.6	89.2	87.2	85.3	83.6	78.3	74.5	70.2	68.1	66.9	66.6	66.7	66.8	66.9
3M	86.3	84.9	82.9	81.0	79.3	74.0	70.2	65.9	63.8	62.6	62.3	62.4	62.5	62.6
6M	80.6	79.1	77.1	75.3	73.6	68.2	64.5	60.1	58.1	56.9	56.6	56.7	56.8	56.9
9M	75.5	74.1	72.1	70.2	68.5	63.2	59.4	55.1	53.0	51.8	51.5	51.6	51.7	51.8
1Y	71.1	69.7	67.6	65.8	64.1	58.7	55.0	50.6	48.6	47.4	47.1	47.2	47.3	47.4
2Y	58.2	56.7	54.7	52.9	51.2	45.8	42.1	37.7	35.7	34.5	34.2	34.3	34.4	34.5
3Y	50.4	48.9	46.9	45.1	43.4	38.0	34.3	29.9	27.9	26.7	26.4	26.5	26.6	26.6
5Y	42.3	40.8	38.8	37.0	35.3	29.9	26.2	21.8	19.8	18.6	18.3	18.4	18.5	18.6
7Y	38.7	37.2	35.2	33.4	31.7	26.3	22.6	18.2	16.2	15.0	14.7	14.8	14.9	15.0
10Y	36.1	34.7	32.7	30.8	29.1	23.8	20.0	15.7	13.6	12.4	12.1	12.2	12.3	12.4
15Y	34.3	32.8	30.8	29.0	27.3	21.9	18.2	13.8	11.8	10.6	10.3	10.4	10.5	10.6
20Y	33.3	31.9	29.9	28.1	26.4	21.0	17.3	12.9	10.9	9.7	9.4	9.5	9.6	9.6
30Y	32.4	31.0	29.0	27.2	25.5	20.1	16.4	12.0	9.9	8.8	8.5	8.6	8.7	8.7

Total ME/N. Africa

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	69.6	68.5	67.0	65.5	64.3	60.1	57.3	53.9	52.3	51.4	51.2	51.3	51.3	51.4
3M	66.3	65.2	63.7	62.2	61.0	56.8	54.0	50.6	49.0	48.1	47.9	48.0	48.0	48.1
6M	61.9	60.8	59.2	57.8	56.5	52.4	49.5	46.2	44.6	43.7	43.5	43.5	43.6	43.7
9M	58.0	56.9	55.4	53.9	52.7	48.5	45.7	42.3	40.7	39.8	39.6	39.7	39.7	39.8
1Y	54.6	53.5	52.0	50.5	49.3	45.1	42.3	38.9	37.3	36.4	36.2	36.3	36.3	36.4
2Y	44.7	43.6	42.0	40.6	39.3	35.2	32.3	29.0	27.4	26.5	26.3	26.3	26.4	26.5
3Y	38.7	37.6	36.0	34.6	33.3	29.2	26.3	23.0	21.4	20.5	20.3	20.3	20.4	20.5
5Y	32.5	31.4	29.8	28.4	27.1	23.0	20.1	16.8	15.2	14.3	14.1	14.1	14.2	14.3
7Y	29.7	28.6	27.0	25.6	24.3	20.2	17.3	14.0	12.4	11.5	11.3	11.3	11.4	11.5
10Y	27.7	26.6	25.1	23.7	22.4	18.3	15.4	12.0	10.5	9.6	9.3	9.4	9.5	9.5
15Y	26.3	25.2	23.7	22.3	21.0	16.8	14.0	10.6	9.0	8.1	7.9	8.0	8.0	8.1
20Y	25.6	24.5	23.0	21.6	20.3	16.1	13.3	9.9	8.3	7.4	7.2	7.3	7.3	7.4
30Y	24.9	23.8	22.3	20.9	19.6	15.4	12.6	9.2	7.6	6.7	6.5	6.6	6.7	6.7

Total Sub-Saharan Africa

EXPIRY	1M	3M	6M	9M	1Y	2Y	3Y	5Y	7Y	10Y	15Y	20Y	25Y	30Y
1M	163.8	161.2	157.6	154.3	151.2	141.5	134.7	126.9	123.1	121.0	120.5	120.6	120.8	121.0
3M	156.1	153.4	149.8	146.5	143.5	133.7	127.0	119.1	115.4	113.3	112.7	112.9	113.1	113.2
6M	145.6	143.0	139.4	136.1	133.0	123.3	116.6	108.7	105.0	102.8	102.3	102.4	102.6	102.8
9M	136.5	133.9	130.3	127.0	123.9	114.2	107.4	99.6	95.8	93.7	93.2	93.3	93.5	93.7
1Y	128.5	125.9	122.3	119.0	115.9	106.2	99.5	91.6	87.9	85.7	85.2	85.3	85.5	85.7
2Y	105.2	102.6	99.0	95.6	92.6	82.9	76.1	68.2	64.5	62.4	61.8	62.0	62.2	62.3
3Y	91.0	88.4	84.8	81.5	78.4	68.7	62.0	54.1	50.4	48.2	47.7	47.8	48.0	48.2
5Y	76.4	73.8	70.2	66.9	63.8	54.1	47.4	39.5	35.8	33.7	33.1	33.2	33.4	33.6
7Y	69.9	67.3	63.6	60.3	57.3	47.6	40.8	32.9	29.2	27.1	26.5	26.7	26.9	27.0
10Y	65.3	62.7	59.0	55.7	52.7	43.0	36.2	28.3	24.6	22.5	21.9	22.1	22.3	22.4
15Y	61.9	59.3	55.7	52.4	49.3	39.6	32.9	25.0	21.3	19.1	18.6	18.7	18.9	19.1
20Y	60.3	57.7	54.0	50.7	47.7	38.0	31.2	23.3	19.6	17.5	16.9	17.1	17.3	17.4
30Y	58.7	56.0	52.4	49.1	46.1	36.3	29.6	21.7	18.0	15.9	15.3	15.5	15.7	15.8

2025 Exploratory Market Shock Scenario
Other Rates

Absolute Change in Inflation (bps)

	MATURITY												
Currency	**1M**	**3M**	**6M**	**9M**	**1Y**	**2Y**	**3Y**	**5Y**	**7Y**	**10Y**	**15Y**	**20Y**	**30Y**
AUD	86.5	86.5	86.5	84.8	83.1	76.1	69.2	59.4	49.5	34.8	34.8	34.8	34.8
EUR	114.8	114.8	114.8	109.1	103.3	80.3	57.3	50.9	44.5	35.0	35.0	35.0	35.0
GBP	113.8	113.8	113.8	108.9	104.0	84.5	65.0	60.2	55.4	48.3	48.3	48.3	48.3
JPY	20.1	20.1	20.1	20.1	20.1	19.9	19.8	19.1	18.3	17.2	17.2	17.2	17.2
USD	122.6	122.6	122.6	118.0	113.4	94.9	76.5	67.5	58.5	45.0	45.0	45.0	45.0
Other	122.6	122.6	122.6	118.0	113.4	94.9	76.5	67.5	58.5	45.0	45.0	45.0	45.0

Absolute Change in Cross-Currency vs. USD Basis (bps)
(move in bps of spread on non-USD leg)

	MATURITY												
Currency	**1M**	**3M**	**6M**	**9M**	**1Y**	**2Y**	**3Y**	**5Y**	**7Y**	**10Y**	**15Y**	**20Y**	**30Y**
AUD	(16.4)	(16.4)	(15.0)	(13.6)	(12.3)	(12.2)	(12.1)	(11.9)	(11.8)	(11.5)	(11.1)	(10.7)	(9.9)
EUR	(27.4)	(27.4)	(23.2)	(19.1)	(15.0)	(14.8)	(14.6)	(14.2)	(13.9)	(13.3)	(12.4)	(11.5)	(9.7)
GBP	(19.4)	(19.4)	(16.5)	(13.7)	(10.8)	(10.8)	(10.8)	(10.8)	(10.8)	(10.7)	(10.7)	(10.6)	(10.5)
JPY	(29.6)	(29.6)	(25.9)	(22.3)	(18.6)	(18.5)	(18.4)	(18.2)	(18.0)	(17.6)	(17.1)	(16.5)	(15.3)
Other	(27.4)	(27.4)	(23.2)	(19.1)	(15.0)	(14.8)	(14.6)	(14.2)	(13.9)	(13.3)	(12.4)	(11.5)	(9.7)

