PART I: INSTRUCTIONS ON CALCULATION OF MINIMUM CAPITAL REQUIREMENTS BASED ON RISK WEIGHTED ASSETS

1. No Bank/DFI incorporated in Pakistan shall commence and carry on its business unless it has a minimum paid up capital (net of losses) of Rs 2 billion by the end of the transitional arrangement as allowed under Para 3 below. Similarly, no banking company incorporated outside Pakistan shall commence and carry on banking business in Pakistan unless it has a minimum assigned capital (net of losses) of Rs 2 billion by the end of said transitional arrangement.

2. No Bank/DFI shall carry on its business in Pakistan unless it maintains capital and unencumbered general reserves the amount of which is at least 8% of the risk weighted assets of the banking company, both on consolidated as well as on stand alone basis. For the purpose, subsidiary companies engaged in banking and financial activities (excluding insurance) should be consolidated.

3. TRANSITIONAL ARRANGEMENT:

Banks/DFIs that have paid up capital below Rs 2 billion are allowed to gradually raise their paid up capital to Rs 2 billion within the time frame given below.

Date	Required Minimum Paid up capital (free of losses)
By 31.12.2004	Rs 1.5 billion
BY 31.12.2005	Rs 2.0 billion

4. DEFINITION OF CAPITAL:

For the purpose of this capital adequacy framework, banks/DFIs shall classify their entire capital into three tiers as follows:

a. Tier 1 or Core capital: Tier 1 capital shall comprise of highest quality capital elements and will include;

i. Fully paid up capital / capital deposited with SBP*
ii. Balance in share premium account
iii. Reserve for Bonus Shares
iv. General Reserves as disclosed on the balance-sheet
v. Un-appropriated / un-remitted* profits (net of accumulated losses, if any)

* in the case of foreign banks operating in Pakistan.

b. Tier 2 Supplementary Capital: The tier 2 capital shall include;

i. General Provisions or General Reserves for loan losses
ii. Revaluation Reserves
iii. Exchange translation Reserves
iv. Undisclosed Reserves
v. Subordinated debt.

c. **Tier 3 Supplementary Capital:** The tier 3 capital consisting of short-term subordinated debt would be solely for the purpose of meeting a proportion of the capital requirements for market risks.

5. Eligibility Criteria:

The computation of the amount of Core (tier 1) and Supplementary (tie 2 and tier 3) Capitals shall be subject to the following limitations and restrictions: -

a. The sum total of the different components of the tier 2 and tier 3 Capital will be limited to the sum total of the various components of the tier 1 or Core Capital.

b. General Provisions or General Reserves for loan losses shall include only such provisions which are not created against identified losses and are as such freely available to meet unidentified losses. These provisions or reserves will be limited to maximum of 1.25% of total Risk Weighted Assets.

c. Revaluation Reserves shall be the Reserves created by revaluation of fixed assets and equity instruments held by the bank/DFI. The assets and investments must be prudently valued fully taking into account the possibility of price fluctuations and forced sale. Revaluation reserves reflecting the difference between the book value and the market value will be eligible upto 50% for treatment as Supplementary Capital subject to the condition that the reasonableness of the revalued amount is duly certified by the external auditors of the banking company. Besides, banks/DFIs are allowed to include foreign exchange translation reserves in their tier 2 supplementary capital.

d. Undisclosed Reserves will be permitted to be included in the Supplementary Capital despite being unpublished, provided they appear in the internal accounts of the bank/DFI and have basically arisen out of the earnings of the institution duly certified by the External Auditors and are accepted as such by the State Bank. To be eligible to be shown as part of the Supplementary Capital, the Undisclosed Reserves should not be encumbered by any provision or known liability and should be freely available to meet unforeseen losses.