2025 Exploratory Market Shock Scenario
Energy

Relative Price Shock (%)	Brent	Dubai Fateh	Maya	Tapis	WTI	OMAN	Other Sour Crude	Other Sweet Crude	Unspecified Crude	Diesel	Fuel Oil	Heating Oil	Naptha	Ethanol	LPG	Jet Fuel	Gas Oils	Gasoline	Other Oil Products
	OIL PRODUCTS																		
	CRUDE OIL									OTHER OIL PRODUCTS									
Spot	61.4%	66.9%	66.9%	66.9%	49.6%	66.9%	66.9%	66.9%	66.9%	66.9%	66.9%	64.1%	66.9%	66.9%	66.9%	66.9%	62.2%	66.9%	66.9%
Month 1	59.6%	65.0%	65.0%	65.0%	47.7%	65.0%	65.0%	65.0%	65.0%	65.0%	65.0%	62.4%	65.0%	65.0%	65.0%	65.0%	60.9%	65.0%	65.0%
Month 2	58.0%	63.3%	63.3%	63.3%	45.9%	63.3%	63.3%	63.3%	63.3%	63.3%	63.3%	60.9%	63.3%	63.3%	63.3%	63.3%	59.8%	63.3%	63.3%
Month 3	56.6%	61.8%	61.8%	61.8%	44.1%	61.8%	61.8%	61.8%	61.8%	61.8%	61.8%	59.5%	61.8%	61.8%	61.8%	61.8%	58.8%	61.8%	61.8%
Month 4	55.4%	60.5%	60.5%	60.5%	42.5%	60.5%	60.5%	60.5%	60.5%	60.5%	60.5%	58.3%	60.5%	60.5%	60.5%	60.5%	58.0%	60.5%	60.5%
Month 5	54.4%	59.2%	59.2%	59.2%	40.9%	59.2%	59.2%	59.2%	59.2%	59.2%	59.2%	57.3%	59.2%	59.2%	59.2%	59.2%	57.4%	59.2%	59.2%
Month 6	53.5%	58.1%	58.1%	58.1%	39.4%	58.1%	58.1%	58.1%	58.1%	58.1%	58.1%	56.3%	58.1%	58.1%	58.1%	58.1%	56.8%	58.1%	58.1%
Month 7	52.7%	57.1%	57.1%	57.1%	38.0%	57.1%	57.1%	57.1%	57.1%	57.1%	57.1%	55.5%	57.1%	57.1%	57.1%	57.1%	56.3%	57.1%	57.1%
Month 8	52.0%	56.2%	56.2%	56.2%	36.6%	56.2%	56.2%	56.2%	56.2%	56.2%	56.2%	54.7%	56.2%	56.2%	56.2%	56.2%	55.9%	56.2%	56.2%
Month 9	51.5%	55.4%	55.4%	55.4%	35.3%	55.4%	55.4%	55.4%	55.4%	55.4%	55.4%	54.1%	55.4%	55.4%	55.4%	55.4%	55.6%	55.4%	55.4%
Month 10	51.0%	54.7%	54.7%	54.7%	34.1%	54.7%	54.7%	54.7%	54.7%	54.7%	54.7%	53.5%	54.7%	54.7%	54.7%	54.7%	55.3%	54.7%	54.7%
Month 11	50.5%	54.0%	54.0%	54.0%	32.9%	54.0%	54.0%	54.0%	54.0%	54.0%	54.0%	53.0%	54.0%	54.0%	54.0%	54.0%	55.1%	54.0%	54.0%
Month 12	50.1%	53.4%	53.4%	53.4%	31.8%	53.4%	53.4%	53.4%	53.4%	53.4%	53.4%	52.5%	53.4%	53.4%	53.4%	53.4%	54.9%	53.4%	53.4%
Month 13	49.8%	52.9%	52.9%	52.9%	30.8%	52.9%	52.9%	52.9%	52.9%	52.9%	52.9%	52.1%	52.9%	52.9%	52.9%	52.9%	54.7%	52.9%	52.9%
Month 14	49.6%	52.4%	52.4%	52.4%	29.8%	52.4%	52.4%	52.4%	52.4%	52.4%	52.4%	51.7%	52.4%	52.4%	52.4%	52.4%	54.5%	52.4%	52.4%
Month 15	49.3%	51.9%	51.9%	51.9%	28.8%	51.9%	51.9%	51.9%	51.9%	51.9%	51.9%	51.4%	51.9%	51.9%	51.9%	51.9%	54.4%	51.9%	51.9%
Month 16	49.1%	51.5%	51.5%	51.5%	28.0%	51.5%	51.5%	51.5%	51.5%	51.5%	51.5%	51.1%	51.5%	51.5%	51.5%	51.5%	54.3%	51.5%	51.5%
Month 17	48.9%	51.1%	51.1%	51.1%	27.1%	51.1%	51.1%	51.1%	51.1%	51.1%	51.1%	50.9%	51.1%	51.1%	51.1%	51.1%	54.2%	51.1%	51.1%
Month 18	48.8%	50.8%	50.8%	50.8%	26.3%	50.8%	50.8%	50.8%	50.8%	50.8%	50.8%	50.6%	50.8%	50.8%	50.8%	50.8%	54.2%	50.8%	50.8%
Month 19	48.7%	50.4%	50.4%	50.4%	25.6%	50.4%	50.4%	50.4%	50.4%	50.4%	50.4%	50.4%	50.4%	50.4%	50.4%	50.4%	54.1%	50.4%	50.4%
Month 20	48.5%	50.1%	50.1%	50.1%	24.8%	50.1%	50.1%	50.1%	50.1%	50.1%	50.1%	50.3%	50.1%	50.1%	50.1%	50.1%	54.1%	50.1%	50.1%
Month 21	48.5%	49.9%	49.9%	49.9%	24.2%	49.9%	49.9%	49.9%	49.9%	49.9%	49.9%	50.1%	49.9%	49.9%	49.9%	49.9%	54.0%	49.9%	49.9%
Month 22	48.4%	49.6%	49.6%	49.6%	23.5%	49.6%	49.6%	49.6%	49.6%	49.6%	49.6%	50.0%	49.6%	49.6%	49.6%	49.6%	54.0%	49.6%	49.6%
Month 23	48.3%	49.4%	49.4%	49.4%	22.9%	49.4%	49.4%	49.4%	49.4%	49.4%	49.4%	49.8%	49.4%	49.4%	49.4%	49.4%	54.0%	49.4%	49.4%
Month 24	48.2%	49.2%	49.2%	49.2%	22.3%	49.2%	49.2%	49.2%	49.2%	49.2%	49.2%	49.7%	49.2%	49.2%	49.2%	49.2%	53.9%	49.2%	49.2%
Year 3	47.9%	47.5%	47.5%	47.5%	17.5%	47.5%	47.5%	47.5%	47.5%	47.5%	47.5%	49.1%	47.5%	47.5%	47.5%	47.5%	53.8%	47.5%	47.5%
Year 4	47.9%	46.8%	46.8%	46.8%	15.1%	46.8%	46.8%	46.8%	46.8%	46.8%	46.8%	48.9%	46.8%	46.8%	46.8%	46.8%	53.8%	46.8%	46.8%
Year 5	47.9%	46.4%	46.4%	46.4%	13.9%	46.4%	46.4%	46.4%	46.4%	46.4%	46.4%	48.9%	46.4%	46.4%	46.4%	46.4%	53.8%	46.4%	46.4%
Year 6	47.9%	46.3%	46.3%	46.3%	13.4%	46.3%	46.3%	46.3%	46.3%	46.3%	46.3%	48.9%	46.3%	46.3%	46.3%	46.3%	53.8%	46.3%	46.3%
Year 7	47.9%	46.2%	46.2%	46.2%	13.1%	46.2%	46.2%	46.2%	46.2%	46.2%	46.2%	48.9%	46.2%	46.2%	46.2%	46.2%	53.8%	46.2%	46.2%
Year 8	47.9%	46.2%	46.2%	46.2%	13.0%	46.2%	46.2%	46.2%	46.2%	46.2%	46.2%	48.9%	46.2%	46.2%	46.2%	46.2%	53.8%	46.2%	46.2%
Year 9	47.9%	46.1%	46.1%	46.1%	12.9%	46.1%	46.1%	46.1%	46.1%	46.1%	46.1%	48.9%	46.1%	46.1%	46.1%	46.1%	53.8%	46.1%	46.1%
Year 10-14	47.9%	46.1%	46.1%	46.1%	12.9%	46.1%	46.1%	46.1%	46.1%	46.1%	46.1%	48.9%	46.1%	46.1%	46.1%	46.1%	53.8%	46.1%	46.1%
Year 15-19	47.9%	46.1%	46.1%	46.1%	12.9%	46.1%	46.1%	46.1%	46.1%	46.1%	46.1%	48.9%	46.1%	46.1%	46.1%	46.1%	53.8%	46.1%	46.1%
Year 20+	47.9%	46.1%	46.1%	46.1%	12.9%	46.1%	46.1%	46.1%	46.1%	46.1%	46.1%	48.9%	46.1%	46.1%	46.1%	46.1%	53.8%	46.1%	46.1%

Absolute Vega Shock (Vol Pts)

Total Vega	40.9	40.9	40.9	40.9	31.8	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9	40.9

Relative Vega Shock (%)

Total Vega	90.4%	103.9%	171.9%	90.4%	64.1%	90.4%	90.4%	82.5%	90.4%	155.9%	82.5%	105.8%	158.2%	82.5%	90.4%	111.8%	103.4%	94.5%	90.4%

2025 Exploratory Market Shock Scenario
Energy

	NATURAL GAS														
	US							Europe							
Relative Price Shock (%)	**Gulf Coast**	**MidCont**	**NE**	**Rockies**	**West**	**NYMEX**	**Other US**	**UK**	**Belgium**	**Dutch**	**French**	**German**	**Other Europe**	**Canada**	**Other Regions**
Spot	70.6%	70.6%	70.6%	70.6%	70.6%	70.6%	70.6%	78.4%	78.4%	78.4%	78.4%	78.4%	78.4%	70.6%	70.6%
Month 1	61.9%	61.9%	61.9%	61.9%	61.9%	61.9%	61.9%	68.8%	68.8%	68.8%	68.8%	68.8%	68.8%	61.9%	61.9%
Month 2	54.9%	54.9%	54.9%	54.9%	54.9%	54.9%	54.9%	61.0%	61.0%	61.0%	61.0%	61.0%	61.0%	54.9%	54.9%
Month 3	49.1%	49.1%	49.1%	49.1%	49.1%	49.1%	49.1%	54.5%	54.5%	54.5%	54.5%	54.5%	54.5%	49.1%	49.1%
Month 4	44.2%	44.2%	44.2%	44.2%	44.2%	44.2%	44.2%	49.0%	49.0%	49.0%	49.0%	49.0%	49.0%	44.2%	44.2%
Month 5	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	44.4%	44.4%	44.4%	44.4%	44.4%	44.4%	40.0%	40.0%
Month 6	36.4%	36.4%	36.4%	36.4%	36.4%	36.4%	36.4%	40.5%	40.5%	40.5%	40.5%	40.5%	40.5%	36.4%	36.4%
Month 7	33.4%	33.4%	33.4%	33.4%	33.4%	33.4%	33.4%	37.0%	37.0%	37.0%	37.0%	37.0%	37.0%	33.4%	33.4%
Month 8	30.7%	30.7%	30.7%	30.7%	30.7%	30.7%	30.7%	34.1%	34.1%	34.1%	34.1%	34.1%	34.1%	30.7%	30.7%
Month 9	28.3%	28.3%	28.3%	28.3%	28.3%	28.3%	28.3%	31.5%	31.5%	31.5%	31.5%	31.5%	31.5%	28.3%	28.3%
Month 10	26.3%	26.3%	26.3%	26.3%	26.3%	26.3%	26.3%	29.1%	29.1%	29.1%	29.1%	29.1%	29.1%	26.3%	26.3%
Month 11	24.4%	24.4%	24.4%	24.4%	24.4%	24.4%	24.4%	27.1%	27.1%	27.1%	27.1%	27.1%	27.1%	24.4%	24.4%
Month 12	22.8%	22.8%	22.8%	22.8%	22.8%	22.8%	22.8%	25.3%	25.3%	25.3%	25.3%	25.3%	25.3%	22.8%	22.8%
Month 13	21.3%	21.3%	21.3%	21.3%	21.3%	21.3%	21.3%	23.7%	23.7%	23.7%	23.7%	23.7%	23.7%	21.3%	21.3%
Month 14	20.0%	20.0%	20.0%	20.0%	20.0%	20.0%	20.0%	22.2%	22.2%	22.2%	22.2%	22.2%	22.2%	20.0%	20.0%
Month 15	18.9%	18.9%	18.9%	18.9%	18.9%	18.9%	18.9%	20.9%	20.9%	20.9%	20.9%	20.9%	20.9%	18.9%	18.9%
Month 16	17.8%	17.8%	17.8%	17.8%	17.8%	17.8%	17.8%	19.8%	19.8%	19.8%	19.8%	19.8%	19.8%	17.8%	17.8%
Month 17	16.9%	16.9%	16.9%	16.9%	16.9%	16.9%	16.9%	18.7%	18.7%	18.7%	18.7%	18.7%	18.7%	16.9%	16.9%
Month 18	16.0%	16.0%	16.0%	16.0%	16.0%	16.0%	16.0%	17.8%	17.8%	17.8%	17.8%	17.8%	17.8%	16.0%	16.0%
Month 19	15.2%	15.2%	15.2%	15.2%	15.2%	15.2%	15.2%	16.9%	16.9%	16.9%	16.9%	16.9%	16.9%	15.2%	15.2%
Month 20	14.5%	14.5%	14.5%	14.5%	14.5%	14.5%	14.5%	16.2%	16.2%	16.2%	16.2%	16.2%	16.2%	14.5%	14.5%
Month 21	13.9%	13.9%	13.9%	13.9%	13.9%	13.9%	13.9%	15.4%	15.4%	15.4%	15.4%	15.4%	15.4%	13.9%	13.9%
Month 22	13.3%	13.3%	13.3%	13.3%	13.3%	13.3%	13.3%	14.8%	14.8%	14.8%	14.8%	14.8%	14.8%	13.3%	13.3%
Month 23	12.8%	12.8%	12.8%	12.8%	12.8%	12.8%	12.8%	14.2%	14.2%	14.2%	14.2%	14.2%	14.2%	12.8%	12.8%
Month 24	12.3%	12.3%	12.3%	12.3%	12.3%	12.3%	12.3%	13.7%	13.7%	13.7%	13.7%	13.7%	13.7%	12.3%	12.3%
Year 3	9.0%	9.0%	9.0%	9.0%	9.0%	9.0%	9.0%	10.0%	10.0%	10.0%	10.0%	10.0%	10.0%	9.0%	9.0%
Year 4	7.9%	7.9%	7.9%	7.9%	7.9%	7.9%	7.9%	8.8%	8.8%	8.8%	8.8%	8.8%	8.8%	7.9%	7.9%
Year 5	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	7.5%	7.5%
Year 6	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	7.4%	7.4%
Year 7	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	8.1%	8.1%	8.1%	8.1%	8.1%	8.1%	7.3%	7.3%
Year 8	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	8.1%	8.1%	8.1%	8.1%	8.1%	8.1%	7.3%	7.3%
Year 9	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	8.1%	8.1%	8.1%	8.1%	8.1%	8.1%	7.3%	7.3%
Year 10-14	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	8.1%	8.1%	8.1%	8.1%	8.1%	8.1%	7.3%	7.3%
Year 15-19	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	8.1%	8.1%	8.1%	8.1%	8.1%	8.1%	7.3%	7.3%
Year 20+	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	8.1%	8.1%	8.1%	8.1%	8.1%	8.1%	7.3%	7.3%

Absolute Vega Shocl

Total Vega	54.7	54.7	54.7	54.7	54.7	54.7	54.7	60.7	60.7	60.7	60.7	60.7	60.7	54.7	54.7

Relative Vega Shock

Total Vega	75.9%	75.9%	74.2%	75.9%	15.7%	91.4%	75.9%	113.6%	113.6%	113.6%	113.6%	113.6%	113.6%	65.7%	65.7%

2025 Exploratory Market Shock Scenario

Energy

Relative Price Shock (%)	POWER													
	US						Europe							Other Regions
	Ercot	Midwest	North East	NYISO	West	Other US	Nordpool	Benelux	UK	Germany	France	Italy	Other Europe	
Spot	33.7%	33.7%	33.7%	33.7%	33.7%	33.7%	42.1%	42.1%	42.1%	42.1%	42.1%	42.1%	42.1%	42.1%
Month 1	29.6%	29.6%	29.6%	29.6%	29.6%	29.6%	36.9%	36.9%	36.9%	36.9%	36.9%	36.9%	36.9%	36.9%
Month 2	26.2%	26.2%	26.2%	26.2%	26.2%	26.2%	32.7%	32.7%	32.7%	32.7%	32.7%	32.7%	32.7%	32.7%
Month 3	23.4%	23.4%	23.4%	23.4%	23.4%	23.4%	29.2%	29.2%	29.2%	29.2%	29.2%	29.2%	29.2%	29.2%
Month 4	21.1%	21.1%	21.1%	21.1%	21.1%	21.1%	26.3%	26.3%	26.3%	26.3%	26.3%	26.3%	26.3%	26.3%
Month 5	19.1%	19.1%	19.1%	19.1%	19.1%	19.1%	23.8%	23.8%	23.8%	23.8%	23.8%	23.8%	23.8%	23.8%
Month 6	17.4%	17.4%	17.4%	17.4%	17.4%	17.4%	21.7%	21.7%	21.7%	21.7%	21.7%	21.7%	21.7%	21.7%
Month 7	15.9%	15.9%	15.9%	15.9%	15.9%	15.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%
Month 8	14.6%	14.6%	14.6%	14.6%	14.6%	14.6%	18.3%	18.3%	18.3%	18.3%	18.3%	18.3%	18.3%	18.3%
Month 9	13.5%	13.5%	13.5%	13.5%	13.5%	13.5%	16.9%	16.9%	16.9%	16.9%	16.9%	16.9%	16.9%	16.9%
Month 10	12.5%	12.5%	12.5%	12.5%	12.5%	12.5%	15.7%	15.7%	15.7%	15.7%	15.7%	15.7%	15.7%	15.7%
Month 11	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%	14.6%	14.6%	14.6%	14.6%	14.6%	14.6%	14.6%	14.6%
Month 12	10.9%	10.9%	10.9%	10.9%	10.9%	10.9%	13.6%	13.6%	13.6%	13.6%	13.6%	13.6%	13.6%	13.6%
Month 13	10.2%	10.2%	10.2%	10.2%	10.2%	10.2%	12.7%	12.7%	12.7%	12.7%	12.7%	12.7%	12.7%	12.7%
Month 14	9.6%	9.6%	9.6%	9.6%	9.6%	9.6%	11.9%	11.9%	11.9%	11.9%	11.9%	11.9%	11.9%	11.9%
Month 15	9.0%	9.0%	9.0%	9.0%	9.0%	9.0%	11.3%	11.3%	11.3%	11.3%	11.3%	11.3%	11.3%	11.3%
Month 16	8.5%	8.5%	8.5%	8.5%	8.5%	8.5%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%
Month 17	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	10.1%	10.1%	10.1%	10.1%	10.1%	10.1%	10.1%	10.1%
Month 18	7.6%	7.6%	7.6%	7.6%	7.6%	7.6%	9.6%	9.6%	9.6%	9.6%	9.6%	9.6%	9.6%	9.6%
Month 19	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	9.1%	9.1%	9.1%	9.1%	9.1%	9.1%	9.1%	9.1%
Month 20	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	8.7%	8.7%	8.7%	8.7%	8.7%	8.7%	8.7%	8.7%
Month 21	6.6%	6.6%	6.6%	6.6%	6.6%	6.6%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%
Month 22	6.4%	6.4%	6.4%	6.4%	6.4%	6.4%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%
Month 23	6.1%	6.1%	6.1%	6.1%	6.1%	6.1%	7.6%	7.6%	7.6%	7.6%	7.6%	7.6%	7.6%	7.6%
Month 24	5.9%	5.9%	5.9%	5.9%	5.9%	5.9%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%
Year 3	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	5.4%	5.4%	5.4%	5.4%	5.4%	5.4%	5.4%	5.4%
Year 4	3.8%	3.8%	3.8%	3.8%	3.8%	3.8%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%
Year 5	3.6%	3.6%	3.6%	3.6%	3.6%	3.6%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%
Year 6	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.4%	4.4%	4.4%	4.4%	4.4%	4.4%	4.4%	4.4%
Year 7	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.4%	4.4%	4.4%	4.4%	4.4%	4.4%	4.4%	4.4%
Year 8	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%
Year 9	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%
Year 10-14	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%
Year 15-19	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%
Year 20+	3.5%	3.5%	3.5%	3.5%	3.5%	3.5%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%

Absolute Vega Shocl

Total Vega	16.4	16.4	16.4	16.4	16.4	16.4	20.5	20.5	20.5	20.5	20.5	20.5	20.5	20.5

Relative Vega Shock

Total Vega	5.2%	5.2%	5.2%	9.8%	5.2%	5.2%	5.4%	5.4%	5.4%	37.8%	2.2%	5.4%	5.4%	6.5%