e. Subordinated debt will be limited to a maximum of 50% of the amount of tier 1 capital and will also include rated and listed subordinated debt instruments (like TFCs/Bonds) raised in the capital market. To be eligible for inclusion in the supplementary capital, the instrument should be fully paid up, unsecured, subordinated as to payment of principal and profit to all other indebtedness of the bank including deposits, and should not be redeemable before maturity without prior approval of the SBP. Further it should be subject to a lock-in clause, stipulating that neither interest nor principal may be paid (even at maturity) if such payment means that the bank falls below or remains below its minimum capital requirement

f. The tier 3 capital shall be solely for the purpose of capital requirement for market risk. This means that any capital requirement arising out of credit and counterparty risk, including counterparty risk in respect of derivatives in both trading and banking books, needs to be met by the eligible tier 1 and tier 2 capital.

g. Tier 3 capital will be limited to 250% of a bank's tier 1 capital that is available (after meeting credit risk capital requirement) to support market risk. This means that a minimum of about 28½% of market risk needs to be supported by tier 1 capital that is not required to support risks in the remainder of the book. For instance, if a bank has tier 1 capital of Rs 100 and the capital requirement for credit risk is Rs 90, the remaining tier 1 capital of Rs 10 is available for market risk and thus the bank can have maximum eligible tier 3 capital of Rs 25 (250% of 10).

h. Tier 2 elements may be substituted for tier 3 up to the same limit of 250% in so far as the overall limits prescribed in ' a' and 'e' above is not breached, that is to say eligible tier 2 and tier 3 capitals may not exceed total tier 1 capital, and subordinated debt may not exceed 50% of tier 1 capital.

i. For short-term subordinated debt to be eligible as tier 3 capital, it needs, if circumstances demand, to be capable of becoming part of a bank's permanent capital and thus be available to absorb losses in the event of insolvency. It must, therefore, at a minimum:

i) Be unsecured, subordinated and fully paid up;
ii) Have an original maturity of at least two years and is not repayable before the agreed repayment date without approval of SBP.

j. The banks before issuing any subordinated debt instruments (like TFCs/Bonds), to qualify for inclusion in supplementary (Tier-2 or Tier 3) capital, will be required to obtain prior approval of the State Bank.

6. RULES FOR UNSECURED SUBORDINATED DEBT INSTRUMENTS:

a. Terms of Issue

To be eligible for inclusion in supplementary capital the terms of issue of the subordinated debt instruments should be in conformity with the following:

b. Amount:

The amount of subordinated debt to be raised may be decided by the Board of Directors of the Bank.

c. Maturity Period:

The subordinated debt instruments should have a minimum original fixed term to maturity of over 5 years to be eligible for tier 2 capital and 2 years for being eligible for tier 3 capital.

For the purpose of counting the subordinated debt towards supplementary capital, during the last five years to maturity, a discount factor of 20 % per year will be applied as per following schedule. In case 5 year maturity subordinated debt has staggered principal repayments, the outstanding amount included in supplementary capital must be discounted by 20% percent a year (20% of the original amount less any redemptions) during the last five years to maturity.

Remaining Maturity of the Instrument	**Rate of Discount %**
Less than one year	100
More than one year less than two years	80
More than two years less than three years	60
More than three years less than four years	40
More than four years and up to five years	20

d. Rating:

The instruments should be rated separately – Minimum rating required is 'A' or equivalent as given by a credit rating agency recognized by State Bank of Pakistan.

e. Rate of Profit:

The instruments should be 'vanilla' with no special features like option of converting the TFCs into shares etc. Rate of profit shall be decided by the issuer.

f. Minimum Disclosure Requirements:

The issuing bank must clearly disclose in the offer documents that the instrument is unsecured, subordinated as to payment of principal and profit to all other indebtedness of the bank, including deposits and is not redeemable before maturity without prior approval of the SBP.

g. Other conditions

i) Sponsor shareholders of the issuing bank shall not be allowed to participate in or hold the subordinated debt instruments of the issuing bank directly or through their affiliates. The same restriction will also apply to the employees' retirement benefit funds of the issuing bank

ii) Banks should indicate the amount/details of subordinated debt raised as supplementary capital by way of explanatory notes in their annual audited accounts and quarterly Statement on Minimum Capital Requirement, submitted to the State Bank.

h. Grant of advances against Subordinated Debt Instruments.