2025 Exploratory Market Shock Scenario
Energy

Relative Price Shock (%)	OTHER ENERGY											
	Emissions				Coal				Dry Freight		Structured Products	Other / Unspecified Energy
	EUA/ETS	CER	VER	Other	ARA /API2	Richards Bay / API4	Indonesia	Other Regions	Baltic Dry Index	Other Freight		
Spot	59.2%	59.2%	43.2%	43.2%	58.0%	35.9%	43.2%	43.2%	58.0%	58.0%	43.2%	43.2%
Month 1	53.6%	53.6%	39.1%	39.1%	52.7%	32.3%	39.1%	39.1%	52.7%	52.7%	39.1%	39.1%
Month 2	48.7%	48.7%	35.5%	35.5%	48.1%	29.1%	35.5%	35.5%	48.1%	48.1%	35.5%	35.5%
Month 3	44.3%	44.3%	32.3%	32.3%	43.9%	26.3%	32.3%	32.3%	43.9%	43.9%	32.3%	32.3%
Month 4	40.4%	40.4%	29.5%	29.5%	40.2%	23.9%	29.5%	29.5%	40.2%	40.2%	29.5%	29.5%
Month 5	37.0%	37.0%	27.0%	27.0%	36.9%	21.7%	27.0%	27.0%	36.9%	36.9%	27.0%	27.0%
Month 6	33.9%	33.9%	24.7%	24.7%	34.0%	19.8%	24.7%	24.7%	34.0%	34.0%	24.7%	24.7%
Month 7	31.1%	31.1%	22.7%	22.7%	31.3%	18.1%	22.7%	22.7%	31.3%	31.3%	22.7%	22.7%
Month 8	28.7%	28.7%	20.9%	20.9%	28.9%	16.6%	20.9%	20.9%	28.9%	28.9%	20.9%	20.9%
Month 9	26.5%	26.5%	19.3%	19.3%	26.8%	15.2%	19.3%	19.3%	26.8%	26.8%	19.3%	19.3%
Month 10	24.5%	24.5%	17.9%	17.9%	24.9%	14.0%	17.9%	17.9%	24.9%	24.9%	17.9%	17.9%
Month 11	22.8%	22.8%	16.6%	16.6%	23.1%	13.0%	16.6%	16.6%	23.1%	23.1%	16.6%	16.6%
Month 12	21.2%	21.2%	15.5%	15.5%	21.6%	12.0%	15.5%	15.5%	21.6%	21.6%	15.5%	15.5%
Month 13	19.8%	19.8%	14.4%	14.4%	20.2%	11.2%	14.4%	14.4%	20.2%	20.2%	14.4%	14.4%
Month 14	18.5%	18.5%	13.5%	13.5%	18.9%	10.5%	13.5%	13.5%	18.9%	18.9%	13.5%	13.5%
Month 15	17.4%	17.4%	12.7%	12.7%	17.8%	9.8%	12.7%	12.7%	17.8%	17.8%	12.7%	12.7%
Month 16	16.4%	16.4%	11.9%	11.9%	16.7%	9.2%	11.9%	11.9%	16.7%	16.7%	11.9%	11.9%
Month 17	15.4%	15.4%	11.3%	11.3%	15.8%	8.7%	11.3%	11.3%	15.8%	15.8%	11.3%	11.3%
Month 18	14.6%	14.6%	10.7%	10.7%	15.0%	8.2%	10.7%	10.7%	15.0%	15.0%	10.7%	10.7%
Month 19	13.9%	13.9%	10.1%	10.1%	14.2%	7.8%	10.1%	10.1%	14.2%	14.2%	10.1%	10.1%
Month 20	13.2%	13.2%	9.6%	9.6%	13.5%	7.4%	9.6%	9.6%	13.5%	13.5%	9.6%	9.6%
Month 21	12.6%	12.6%	9.2%	9.2%	12.9%	7.1%	9.2%	9.2%	12.9%	12.9%	9.2%	9.2%
Month 22	12.1%	12.1%	8.8%	8.8%	12.3%	6.8%	8.8%	8.8%	12.3%	12.3%	8.8%	8.8%
Month 23	11.6%	11.6%	8.5%	8.5%	11.8%	6.6%	8.5%	8.5%	11.8%	11.8%	8.5%	8.5%
Month 24	11.2%	11.2%	8.2%	8.2%	11.4%	6.3%	8.2%	8.2%	11.4%	11.4%	8.2%	8.2%
Year 3	8.4%	8.4%	6.1%	6.1%	8.3%	4.9%	6.1%	6.1%	8.3%	8.3%	6.1%	6.1%
Year 4	7.5%	7.5%	5.5%	5.5%	7.4%	4.5%	5.5%	5.5%	7.4%	7.4%	5.5%	5.5%
Year 5	7.3%	7.3%	5.3%	5.3%	7.1%	4.5%	5.3%	5.3%	7.1%	7.1%	5.3%	5.3%
Year 6	7.3%	7.3%	5.3%	5.3%	7.1%	4.4%	5.3%	5.3%	7.1%	7.1%	5.3%	5.3%
Year 7	7.2%	7.2%	5.3%	5.3%	7.0%	4.4%	5.3%	5.3%	7.0%	7.0%	5.3%	5.3%
Year 8	7.2%	7.2%	5.3%	5.3%	7.0%	4.4%	5.3%	5.3%	7.0%	7.0%	5.3%	5.3%
Year 9	7.2%	7.2%	5.3%	5.3%	7.0%	4.4%	5.3%	5.3%	7.0%	7.0%	5.3%	5.3%
Year 10-14	7.2%	7.2%	5.3%	5.3%	7.0%	4.4%	5.3%	5.3%	7.0%	7.0%	5.3%	5.3%
Year 15-19	7.2%	7.2%	5.3%	5.3%	7.0%	4.4%	5.3%	5.3%	7.0%	7.0%	5.3%	5.3%
Year 20+	7.2%	7.2%	5.3%	5.3%	7.0%	4.4%	5.3%	5.3%	7.0%	7.0%	5.3%	5.3%
Absolute Vega Shocl												
Total Vega	28.8	28.8	21.0	21.0	28.2	17.4	21.0	21.0	28.2	28.2	21.0	21.0
Relative Vega Shock												
Total Vega	93.9%	93.9%	68.4%	68.4%	122.8%	75.8%	91.4%	91.4%	95.6%	95.6%	86.1%	86.1%

2025 Exploratory Market Shock Scenario
Metals

Relative Price Shock (%)	PRECIOUS METALS					BASE METALS										
	Gold	Silver	Palladium	Platinum	Other Precious Metals	Aluminum (Primary)	Aluminum (Alloy)	Copper	Iron	Lead	Nickel	Tin	Uranium	Zinc	Other Base Metals	Other / Unspecified Metals
Spot	5.8%	20.2%	23.4%	16.5%	16.5%	20.4%	20.4%	20.6%	20.5%	20.5%	20.5%	20.5%	20.5%	20.5%	20.5%	20.5%
Month 1	5.8%	20.0%	23.2%	16.3%	16.3%	20.0%	20.0%	20.3%	20.1%	20.1%	20.1%	20.1%	20.1%	20.1%	20.1%	20.1%
Month 2	5.8%	19.9%	23.1%	16.2%	16.2%	19.6%	19.6%	19.9%	19.8%	19.8%	19.8%	19.8%	19.8%	19.8%	19.8%	19.8%
Month 3	5.8%	19.7%	23.0%	16.2%	16.2%	19.3%	19.3%	19.6%	19.4%	19.4%	19.4%	19.4%	19.4%	19.4%	19.4%	19.4%
Month 4	5.8%	19.6%	22.8%	16.1%	16.1%	18.9%	18.9%	19.4%	19.1%	19.1%	19.1%	19.1%	19.1%	19.1%	19.1%	19.1%
Month 5	5.7%	19.5%	22.7%	16.0%	16.0%	18.5%	18.5%	19.1%	18.8%	18.8%	18.8%	18.8%	18.8%	18.8%	18.8%	18.8%
Month 6	5.7%	19.4%	22.6%	15.9%	15.9%	18.2%	18.2%	18.8%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%
Month 7	5.7%	19.3%	22.6%	15.9%	15.9%	17.9%	17.9%	18.6%	18.2%	18.2%	18.2%	18.2%	18.2%	18.2%	18.2%	18.2%
Month 8	5.7%	19.2%	22.5%	15.8%	15.8%	17.5%	17.5%	18.4%	18.0%	18.0%	18.0%	18.0%	18.0%	18.0%	18.0%	18.0%
Month 9	5.7%	19.2%	22.4%	15.8%	15.8%	17.2%	17.2%	18.2%	17.7%	17.7%	17.7%	17.7%	17.7%	17.7%	17.7%	17.7%
Month 10	5.7%	19.1%	22.3%	15.7%	15.7%	16.9%	16.9%	18.0%	17.4%	17.4%	17.4%	17.4%	17.4%	17.4%	17.4%	17.4%
Month 11	5.7%	19.0%	22.3%	15.7%	15.7%	16.6%	16.6%	17.8%	17.2%	17.2%	17.2%	17.2%	17.2%	17.2%	17.2%	17.2%
Month 12	5.7%	19.0%	22.2%	15.6%	15.6%	16.4%	16.4%	17.6%	17.0%	17.0%	17.0%	17.0%	17.0%	17.0%	17.0%	17.0%
Month 13	5.7%	18.9%	22.2%	15.6%	15.6%	16.1%	16.1%	17.4%	16.8%	16.8%	16.8%	16.8%	16.8%	16.8%	16.8%	16.8%
Month 14	5.7%	18.9%	22.1%	15.6%	15.6%	15.8%	15.8%	17.3%	16.6%	16.6%	16.6%	16.6%	16.6%	16.6%	16.6%	16.6%
Month 15	5.7%	18.9%	22.1%	15.5%	15.5%	15.5%	15.5%	17.2%	16.4%	16.4%	16.4%	16.4%	16.4%	16.4%	16.4%	16.4%
Month 16	5.7%	18.8%	22.0%	15.5%	15.5%	15.3%	15.3%	17.0%	16.2%	16.2%	16.2%	16.2%	16.2%	16.2%	16.2%	16.2%
Month 17	5.7%	18.8%	22.0%	15.5%	15.5%	15.1%	15.1%	16.9%	16.0%	16.0%	16.0%	16.0%	16.0%	16.0%	16.0%	16.0%
Month 18	5.7%	18.8%	22.0%	15.5%	15.5%	14.8%	14.8%	16.8%	15.8%	15.8%	15.8%	15.8%	15.8%	15.8%	15.8%	15.8%
Month 19	5.6%	18.7%	22.0%	15.4%	15.4%	14.6%	14.6%	16.6%	15.6%	15.6%	15.6%	15.6%	15.6%	15.6%	15.6%	15.6%
Month 20	5.6%	18.7%	21.9%	15.4%	15.4%	14.4%	14.4%	16.5%	15.4%	15.4%	15.4%	15.4%	15.4%	15.4%	15.4%	15.4%
Month 21	5.6%	18.7%	21.9%	15.4%	15.4%	14.2%	14.2%	16.4%	15.3%	15.3%	15.3%	15.3%	15.3%	15.3%	15.3%	15.3%
Month 22	5.6%	18.7%	21.9%	15.4%	15.4%	14.0%	14.0%	16.3%	15.1%	15.1%	15.1%	15.1%	15.1%	15.1%	15.1%	15.1%
Month 23	5.6%	18.6%	21.9%	15.4%	15.4%	13.8%	13.8%	16.3%	15.0%	15.0%	15.0%	15.0%	15.0%	15.0%	15.0%	15.0%
Month 24	5.6%	18.6%	21.8%	15.4%	15.4%	13.6%	13.6%	16.2%	14.9%	14.9%	14.9%	14.9%	14.9%	14.9%	14.9%	14.9%
Year 3	5.6%	18.5%	21.7%	15.3%	15.3%	11.7%	11.7%	15.5%	13.6%	13.6%	13.6%	13.6%	13.6%	13.6%	13.6%	13.6%
Year 4	5.6%	18.5%	21.7%	15.2%	15.2%	10.4%	10.4%	15.1%	12.8%	12.8%	12.8%	12.8%	12.8%	12.8%	12.8%	12.8%
Year 5	5.6%	18.5%	21.7%	15.2%	15.2%	9.6%	9.6%	14.9%	12.3%	12.3%	12.3%	12.3%	12.3%	12.3%	12.3%	12.3%
Year 6	5.6%	18.5%	21.7%	15.2%	15.2%	9.0%	9.0%	14.9%	11.9%	11.9%	11.9%	11.9%	11.9%	11.9%	11.9%	11.9%
Year 7	5.6%	18.5%	21.6%	15.2%	15.2%	8.7%	8.7%	14.8%	11.8%	11.8%	11.8%	11.8%	11.8%	11.8%	11.8%	11.8%
Year 8	5.6%	18.5%	21.6%	15.2%	15.2%	8.5%	8.5%	14.8%	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%
Year 9	5.6%	18.5%	21.6%	15.2%	15.2%	8.3%	8.3%	14.8%	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%	11.6%
Year 10-14	5.6%	18.5%	21.6%	15.2%	15.2%	8.2%	8.2%	14.8%	11.5%	11.5%	11.5%	11.5%	11.5%	11.5%	11.5%	11.5%
Year 15-19	5.6%	18.5%	21.6%	15.2%	15.2%	8.0%	8.0%	14.8%	11.4%	11.4%	11.4%	11.4%	11.4%	11.4%	11.4%	11.4%
Year 20+	5.6%	18.5%	21.6%	15.2%	15.2%	8.0%	8.0%	14.8%	11.4%	11.4%	11.4%	11.4%	11.4%	11.4%	11.4%	11.4%

Absolute Vega Shock (Vol Pts)