Banks should not grant advances against the security of their own subordinated debt issue. While granting loans/advances against subordinated debt instruments of other banks, the margin requirement prescribed under Prudential Regulation R-6 shall be maintained, however the bank's total financing against subordinated debt instruments issued by banks

should not exceed its total equity (Tier-I capital). Further, the bank shall not provide any accommodation to finance purchase of its subordinated debt instrument.

i. Investments in TFCs of other banks.

Banks/DFIs may invest in subordinated/unsecured TFCs issued by other banks/DFIs to raise tier-2 or tier 3 Capital subject to above mentioned conditions. However:

i) The banks/DFIs' investments in such TFCs will be assigned a risk weight of 100% and will not be deducted from Tier-I capital for the purpose of calculating the Capital Adequacy Ratio, provided the Banks/DFIs' investment in such TFCs will not exceed 10% of their equity (in the case of DFIs not mobilizing deposits/ COIs from general public, the investment in such TFCs will not exceed 25% of their equity).

ii) The investments of the banks/DFIs in such TFCs in excess of the limits prescribed at Para i(i) above will be assigned a risk weight of 0% for Capital Adequacy Purpose and will be deducted from tier-I Capital of the investing bank/DFI.

iii) bank/DFI's investment in a single issue of such TFCs of any other bank/DFI will not at any time exceed 5% of its own equity or 15% of the total size of the issue, whichever is less.

j. Other Requirements

a. The issuing banks should submit a report to State Bank of Pakistan giving details of the subordinated debt, such as amount raised, maturity of the instrument, rate of profit etc. within one month from the date of issue.

b. The proceeds of rupee denominated debt instruments offered/issued to non-residents would have to be repatriated to Pakistan and converted into rupees by the bank concerned and PRC would be furnished to SBP. The bank concerned will be allowed to remit the principal amount of debt instruments at maturity as well as the profit/interest thereon from the interbank market. Hedging will not be available on such instruments.

Banks/DFIs should comply with all the terms and conditions, if any set out in any law in the country with regard to issue of the instruments.

7. CAPITAL DEDUCTIONS:

For the purpose of calculating Minimum Capital Requirement, following deductions shall be made in tier 1capital;

a. Book value of goodwill.
b. Shortfall in provisions required against classified assets irrespective of any relaxation allowed by the State Bank.

c. Deficit on account of revaluation of investments held in "available for Sale' Category.

d. Besides, investments made in the equity of subsidiary companies engaged in banking and financial activities (including insurance) which are not consolidated, will also be deducted from tier 1.

8. CALCULATION OF CAPITAL ADEQUACY RATIO (CAR):

The Capital Adequacy Ratio (CAR) shall be calculated by dividing the eligible capital with the risk-weighted assets. The requirement of minimum CAR shall remain the same i.e. 8% of risk-weighted assets.

Banks are required to first calculate minimum capital requirement for credit risk i.e 8% of their Credit Risk weighted Assets (as envisaged in part II of these instructions). However, they may exclude trading book portfolio except derivatives in this calculation. This would establish how much tier 1 and tier 2 capitals are available to support market risk. The eligible Tier 3 capital will be limited to 250% of tier 1 that is available to support market risk.

The market risk capital requirement would be directly calculated by using the methodology outlined in Part III of these instructions. In order to ensure consistency in the calculation of the capital requirements for credit and market risks, an explicit numerical link will be created by multiplying the total capital requirement for market risk by 12.5 (i.e. the reciprocal of the minimum capital ratio of 8%) and adding the resulting figure to the sum of risk-weighted assets compiled for credit risk purposes. The ratio will then be calculated in relation to the sum of the two, using as the numerator only eligible capital (tier 1, tier 2 and tier 3). The quoted capital ratio will thus represent capital that is available to meet both credit risk and market risk.

Where a bank has tier 3 capital, within the limits set out above, which is not at present supporting market risks, it may report that excess as unused but eligible tier 3 capital alongside its standard ratio.

Banks are required to maintain following capital adequacy ratios greater than or equal to 8%

$$\textbf{Credit Capital Adequacy Ratio} = \frac{\textbf{Tier 1 + Tier 2}}{\textbf{(Credit Risk Weighted Assets)}}$$

$$\textbf{Total Capital Adequacy Ratio} = \frac{\textbf{Tier 1 + Tier 2 + Tier 3}}{\textbf{(Credit risk weighted assets + Market risk weighted Assets)}}$$

The eligibility of tier 1, tier 2 and tier 3 capitals for the purpose of calculating above capital adequacy ratios shall be determined in accordance with the criteria laid down in Para 4 to 7 of part I of these instructions.

9. SUBMISSION OF RETURNS

Every bank/DFI shall submit to the State Bank a quarterly return (both on consolidated as well as on stand alone basis) on the format given in PART IV of attached instructions alongwith the Quarterly Report of Condition (as Part C). The annual MCR Statement duly certified by the

auditors will, however, be submitted within a period of three months from the close of the accounting year.

10. PENALTY FOR NON-COMPLIANCE.

a. Any bank/DFI failing to meet the minimum capital requirements shall render itself liable to levy of penalty and/or deschedulement under the relevant provisions of the Banking Companies Ordinance, 1962.

b. Any bank/DFI failing to submit the return in the prescribed manner within the stipulated time or submit a wrong statement shall also render itself liable to levy of penalty under the Banking Companies Ordinance, 1962.

PART II: CAPITAL REQUIREMENT AGAINST CREDIT RISK.

CALCULATION OF CREDIT RISK WEIGHTED ASSETS :

1. The banks/DFIs shall calculate MCR for their respective On- Balance Sheet assets by applying the weights as given below: -

	Assets	**Risk Weight**
a)	Cash (including approved foreign currencies and gold bullion)	0%
b)	Balances held with scheduled banks and banks abroad. (Be they term deposits, Certificates of Deposits or money at call)	20%
c)	Claims on the State Bank, the Federal Government, the Provincial Governments, and other Central Banks	0%
d)	Claims on or Guaranteed by banks that are rated 'A' or equivalent by a rating agency on the approved panel of SBP, Moody's, Standard & Poor and Fitch.	20%
e)	Claims covered by cash collateral, or guarantee of the Federal Government or of the State Bank.	0%
f)	Loans to staff	0%
g)	Claims on domestic entities owned or controlled by the Federal/Provincial Government (other than those that have corporate status or operate on commercial basis)	20%
h)	Claims on domestic entities owned or controlled by the Federal /Provincial Government (that have corporate status or operate on commercial basis)	50% to 100% (As prudently determined by bank/DFI itself)
i)	Loans fully secured by mortgage of residential or commercial property (excluding Industrial Property)	50%
j)	Loans and advances including bills purchased / discounted (less cash margin, government securities held and deposits of the party held under lien with flawless documentation) to private sector entities	100%
k)	Investments in shares and other capital instruments of companies set up in the private sector	100%
l)	Fixed assets (land, building, equipments, furniture & fixture, stationery) net of depreciation	100%
m)	Other Assets	100%

Notes:

i. All claims are to be assigned the highest risk weight (100%), unless a lower risk-weight can be specifically assigned to them.

ii. Netting may be done only in respect of assets where provisions for depreciation or for bad and doubtful debts have been made.

iii. Assets which have been deducted from equity pursuant to Paragraph 7 of Part I of the instructions will have a risk weight of '0'.
The amounts of cash margins, deposits and government securities so deducted at 1 (j) above shall be shown by way of foot-notes under schedule B, C1 and C2 of Part IV of these instructions.

2. OFF-BALANCE SHEET EXPOSURES.

Institutions are required to calculate Risk weighted credit exposure of all off balance sheet items, whether these are market related or non-market related. The Risk weighted amount of an off-balance sheet transaction which gives rise to credit exposure is calculated by means of a two-step process:

i) Firstly, the principal amount (or face value) of the transaction is converted into an on balance sheet equivalent (i.e. credit equivalent amount) by multiplying it with its respective credit conversion factor.

ii) Secondly, multiply the resulting credit equivalent amount by the risk weight applicable to Counterparty or the type of asset or where eligible guarantor or collateral security as appropriate.

a. Non Market Related Off-Balance Sheet Transactions

Given below are the credit conversion factors for non-market related off-balance sheet exposures.