	Gold	Silver	Palladium	Platinum	Other Precious Metals	Aluminum (Primary)	Aluminum (Alloy)	Copper	Iron	Lead	Nickel	Tin	Uranium	Zinc	Other Base Metals	Other / Unspecified Metals
Total Vega	5.0	8.3	8.3	8.3	8.3	11.1	11.1	20.7	15.9	15.9	15.9	15.9	15.9	15.9	15.9	15.9

Relative Vega Shock (%)

	Gold	Silver	Palladium	Platinum	Other Precious Metals	Aluminum (Primary)	Aluminum (Alloy)	Copper	Iron	Lead	Nickel	Tin	Uranium	Zinc	Other Base Metals	Other / Unspecified Metals
Total Vega	32.2%	24.7%	20.7%	32.0%	53.4%	41.3%	41.3%	96.1%	73.9%	71.8%	63.9%	53.0%	183.4%	56.1%	73.9%	73.9%

2025 Exploratory Market Shock Scenario
Ags & Softs

Relative Price Shock (%)	Cocoa	Coffee	Corn	Cotton	Cattle	Lean Hogs	Livestock	Lumber	Palm Oil	Rapeseed	Soybeans	Soymeal	Soybean Oil	Sugar	Wheat	Other / Unspecified Ags/Softs
Spot	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%	8.4%
Month 1	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%	8.2%
Month 2	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%
Month 3	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%	7.8%
Month 4	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%
Month 5	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%	7.5%
Month 6	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%	7.4%
Month 7	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%
Month 8	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%
Month 9	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%	7.2%
Month 10	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%
Month 11	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%	7.0%
Month 12	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%
Month 13	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%	6.9%
Month 14	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%
Month 15	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%
Month 16	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%
Month 17	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%	6.8%
Month 18	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Month 19	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Month 20	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Month 21	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Month 22	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Month 23	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Month 24	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%	6.7%
Year 3	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 4	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 5	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 6	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 7	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 8	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 9	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 10-14	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 15-19	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%
Year 20+	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%	6.5%

Absolute Vega Shock (Vol Pts)

Total Vega	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7	3.7

Relative Vega Shock (%)

Total Vega	6.7%	9.9%	29.3%	16.7%	30.6%	102.8%	102.8%	12.1%	21.7%	21.1%	27.5%	13.6%	11.2%	13.2%	13.4%	29.3%

2025 Exploratory Market Shock Scenario
Diversified Commodity Indices

Relative Price Shock (%)	S&P GSCI Index	DJ-UBS Index	TR/J CRB Index	Other Diversified Indices	Long/Short Commodity Indices
Spot	37.5%	27.0%	30.4%	33.9%	9.4%
Month 1	36.3%	25.9%	29.2%	32.8%	9.1%
Month 2	35.2%	24.9%	28.2%	31.7%	8.9%
Month 3	34.3%	24.1%	27.2%	30.7%	8.7%
Month 4	33.4%	23.3%	26.4%	29.9%	8.5%
Month 5	32.6%	22.7%	25.6%	29.1%	8.3%
Month 6	31.9%	22.1%	24.9%	28.4%	8.2%
Month 7	31.2%	21.6%	24.2%	27.7%	8.0%
Month 8	30.6%	21.1%	23.6%	27.1%	7.9%
Month 9	30.0%	20.7%	23.1%	26.6%	7.8%
Month 10	29.5%	20.3%	22.6%	26.1%	7.7%
Month 11	29.1%	20.0%	22.1%	25.6%	7.6%
Month 12	28.6%	19.6%	21.6%	25.1%	7.5%
Month 13	28.2%	19.3%	21.2%	24.7%	7.4%
Month 14	27.9%	19.1%	20.8%	24.3%	7.3%
Month 15	27.5%	18.8%	20.5%	24.0%	7.3%
Month 16	27.2%	18.6%	20.1%	23.7%	7.2%
Month 17	26.9%	18.4%	19.8%	23.4%	7.2%
Month 18	26.6%	18.2%	19.5%	23.1%	7.1%
Month 19	26.4%	18.0%	19.2%	22.8%	7.1%
Month 20	26.1%	17.8%	19.0%	22.6%	7.0%
Month 21	25.9%	17.7%	18.7%	22.3%	7.0%
Month 22	25.7%	17.5%	18.5%	22.1%	7.0%
Month 23	25.5%	17.4%	18.3%	21.9%	6.9%
Month 24	25.3%	17.3%	18.1%	21.7%	6.9%
Year 3	23.8%	16.3%	16.4%	20.1%	6.7%
Year 4	23.1%	15.9%	15.7%	19.4%	6.6%
Year 5	22.8%	15.6%	15.3%	19.0%	6.5%
Year 6	22.6%	15.5%	15.1%	18.9%	6.5%
Year 7	22.5%	15.5%	15.0%	18.8%	6.5%
Year 8	22.5%	15.4%	14.9%	18.7%	6.5%
Year 9	22.5%	15.4%	14.9%	18.7%	6.5%
Year 10-14	22.5%	15.4%	14.9%	18.7%	6.5%
Year 15-19	22.4%	15.4%	14.9%	18.7%	6.5%
Year 20+	22.4%	15.4%	14.9%	18.7%	6.5%

Absolute Vega Shock (Vol Pts)

Total Vega	18.2	13.1	14.8	16.5	4.6

Relative Vega Shock (%)

Total Vega	74.6%	100.3%	92.0%	102.5%	28.6%

2025 Exploratory Market Shock Scenario
Securitized Products

	RMBS														
	Non-Agency Prime	Sub-prime	Option ARMS	Other AltA	Unspec Non-Prime	HELOC	RMBS CDO	RMBS CDS	Credit Basket	PrimeX	ABX / TABX	Prime Whole Loans	Non-Prime Whole Loans	European RMBS	Other / Unspecified
Relative MV Shock Based on Current Rating (%)															
AAA Total															
> 9Y	-20.5%	-20.5%	-20.5%	-20.5%	-20.5%	-20.5%	-25.7%	-17.4%	-17.4%	-17.4%	-17.4%	-35.6%	-53.2%	-22.6%	-25.7%
> 6Y and <= 9Y	-22.0%	-22.1%	-22.1%	-22.1%	-22.1%	-22.1%	-27.6%	-18.8%	-18.8%	-18.7%	-18.8%	-29.8%	-41.5%	-24.2%	-27.6%
> 3Y and <= 6Y	-20.5%	-22.1%	-22.1%	-22.1%	-22.1%	-22.1%	-27.6%	-18.8%	-18.8%	-17.4%	-18.8%	-28.5%	-41.5%	-22.6%	-27.6%
<= 3Y	-22.2%	-22.2%	-22.2%	-22.2%	-22.2%	-22.2%	-27.7%	-18.8%	-18.8%	-18.8%	-18.8%	-29.9%	-41.5%	-24.4%	-27.7%
Unspecified Vintage	-22.2%	-22.2%	-22.2%	-22.2%	-22.2%	-22.2%	-27.7%	-18.8%	-18.8%	-18.8%	-18.8%	-35.6%	-53.2%	-24.4%	-27.7%
AA Total															
> 9Y	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-42.4%	-28.9%	-28.9%	-28.9%	-28.9%	-35.6%	-53.2%	-37.3%	-42.4%
> 6Y and <= 9Y	-37.7%	-38.5%	-38.5%	-38.5%	-38.5%	-38.5%	-48.1%	-32.7%	-32.7%	-32.1%	-32.7%	-29.8%	-41.5%	-41.5%	-48.1%
> 3Y and <= 6Y	-32.1%	-38.5%	-38.5%	-38.5%	-38.5%	-38.5%	-48.1%	-32.7%	-32.7%	-27.3%	-32.7%	-28.5%	-41.5%	-35.3%	-48.1%
<= 3Y	-22.2%	-38.5%	-38.5%	-38.5%	-38.5%	-38.5%	-48.1%	-32.7%	-32.7%	-18.9%	-32.7%	-29.9%	-41.5%	-24.4%	-48.1%
Unspecified Vintage	-37.7%	-38.5%	-38.5%	-38.5%	-38.5%	-38.5%	-48.1%	-32.7%	-32.7%	-32.1%	-32.7%	-35.6%	-53.2%	-41.5%	-48.1%
A Total															
> 9Y	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-42.4%	-28.9%	-28.9%	-28.9%	-28.9%	-35.6%	-53.2%	-37.3%	-42.4%
> 6Y and <= 9Y	-42.7%	-42.7%	-42.7%	-42.7%	-42.7%	-42.7%	-53.4%	-36.3%	-36.3%	-36.3%	-36.3%	-29.8%	-41.5%	-47.0%	-53.4%
> 3Y and <= 6Y	-49.3%	-49.3%	-49.3%	-49.3%	-49.3%	-49.3%	-61.7%	-41.9%	-41.9%	-41.9%	-41.9%	-28.5%	-41.5%	-54.3%	-61.7%
<= 3Y	-39.0%	-39.0%	-39.0%	-39.0%	-39.0%	-39.0%	-48.8%	-33.2%	-33.2%	-33.2%	-33.2%	-29.9%	-41.5%	-42.9%	-48.8%
Unspecified Vintage	-49.3%	-49.3%	-49.3%	-49.3%	-49.3%	-49.3%	-61.7%	-41.9%	-41.9%	-41.9%	-41.9%	-35.6%	-53.2%	-54.3%	-61.7%
BBB Total															
> 9Y	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-42.4%	-28.9%	-28.9%	-28.9%	-28.9%	-35.6%	-53.2%	-37.3%	-42.4%
> 6Y and <= 9Y	-53.2%	-53.2%	-53.2%	-53.2%	-53.2%	-53.2%	-66.5%	-45.3%	-45.3%	-45.3%	-45.3%	-29.8%	-41.5%	-58.6%	-66.5%
> 3Y and <= 6Y	-53.2%	-53.2%	-53.2%	-53.2%	-53.2%	-53.2%	-66.5%	-45.3%	-45.3%	-45.3%	-45.3%	-28.5%	-41.5%	-58.6%	-66.5%
<= 3Y	-57.9%	-57.9%	-57.9%	-57.9%	-57.9%	-57.9%	-72.4%	-49.2%	-49.2%	-49.2%	-49.2%	-29.9%	-41.5%	-63.7%	-72.4%
Unspecified Vintage	-57.9%	-57.9%	-57.9%	-57.9%	-57.9%	-57.9%	-72.4%	-49.2%	-49.2%	-49.2%	-49.2%	-35.6%	-53.2%	-63.7%	-72.4%
BB Total															
> 9Y	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-42.4%	-28.9%	-28.9%	-28.9%	-28.9%	-35.6%	-53.2%	-37.3%	-42.4%
> 6Y and <= 9Y	-63.0%	-63.0%	-63.0%	-63.0%	-63.0%	-63.0%	-78.7%	-53.5%	-53.5%	-53.5%	-53.5%	-29.8%	-41.5%	-69.3%	-78.7%
> 3Y and <= 6Y	-63.0%	-63.0%	-63.0%	-63.0%	-63.0%	-63.0%	-78.7%	-53.5%	-53.5%	-53.5%	-53.5%	-28.5%	-41.5%	-69.3%	-78.7%
<= 3Y	-58.1%	-58.1%	-58.1%	-58.1%	-58.1%	-58.1%	-72.6%	-49.4%	-49.4%	-49.4%	-49.4%	-29.9%	-41.5%	-63.9%	-72.6%
Unspecified Vintage	-63.0%	-63.0%	-63.0%	-63.0%	-63.0%	-63.0%	-78.7%	-53.5%	-53.5%	-53.5%	-53.5%	-35.6%	-53.2%	-69.3%	-78.7%
B Total															
> 9Y	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-34.0%	-42.4%	-28.9%	-28.9%	-28.9%	-28.9%	-35.6%	-53.2%	-37.3%	-42.4%
> 6Y and <= 9Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-29.8%	-41.5%	-85.0%	-85.0%
> 3Y and <= 6Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-28.5%	-41.5%	-85.0%	-85.0%
<= 3Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-29.9%	-41.5%	-85.0%	-85.0%
Unspecified Vintage	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-35.6%	-53.2%	-85.0%	-85.0%
<B Total															
> 9Y	-39.5%	-48.4%	-48.4%	-48.4%	-48.4%	-48.4%	-60.5%	-41.1%	-41.1%	-33.5%	-41.1%	-35.6%	-53.2%	-43.4%	-60.5%
> 6Y and <= 9Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-29.8%	-41.5%	-85.0%	-85.0%
> 3Y and <= 6Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-28.5%	-41.5%	-85.0%	-85.0%
<= 3Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-29.9%	-41.5%	-85.0%	-85.0%
Unspecified Vintage	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-35.6%	-53.2%	-85.0%	-85.0%
NR Total															
> 9Y	-39.5%	-48.4%	-48.4%	-48.4%	-48.4%	-48.4%	-60.5%	-41.1%	-41.1%	-33.5%	-41.1%	-35.6%	-53.2%	-43.4%	-60.5%
> 6Y and <= 9Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-29.8%	-41.5%	-85.0%	-85.0%
> 3Y and <= 6Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-28.5%	-41.5%	-85.0%	-85.0%
<= 3Y	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-29.9%	-41.5%	-85.0%	-85.0%
Unspecified Vintage	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-85.0%	-73.3%	-73.3%	-73.3%	-73.3%	-35.6%	-53.2%	-85.0%	-85.0%