	Off-Balance-Sheet transaction	**Credit conversion factors**
a)	Loan Repayment Guarantees and Acceptances (less Cash Margin)	100%
b)	Purchase & Resale Agreements (Reverse REPO) other than those effected through SGL of State Bank	100%
c)	Performance Bonds, Bid Bonds, Warranties and similar instruments (less Cash Margin & Government Securities held)	50%
d)	Revolving Underwriting commitments	50%
e)	Standby Letters of Credit & Other Standby Facilities e.g. credit lines with an original maturity of over one year, and other Letters of Credits (less Cash Margin & Government Securities held)	50%

b. **Market-Related Off-Balance Sheet Transactions**

For the purpose of calculating risk-weighted off-balance sheet credit exposures arising from market-related transactions, banks must include all its market-related contracts held in the banking book as well as trading book. Market-related contracts include the following:

i. ***Interest Rate Contracts***
This includes single currency interest rate swaps, forward rate agreements, interest rate options purchased and any other instruments of a similar nature.

ii. ***Foreign Exchange Contracts:*** This includes cross currency swaps (including cross currency interest rate swaps), forward foreign exchange contracts, currency options purchased, and any other instruments of a similar nature.

Banks shall calculate the credit equivalent amount of an off-balance sheet market-related contract by multiplying the notional principal amount of the contract by the appropriate credit conversion factor specified below according to the nature and original maturity of the instrument.

Original Maturity	Interest rate contracts	Foreign Exchange Contracts
1 year or less	**0.5%**	**2.0%**
> 1 year to 2 years	**1.0%**	**5.0%**
For each additional year	**1.0%**	**3.0%**

Notes:

i. Foreign exchange contracts with SBP may be subjected to "Zero" risk weight and those with banks to 20% risk weights. All outstanding sale and purchase contracts will, however, be taken into account and no netting off will be done. The outstanding foreign exchange contracts with SBP and banks will be shown separately.

ii. Exchange rate contracts with an original maturity of 14 calendar days or less are excluded

PART III: CAPITAL REQUIREMENT AGAINST MARKET RISK.

1. SCOPE AND COVERAGE OF THE CAPITAL CHARGES

The requirement to allocate capital is in respect of the exposure to risks deriving from changes in interest rates and equity prices, inherent in the institutions' trading book, and in respect of exposure to risks deriving from changes in foreign exchange rates in the overall banking activity.

All positions (On and Off Balance Sheet), which are subject to this market risk capital requirement, will not be subject to credit risk capital requirement prescribed in part II of these instructions, except for OTC derivatives wherein banks are required to hold capital against credit risk in addition to the market risk capital requirement. Consequently, the total capital requirement for banks/DFIs against their market risk shall be the sum of;

i. The capital against interest rate risk and equity position risk in trading book.
ii. Foreign exchange risk throughout the bank's balance sheet.

2. CALCULATION OF CAPITAL REQUIREMENT FOR INTEREST RATE RISK.

This section describes the standard framework for the calculation of capital requirement in respect of interest sensitive positions held in the trading portfolio. The minimum capital requirement against interest rate risk will be the sum of two separately calculated charges. One applying to the "Specific risk" of each security, whether it is short or a long position, and the other to the interest rate risk in the portfolio (termed as "General Market Risk") where long and short positions can be offset.

i. Specific risk capital charge.

The capital charge for specific risk, designed to protect against an adverse movement in the price of an individual security owing to factors related to the individual issuer, will be calculated on gross position. However, offsetting is restricted to matched positions in the identical *issue* (including positions in derivatives). Even if the *issuer* is the same, no offsetting will be permitted between different issues since the differences in coupon rates, liquidity, call features, etc. mean that prices may diverge in the short run. The Specific risk charge is graduated in 5 broad categories by type of issuers as follows:

Government	0.00%
Qualifying	0.25% (residual term to final maturity 6 months or less)
	1.00% (residual term to final maturity between 6 and 24 months)
	1.60% (residual term to final maturity exceeding 24 months)
Other	8.00%.

The category "government" will include all the existing approved government securities and such other government securities as may be notified by SBP from time to time.

The "*qualifying*" category includes securities issued by public sector entities and multilateral development banks, plus other securities that are:

i. Rated investment-grade by at least two credit rating agencies on the approved panel of SBP
ii. Rated investment-grade by one rating agency and not less than investment-grade by any other rating agency on the approved panel of SBP.

The "*other*" category will receive the same specific risk charge as a private-sector borrower under the credit risk requirements, i.e. 8%.
Interest rate and currency swaps, FRAs and forward foreign exchange contracts will not be subject to specific risk capital charge unless the underlying is a corporate debt security.

ii. General market risk capital charge.
The capital requirement for general market risk is designed to capture the risk of loss from changes in market interest rates. A choice between two principal methods of measuring the risk is permitted, a maturity method and a duration method. In each method, positions are allocated across a maturity ladder and the capital charge is then calculated as a sum of four components:

a. The net short or long weighted position across the whole trading book;
b. A small proportion of the matched positions in each time band (the vertical disallowance)
c. A larger proportion of the matched positions across different time bands(the horizontal disallowance)
d. A net charge for positions in options, where appropriate.

Separate maturity ladder must be used for positions in each major currency wherein the bank has net exposure equal to or more than 5% of its overall net open position. Capital charge should be calculated for each such major currency separately and then summed with no offsetting between positions of different currencies. For the rest of the currencies separate maturity ladder for each currency is not required. Rather, the institutions may construct a single maturity ladder and record, within each appropriate time band, the long and short position in each currency. However, the absolute value of these individual net positions must be summed within each time band irrespective of whether they are long or short positions, to produce a gross position figure.

3. THE MATURITY METHOD.
In the **maturity method**, long or short positions in debt securities and other sources of interest rate exposures, including derivative instruments, are slotted into a maturity ladder comprising thirteen time-bands (or fifteen time bands in case of low coupon instruments). Fixed rate instruments should be allocated according to the residual term to maturity and floating-rate instruments according to the residual term to the next repricing date. Opposite positions of the same amount in the same issues (but not different issues by the same issuer),

whether actual or notional, can be omitted from the interest rate maturity framework, as well as closely matched swaps, and FRAs which meet the conditions set out on following pages.

The first step in the calculation is to weight the positions in each time-band by a factor designed to reflect the price sensitivity of those positions to assumed changes in interest rates. The weights for each time-band are set out in Table 1 below. Zero-coupon bonds and deep-discount bonds (defined as bonds with a coupon of less than 3%) should be slotted according to the time-bands set out in the second column of the table 1.

The next step in the calculation is to offset the weighted longs and shorts in each time-band, resulting in a single short or long position for each band. Since, however, each band would include different instruments and different maturities, a 10% capital charge to reflect basis risk and gap risk will be required on the smaller of the offsetting positions, be it long or short. Thus, if the sum of the weighted longs in a time-band is Rs100 million and the sum of the weighted shorts Rs.90 million, the so-called "vertical disallowance" for that time-band would be 10% of Rs. 90 million (i.e. Rs 9.0 million).

Table 1

Maturity method: time-bands and weights

Coupon 3% or more	Coupon less than 3%	Risk weight	Assumed Change in yield
1 month or less	1 month or less	0.00%	1.00
1 to 3 months	1 to 3 months	0.20%	1.00
3 to 6 months	3 to 6 months	0.40%	1.00
6 to 12 months	6 to 12 months	0.70%	1.00
1 to 2 years	1.0 to 1.9 years	1.25%	0.90
2 to 3 years	1.9 to 2.8 years	1.75%	0.80
3 to 4 years	2.8 to 3.6 years	2.25%	0.75
4 to 5 years	3.6 to 4.3 years	2.75%	0.75
5 to 7 years	4.3 to 5.7 years	3.25%	0.70
7 to 10 years	5.7 to 7.3 years	3.75%	0.65
10 to 15 years	7.3 to 9.3 years	4.50%	0.60
15 to 20 years	9.3 to 10.6 years	5.25%	0.60
Over 20 years	10.6 to 12 years	6.00%	0.60
	12 to 20 years	8.00%	0.60
	Over 20 years	12.50%	0.60