2025 Exploratory Market Shock Scenario
Securitized Products

	ABS							CMBS						
	Autos	Credit Cards	Student Loans	ABS CDS	Credit Basket	Index Tranches	Other / Unspecified	Cash Non-Agency CMBS	CMBS CDS	CMBS CDO	Credit Basket	Index Tranches	Whole Loans	Other / Unspecified
Relative MV Shock Based														
AAA Total														
> 9Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-10.9%	-9.2%	-13.6%	-9.2%	-9.2%	-28.7%	-13.6%
> 6Y and <= 9Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-10.9%	-9.2%	-13.6%	-9.2%	-9.2%	-28.7%	-13.6%
> 3Y and <= 6Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-24.3%	-20.6%	-30.3%	-20.6%	-20.6%	-39.4%	-30.3%
<= 3Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-23.5%	-20.0%	-29.4%	-20.0%	-20.0%	-38.8%	-29.4%
Unspecified Vintage	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-24.3%	-20.6%	-30.3%	-20.6%	-20.6%	-39.4%	-30.3%
AA Total														
> 9Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-34.2%	-29.1%	-42.8%	-29.1%	-29.1%	-28.7%	-42.8%
> 6Y and <= 9Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-34.2%	-29.1%	-42.8%	-29.1%	-29.1%	-28.7%	-42.8%
> 3Y and <= 6Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-48.1%	-40.9%	-60.2%	-40.9%	-40.9%	-39.4%	-60.2%
<= 3Y	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-43.0%	-36.5%	-53.8%	-36.5%	-36.5%	-38.8%	-53.8%
Unspecified Vintage	-14.4%	-5.4%	-15.1%	-15.1%	-15.1%	-15.1%	-15.1%	-48.1%	-40.9%	-60.2%	-40.9%	-40.9%	-39.4%	-60.2%
A Total														
> 9Y	-15.6%	-6.6%	-16.3%	-16.3%	-16.3%	-16.3%	-16.3%	-63.7%	-54.2%	-79.7%	-54.2%	-54.2%	-28.7%	-79.7%
> 6Y and <= 9Y	-15.6%	-6.6%	-16.3%	-16.3%	-16.3%	-16.3%	-16.3%	-48.5%	-41.2%	-60.7%	-41.2%	-41.2%	-28.7%	-60.7%
> 3Y and <= 6Y	-15.6%	-6.6%	-16.3%	-16.3%	-16.3%	-16.3%	-16.3%	-60.8%	-51.7%	-76.0%	-51.7%	-51.7%	-39.4%	-76.0%
<= 3Y	-15.6%	-6.6%	-16.3%	-16.3%	-16.3%	-16.3%	-16.3%	-60.8%	-51.7%	-76.0%	-51.7%	-51.7%	-38.8%	-76.0%
Unspecified Vintage	-15.6%	-6.6%	-16.3%	-16.3%	-16.3%	-16.3%	-16.3%	-63.7%	-54.2%	-79.7%	-54.2%	-54.2%	-39.4%	-79.7%
BBB Total														
> 9Y	-23.8%	-15.8%	-24.4%	-24.4%	-24.4%	-24.4%	-24.4%	-76.4%	-64.9%	-85.0%	-64.9%	-64.9%	-28.7%	-85.0%
> 6Y and <= 9Y	-23.8%	-15.8%	-24.4%	-24.4%	-24.4%	-24.4%	-24.4%	-59.4%	-50.4%	-74.2%	-50.4%	-50.4%	-28.7%	-74.2%
> 3Y and <= 6Y	-23.8%	-15.8%	-24.4%	-24.4%	-24.4%	-24.4%	-24.4%	-74.2%	-63.0%	-85.0%	-63.0%	-63.0%	-39.4%	-85.0%
<= 3Y	-23.8%	-15.8%	-24.4%	-24.4%	-24.4%	-24.4%	-24.4%	-64.8%	-55.1%	-81.0%	-55.1%	-55.1%	-38.8%	-81.0%
Unspecified Vintage	-23.8%	-15.8%	-24.4%	-24.4%	-24.4%	-24.4%	-24.4%	-76.4%	-64.9%	-85.0%	-64.9%	-64.9%	-39.4%	-85.0%
BB Total														
> 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-76.4%	-64.9%	-85.0%	-64.9%	-64.9%	-28.7%	-85.0%
> 6Y and <= 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-77.4%	-65.8%	-85.0%	-65.8%	-65.8%	-28.7%	-85.0%
> 3Y and <= 6Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-81.7%	-69.4%	-85.0%	-69.4%	-69.4%	-39.4%	-85.0%
<= 3Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-64.8%	-55.1%	-81.0%	-55.1%	-55.1%	-38.8%	-81.0%
Unspecified Vintage	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-81.7%	-69.4%	-85.0%	-69.4%	-69.4%	-39.4%	-85.0%
B Total														
> 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-73.4%	-85.0%	-73.4%	-73.4%	-28.7%	-85.0%
> 6Y and <= 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-83.9%	-71.3%	-85.0%	-71.3%	-71.3%	-28.7%	-85.0%
> 3Y and <= 6Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-39.4%	-85.0%
<= 3Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-38.8%	-85.0%
Unspecified Vintage	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-39.4%	-85.0%
<B Total														
> 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-73.4%	-85.0%	-73.4%	-73.4%	-28.7%	-85.0%
> 6Y and <= 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-73.5%	-85.0%	-73.5%	-73.5%	-28.7%	-85.0%
> 3Y and <= 6Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-39.4%	-85.0%
<= 3Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-38.8%	-85.0%
Unspecified Vintage	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-39.4%	-85.0%
NR Total														
> 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-73.4%	-85.0%	-73.4%	-73.4%	-28.7%	-85.0%
> 6Y and <= 9Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-73.5%	-85.0%	-73.5%	-73.5%	-28.7%	-85.0%
> 3Y and <= 6Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-39.4%	-85.0%
<= 3Y	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-38.8%	-85.0%
Unspecified Vintage	-42.1%	-35.9%	-42.5%	-42.5%	-42.5%	-42.5%	-42.5%	-85.0%	-77.9%	-85.0%	-77.9%	-77.9%	-39.4%	-85.0%

2025 Exploratory Market Shock Scenario
Securitized Products

	Corporate CDO / CLO		Warehouse		
	CLO	Other / Unspecified	Total Size	Total Protection	Other / Unspecified
Relative MV Shock Based					
AAA Total					
> 9Y	-15.2%	-15.2%	-53.2%	53.2%	-25.7%
> 6Y and <= 9Y	-20.5%	-20.5%	-41.5%	41.5%	-27.6%
> 3Y and <= 6Y	-19.5%	-19.5%	-41.5%	41.5%	-30.3%
<= 3Y	-26.9%	-26.9%	-41.5%	41.5%	-29.4%
Unspecified Vintage	-26.9%	-26.9%	-53.2%	53.2%	-30.3%
AA Total					
> 9Y	-32.2%	-32.2%	-53.2%	53.2%	-42.8%
> 6Y and <= 9Y	-38.8%	-38.8%	-41.5%	41.5%	-48.1%
> 3Y and <= 6Y	-37.5%	-37.5%	-41.5%	41.5%	-60.2%
<= 3Y	-44.5%	-44.5%	-41.5%	41.5%	-53.8%
Unspecified Vintage	-44.5%	-44.5%	-53.2%	53.2%	-60.2%
A Total					
> 9Y	-41.3%	-41.3%	-53.2%	53.2%	-79.7%
> 6Y and <= 9Y	-45.9%	-45.9%	-41.5%	41.5%	-60.7%
> 3Y and <= 6Y	-42.6%	-42.6%	-41.5%	41.5%	-76.0%
<= 3Y	-54.7%	-54.7%	-41.5%	41.5%	-76.0%
Unspecified Vintage	-54.7%	-54.7%	-53.2%	53.2%	-79.7%
BBB Total					
> 9Y	-44.7%	-44.7%	-53.2%	53.2%	-85.0%
> 6Y and <= 9Y	-48.4%	-48.4%	-41.5%	41.5%	-74.2%
> 3Y and <= 6Y	-47.2%	-47.2%	-41.5%	41.5%	-85.0%
<= 3Y	-57.2%	-57.2%	-41.5%	41.5%	-81.0%
Unspecified Vintage	-57.2%	-57.2%	-53.2%	53.2%	-85.0%
BB Total					
> 9Y	-64.1%	-64.1%	-53.2%	53.2%	-85.0%
> 6Y and <= 9Y	-70.4%	-70.4%	-41.5%	41.5%	-85.0%
> 3Y and <= 6Y	-70.1%	-70.1%	-41.5%	41.5%	-85.0%
<= 3Y	-70.4%	-70.4%	-41.5%	41.5%	-81.0%
Unspecified Vintage	-70.4%	-70.4%	-53.2%	53.2%	-85.0%
B Total					
> 9Y	-72.5%	-72.5%	-53.2%	53.2%	-85.0%
> 6Y and <= 9Y	-72.6%	-72.6%	-41.5%	41.5%	-85.0%
> 3Y and <= 6Y	-76.1%	-76.1%	-41.5%	41.5%	-85.0%
<= 3Y	-78.5%	-78.5%	-41.5%	41.5%	-85.0%
Unspecified Vintage	-78.5%	-78.5%	-53.2%	53.2%	-85.0%
<B Total					
> 9Y	-85.0%	-85.0%	-53.2%	53.2%	-85.0%
> 6Y and <= 9Y	-85.0%	-85.0%	-41.5%	41.5%	-85.0%
> 3Y and <= 6Y	-85.0%	-85.0%	-41.5%	41.5%	-85.0%
<= 3Y	-85.0%	-85.0%	-41.5%	41.5%	-85.0%
Unspecified Vintage	-85.0%	-85.0%	-53.2%	53.2%	-85.0%
NR Total					
> 9Y	-85.0%	-85.0%	-53.2%	53.2%	-85.0%
> 6Y and <= 9Y	-85.0%	-85.0%	-41.5%	41.5%	-85.0%
> 3Y and <= 6Y	-85.0%	-85.0%	-41.5%	41.5%	-85.0%
<= 3Y	-85.0%	-85.0%	-41.5%	41.5%	-85.0%
Unspecified Vintage	-85.0%	-85.0%	-53.2%	53.2%	-85.0%

2025 Exploratory Market Shock Scenario

Agencies

	OAS Widening (bps)
US Residential Agency Products	
IOs	370.0
POs	45.0
Other CMOs	82.0
Pass-Throughs	82.0
Agency Debt/Debentures	55.0
IOS Index	370.0
POS Index	45.0
MBX Index	62.0
Other Agency Derivatives	55.0
TBA's	62.0
Reverse Mortgages	82.0
Residential Other / Unspecified	62.0
US Commercial Agency Products	
Cash Agency CMBS	94.0
Agency CMBS Derivatives	94.0
Commercial Other / Unspecified	94.0
Non-US Agency Products	
AAA	174.0
AA	221.0
A	274.0
BBB	327.0
BB	358.0
B	499.0
<B	1,852.0
NR	1,852.0

2025 Exploratory Market Shock Scenario

Munis

Bonds

	Relative MV Shock (%)	Spread Widening (bps)
AAA		258.7
AA		269.1
A		279.8
BBB		321.9
BB		601.9
B		802.8
<B: Defaulted	-24.2%	
<B: Not Defaulted		1,163.7
<B: Default Status Unknown		1,163.7
NR		1,163.7

Loans

	Relative MV Shock (%)	Spread Widening (bps)
AAA		258.7
AA		269.1
A		279.8
BBB		321.9
BB		601.9
B		802.8
<B: Defaulted	-24.2%	
<B: Not Defaulted		1,163.7
<B: Default Status Unknown		1,163.7
NR		1,163.7

CDS

	Relative MV Shock (%)	Spread Widening (bps)
AAA		258.7
AA		269.1
A		279.8
BBB		321.9
BB		601.9
B		802.8
<B: Defaulted	-24.2%	
<B: Not Defaulted		1,163.7
<B: Default Status Unknown		1,163.7
NR		1,163.7

Indices

	Relative MV Shock (%)	Spread Widening (bps)
AAA		258.7
AA		269.1
A		279.8
BBB		321.9
BB		601.9
B		802.8
<B: Defaulted	-24.2%	
<B: Not Defaulted		1,163.7
<B: Default Status Unknown		1,163.7
NR		1,163.7

Other / Unspecified Munis

	Relative MV Shock (%)	Spread Widening (bps)
AAA		258.7
AA		269.1
A		279.8
BBB		321.9
BB		601.9
B		802.8
<B: Defaulted	-24.2%	
<B: Not Defaulted		1,163.7
<B: Default Status Unknown		1,163.7
NR		1,163.7

2025 Exploratory Market Shock Scenario

Auction Rate Securities (ARS)

	Relative MV Shock (%)
Student Loan Auction Rate Securities (SLARS)	
AAA	-35.3%
AA	-40.8%
A	-46.3%
BBB	-51.8%
BB	-52.2%
B	-62.9%
<B	-73.7%
NR	-73.7%
Municipal Auction Rate Securities (MARS)	
AAA	-42.3%
AA	-48.9%
A	-55.5%
BBB	-62.1%
BB	-65.3%
B	-78.6%
<B	-92.1%
NR	-92.1%
Auction Rate Preferred Securities (ARPS)	
AAA	-28.2%
AA	-32.6%
A	-37.0%
BBB	-41.4%
BB	-52.2%
B	-62.9%
<B	-73.7%
NR	-73.7%
Credit Card Auction Rate Securities (CARS)	
AAA	-28.2%
AA	-32.6%
A	-37.0%
BBB	-41.4%
BB	-52.2%
B	-62.9%
<B	-73.7%
NR	-73.7%
Other / Unspecified Auction Rate Securities	
AAA	-42.3%
AA	-48.9%
A	-55.5%
BBB	-62.1%
BB	-65.3%
B	-78.6%
<B	-92.1%
NR	-92.1%

2025 Exploratory Market Shock Scenario

Corporate Credit-Advanced Economies

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
Bonds			
AAA		496.2%	183.6
AA		377.3%	211.3
A		354.9%	273.3
BBB		322.8%	368.0
BB		338.0%	730.1
B		318.1%	1,036.9
<B: Defaulted	-40.9%		
<B: Not Defaulted		171.5%	1,488.2
<B: Default Status Unknown	-40.9%	171.5%	1,488.2
NR	-40.9%	171.5%	1,488.2
Loans			
AAA	-5.6%		
AA	-6.5%		
A	-8.4%		
BBB	-11.3%		
BB	-22.3%		
B	-31.7%		
<B: Defaulted	-32.8%		
<B: Not Defaulted	-32.8%		
<B: Default Status Unknown	-32.8%		
NR	-32.8%		
Single Name CDS			
AAA		265.4%	36.6
AA		195.8%	64.0
A		187.1%	87.1
BBB		187.7%	126.3
BB		159.3%	276.1
B		139.4%	431.8
<B: Defaulted	-13.5%		
<B: Not Defaulted		63.4%	507.3
<B: Default Status Unknown	-13.5%	63.4%	507.3
NR	-13.5%	63.4%	507.3
Loan CDS			
AAA	-1.8%		
AA	-2.1%		
A	-2.7%		
BBB	-3.7%		
BB	-7.3%		
B	-10.4%		
<B: Defaulted	-10.8%		
<B: Not Defaulted	-10.8%		
<B: Default Status Unknown	-10.8%		
NR	-10.8%		
Covered Bonds			
AAA		216.5%	88.7
AA		164.5%	102.0
A		154.8%	132.0
BBB		140.8%	177.7
BB		147.4%	352.5
B		138.7%	500.6
<B: Defaulted	-19.8%		
<B: Not Defaulted		74.8%	718.5
<B: Default Status Unknown	-19.8%	74.8%	718.5
NR	-19.8%	74.8%	718.5

2025 Exploratory Market Shock Scenario

Corporate Credit-Advanced Economies

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
Indices			
CDX IG (Series 9)			
CDX IG (On the run)		224.0%	115.8
CDX IG (Other Series)		224.0%	115.8
CDX HY		109.2%	357.6
CDX Other		124.9%	236.7
iTraxx Main		245.6%	139.3
iTraxx XO		159.1%	489.9
iTraxx Other		172.6%	314.6
Loan Indices			
Index Tranches			
CDX IG (Series 9)			
CDX IG (On the run)		224.0%	115.8
CDX IG (Other Series)		224.0%	115.8
CDX HY		109.2%	357.6
CDX Other		124.9%	236.7
iTraxx Main		245.6%	139.3
iTraxx XO		159.1%	489.9
iTraxx Other		172.6%	314.6
Loan Indices			
Index Options			
CDX IG (Series 9)			
CDX IG (On the run)		224.0%	115.8
CDX IG (Other Series)		224.0%	115.8
CDX HY		109.2%	357.6
CDX Other		124.9%	236.7
iTraxx Main		245.6%	139.3
iTraxx XO		159.1%	489.9
iTraxx Other		172.6%	314.6
Loan Indices			
Other / Unspecified			
AAA		248.1%	91.8
AA		188.6%	105.6
A		177.5%	136.7
BBB		161.4%	184.0
BB		169.0%	365.1
B		159.0%	518.5
<B: Defaulted	-20.5%		
<B: Not Defaulted		85.7%	744.1
<B: Default Status Unknown	-20.5%	85.7%	744.1
NR	-20.5%	85.7%	744.1

2025 Exploratory Market Shock Scenario

Corporate Credit-Emerging Markets

Bonds

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
AAA		433.6%	227.9
AA		228.4%	262.2
A		223.4%	339.2
BBB		216.8%	456.6
BB		299.1%	906.0
B		287.2%	1,286.7
<B: Defaulted	-43.1%		
<B: Not Defaulted		219.9%	1,846.7
<B: Default Status Unknown	-43.1%	219.9%	1,846.7
NR	-43.1%	219.9%	1,846.7

Loans

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
AAA	-7.0%		
AA	-8.0%		
A	-10.4%		
BBB	-14.0%		
BB	-24.7%		
B	-33.8%		
<B: Defaulted	-35.0%		
<B: Not Defaulted	-35.0%		
<B: Default Status Unknown	-35.0%		
NR	-35.0%		

Single Name CDS

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
AAA		382.4%	74.9
AA		128.5%	86.1
A		121.3%	111.4
BBB		120.6%	150.0
BB		122.5%	297.6
B		99.3%	422.7
<B: Defaulted	-14.2%		
<B: Not Defaulted		81.2%	629.5
<B: Default Status Unknown	-14.2%	81.2%	629.5
NR	-14.2%	81.2%	629.5

Loan CDS

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
AAA	-2.3%		
AA	-2.6%		
A	-3.4%		
BBB	-4.6%		
BB	-8.1%		
B	-11.1%		
<B: Defaulted	-11.5%		
<B: Not Defaulted	-11.5%		
<B: Default Status Unknown	-11.5%		
NR	-11.5%		

Covered Bonds

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
AAA		189.0%	110.0
AA		99.6%	126.6
A		97.4%	163.8
BBB		94.5%	220.5
BB		130.4%	437.4
B		125.2%	621.2
<B: Defaulted	-20.8%		
<B: Not Defaulted		95.9%	891.6
<B: Default Status Unknown	-20.8%	95.9%	891.6
NR	-20.8%	95.9%	891.6

2025 Exploratory Market Shock Scenario
Corporate Credit-Emerging Markets

	Relative MV Shock (%)	Spread Widening (%)	Spread Widening (bps)
Indices			
CDX EM	[redacted]	197.5%	322.7
CDX Latam Corp	[redacted]	111.5%	258.8
CDX Other	[redacted]	111.5%	258.8
iTraxx Asia IG	[redacted]	194.8%	139.7
iTraxx Asia HY	[redacted]	[redacted]	[redacted]
iTraxx CEEMEA Corp	[redacted]	391.1%	258.8
iTraxx Other	[redacted]	194.8%	139.7
Loan Indices	[redacted]	101.5%	254.0
Index Tranches			
CDX EM	[redacted]	197.5%	322.7
CDX Latam Corp	[redacted]	111.5%	258.8
CDX Other	[redacted]	111.5%	258.8
iTraxx Asia IG	[redacted]	194.8%	139.7
iTraxx Asia HY	[redacted]	[redacted]	[redacted]
iTraxx CEEMEA Corp	[redacted]	391.1%	258.8
iTraxx Other	[redacted]	194.8%	139.7
Loan Indices	[redacted]	101.5%	254.0
Index Options			
CDX EM	[redacted]	197.5%	322.7
CDX Latam Corp	[redacted]	111.5%	258.8
CDX Other	[redacted]	111.5%	258.8
iTraxx Asia IG	[redacted]	194.8%	139.7
iTraxx Asia HY	[redacted]	[redacted]	[redacted]
iTraxx CEEMEA Corp	[redacted]	391.1%	258.8
iTraxx Other	[redacted]	194.8%	139.7
Loan Indices	[redacted]	101.5%	254.0
Other / Unspecified			
AAA	[redacted]	216.7%	113.9
AA	[redacted]	114.2%	131.1
A	[redacted]	111.7%	169.6
BBB	[redacted]	108.4%	228.3
BB	[redacted]	149.5%	453.0
B	[redacted]	143.6%	643.3
<B: Defaulted	-21.6%	[redacted]	[redacted]
<B: Not Defaulted	[redacted]	109.9%	923.3
<B: Default Status Unknown	-21.6%	109.9%	923.3
NR	-21.6%	109.9%	923.3

2025 Exploratory Market Shock Scenario

Sovereign Credit

	Spread Widening (%)	Spread Widening (bps)
Australia	582.6%	65.7
Austria	464.1%	62.0
Belgium	410.4%	81.5
Canada	173.7%	71.1
Cyprus	678.5%	221.5
Denmark	379.1%	34.4
Estonia	165.9%	97.2
Finland	228.5%	42.3
France	249.3%	83.8
Germany	649.4%	60.2
Greece	360.8%	221.5
Ireland	633.8%	120.1
Italy	516.7%	312.4
Japan	255.4%	49.5
Malta	302.3%	98.7
Netherlands	495.1%	47.2
New Zealand	582.6%	65.7
Norway	193.9%	18.1
Portugal	762.1%	234.7
Slovakia	149.3%	45.6
Slovenia	149.3%	45.6
Spain	669.6%	218.6
Sweden	368.5%	36.3
Switzerland	1002.8%	60.2
United Kingdom	439.1%	82.0
United States	173.7%	71.1
Other	318.2%	98.0
Bulgaria	140.9%	126.9
Croatia	213.1%	175.2
Czech Republic	133.4%	43.1
Hungary	194.2%	233.3
Iceland	76.8%	50.6
Latvia	171.2%	100.3
Lithuania	155.8%	94.0
Poland	161.2%	111.4
Romania	141.5%	205.6
Russia	116.1%	1,846.7
Ukraine	45.6%	1,846.7
Other	488.1%	439.5

2025 Exploratory Market Shock Scenario

Sovereign Credit

	Spread Widening (%)	Spread Widening (bps)
Argentina	93.7%	1,846.7
Brazil	227.8%	352.9
Chile	250.3%	143.0
Colombia	172.4%	326.2
Mexico	209.2%	245.6
Panama	147.7%	235.6
Peru	309.9%	239.9
Venezuela	19.6%	1,846.7
Other	557.6%	654.6
China	266.4%	166.9
Hong Kong	117.1%	40.2
India	439.3%	199.7
Indonesia	466.4%	323.4
Kazakhstan	200.8%	208.7
Malaysia	531.9%	209.4
Philippines	467.3%	275.0
Singapore	563.4%	174.0
South Korea	435.7%	139.5
Taiwan	563.4%	174.0
Thailand	427.7%	157.2
Vietnam	288.3%	287.6
Other	188.9%	196.3
Bahrain	84.4%	158.7
Dubai	340.8%	221.7
Egypt	60.6%	367.3
Israel	41.1%	67.9
Jordan	40.0%	142.0
Kuwait	213.5%	138.9
Lebanon	17.6%	1,846.7
Qatar	223.9%	97.8
Saudi Arabia	148.9%	97.1
Turkey	187.7%	499.0
United Arab Emirates	340.8%	221.7
Other	539.2%	350.8
Nigeria	59.7%	362.1
South Africa	199.1%	356.8
Other	59.3%	359.4
Supranationals	147.3%	60.3

2025 Exploratory Market Shock Scenario

Credit Correlation

Absolute Change in Correlations (Pts) (e.g. 1.00 = from 75% to 76%)

CDX IG	3Y	5Y	7Y	10Y	Other
3%	13.0	13.0	13.0	13.0	13.0
7%	15.0	15.0	15.0	15.0	15.0
10%	17.0	17.0	17.0	17.0	17.0
15%	19.0	19.0	19.0	19.0	19.0
30%	21.0	21.0	21.0	21.0	21.0

CDX HY	3Y	5Y	7Y	10Y	Other
10%	13.0	13.0	13.0	13.0	13.0
15%	15.0	15.0	15.0	15.0	15.0
25%	17.0	17.0	17.0	17.0	17.0
35%	19.0	19.0	19.0	19.0	19.0

CDX Other	3Y	5Y	7Y	10Y	Other
Equity	17.0	17.0	17.0	17.0	17.0
Mezzanine	17.0	17.0	17.0	17.0	17.0

iTraxx Main	3Y	5Y	7Y	10Y	Other
3%	15.0	15.0	15.0	15.0	15.0
6%	17.0	17.0	17.0	17.0	17.0
9%	19.0	19.0	19.0	19.0	19.0
12%	21.0	21.0	21.0	21.0	21.0
22%	23.0	23.0	23.0	23.0	23.0

iTraxx XO	3Y	5Y	7Y	10Y	Other
10%	15.0	15.0	15.0	15.0	15.0
15%	17.0	17.0	17.0	17.0	17.0
25%	19.0	19.0	19.0	19.0	19.0
35%	21.0	21.0	21.0	21.0	21.0

iTraxx Other	3Y	5Y	7Y	10Y	Other
Equity	19.0	19.0	19.0	19.0	19.0
Mezzanine	19.0	19.0	19.0	19.0	19.0

Loan Indices	3Y	5Y	7Y	10Y	Other
8%	19.0	19.0	19.0	19.0	19.0
15%	19.0	19.0	19.0	19.0	19.0
30%	19.0	19.0	19.0	19.0	19.0

2025 Exploratory Market Shock Scenario

Other Fair Value Assets (GICS-Based Data Input)

Sector	GICS Code	Industry Group	Relative Fair Value Shock (%)			
			United States		Non-US	
			Equity	Debt	Equity	Debt
Energy	**1010**	**Energy**	-54.8%	-21.9%	-54.8%	-21.9%
Materials	**1510**	**Materials**	-57.9%	-23.2%	-58.7%	-23.5%
Industrials	2010	Capital Goods	-57.0%	-22.8%	-57.0%	-22.8%
Industrials	2020	Commercial & Professional Services	-53.8%	-21.5%	-53.8%	-21.5%
Industrials	2030	Transportation	-55.1%	-22.0%	-54.6%	-21.8%
Industrials	20	Unspecified	-57.0%	-22.8%	-57.0%	-22.8%
Consumer Discretionary	2510	Automobiles & Components	-58.6%	-23.4%	-58.6%	-29.3%
Consumer Discretionary	2520	Consumer Durables & Apparel	-54.3%	-22.4%	-55.9%	-27.2%
Consumer Discretionary	2530	Consumer Services	-52.5%	-21.5%	-53.8%	-26.3%
Consumer Discretionary	2550	Retailing	-50.8%	-21.2%	-53.0%	-25.4%
Consumer Discretionary	25	Unspecified	-51.8%	-22.3%	-55.8%	-25.9%
Consumer Staples	3010	Food & Staples Retailing	-48.4%	-12.1%	-49.6%	-19.8%
Consumer Staples	3020	Food, Beverage & Tobacco	-48.4%	-12.1%	-49.6%	-19.8%
Consumer Staples	3030	Household & Personal Products	-48.5%	-12.1%	-49.1%	-19.7%
Consumer Staples	30	Unspecified	-48.4%	-12.1%	-49.6%	-19.8%
Health Care	3510	Health Care Equipment & Svcs	-49.9%	-9.1%	-49.7%	-19.9%
Health Care	3520	Pharma., Bio. & Life Sciences	-49.9%	-9.1%	-49.7%	-19.9%
Health Care	35	Unspecified	-50.0%	-9.1%	-49.8%	-19.9%
Financials (excl Real Estate)	4010	Banks	-58.0%	-23.2%	-58.0%	-23.2%
Financials (excl Real Estate)	4020	Diversified Financials	-58.0%	-23.2%	-58.0%	-23.2%
Financials (excl Real Estate)	4030	Insurance	-56.9%	-22.8%	-56.9%	-22.8%
Financials (excl Real Estate)		Unspecified	-58.0%	-23.2%	-58.0%	-23.2%
Information Technology	4510	Software & Services	-51.0%	-23.0%	-52.0%	-26.0%
Information Technology	4520	Technology Hardware & Equipment	-50.8%	-22.9%	-53.7%	-26.8%
Information Technology	4530	Semicondt. & Semicondt. Equip.	-50.8%	-22.9%	-53.7%	-26.8%
Information Technology	45	Unspecified	-51.7%	-23.3%	-53.7%	-26.9%
Communication Services	5010	Telecommunication Services	-51.0%	-23.0%	-52.0%	-26.0%
Communication Services	5020	Media & Entertainment	-52.5%	-26.3%	-53.8%	-21.5%
Communication Services	50	Unspecified	-51.0%	-23.0%	-52.0%	-26.0%
Utilities	**5510**	**Utilities**	-50.1%	-6.5%	-50.9%	-8.1%
Real Estate	**6010**	**Real Estate**	-58.8%	-23.5%	-58.8%	-23.5%
Tax Credits	N/A	Section 42 Housing Credits	-4.9%			
Tax Credits	N/A	Section 45 Alternative Energy Investments	-13.9%			
Tax Credits	N/A	Other Tax Credits	-4.9%	-4.9%	-3.5%	-3.5%
Unspecified Sector/Industry	Unsp	Other Unspecified Sector/Industry	-53.1%	-12.7%	-53.9%	-6.3%