The result of the above calculations shall produce two sets of weighted positions, the net long or short positions in each time-band (Rs. 10 million long in the example above) and the vertical disallowances, which have no sign. In addition, however, banks will be allowed to conduct two rounds of "horizontal offsetting", first between the net positions within each of three zones, and subsequently between the net positions in the three different zones. The offsetting will be subject to a scale of disallowances expressed as a fraction of the matched positions, as set out in Table 2 below. The weighted long and short positions in each of three zones may be offset, subject to the

matched portion attracting a disallowance factor that is part of the capital charge. The residual net position in each zone may be carried over and offset against opposite positions in other zones, subject to a second set of disallowance factors.

Table 2
Horizontal disallowances

Zone	Time-band	Within the Zone	Between Adjacent zones	Between zones 1 and 3
Zone 1	0 - 1 month 1 to 3 months 3 to 6 months 6 to 12 months	**40%**	**40%**	**100%**
Zone 2	1 to 2 years 2 to 3 years 3 to 4 years	**30%**		
Zone 3	4 to 5 years 5 to 7 years 7 to 10 years 10 to 15 years 15 to 20 years Over 20 years	**30%**	**40%**	

The general market risk capital charge will be the sum of :

Net position	Net short or long weighted position	x 100%
Vertical disallowances	Matched weighted positions in all time bands	x 10%
Horizontal Disallowances	Matched weighted position within Zone 1	x 40%
	Matched weighted position within Zone 2	x 30%
	Matched weighted position within Zone 3	x 30%
	Matched weighted position between zone 1 & 2	x 40%
	Matched weighted position between zone 2 & 3	x 40%
	Matched weighted position between zone 1 & 3	x 100%

4. THE DURATION METHOD.

Under the alternative duration method, institutions with the necessary capabilities may use a more accurate method of measuring all of their general market risk by calculating the price sensitivity of each position separately. The institutions that elect to use this approach must do so on continuous basis. In this method instead of the standard risk weights given in table 1, institution shall calculate the risk weights for each position on the basis of assumed change in yield given in table 3.

The mechanics of this method are as follows:

i. Slot all the interest sensitive positions in the trading book into a maturity ladder comprising of fifteen time bands as outlined in table 3.

ii. Calculate the price sensitivity of each instrument in terms of a change in interest rates of between 0.6 and 1.0-percentage points depending on the maturity of the instrument (as given in Table 3).

iii. Multiply the positions slotted in the various time bands with their respective sensitivity measures to obtain weighted positions;

iv. Subject long and short positions in each time-band to a 5% vertical disallowance designed to capture basis risk;

v. Carry forward the net positions in each time-band for horizontal offsetting subject to the disallowances set out in Table 2.

vi. The capital charge will be the sum of net position, the vertical disallowance and horizontal disallowances as stated earlier.

Table 3
Duration method: time-bands and assumed changes in yield

	Assumed change in yield		Assumed change in yield
Zone 1		**Zone 3**	
1 month or less	1.00	3.6 to 4.3 years	0.75
1 to 3 months	1.00	4.3 to 5.7 years	.70
3 to 6 months	1.00	5.7 to 7.3 years	0.65
6 to 12 months	1.00	7.3 to 9.3 years	0.60
		9.3 to 10.6 years	0.60
		10.6 to 12 years	0.60
Zone 2		12 to 20 years	0.60
1.0 to 1.9 years	0.90	Over 20 years	0.60
1.9 to 2.8 years	0.80		
2.8 to 3.6 years	0.75		

5. REPO / REVERSE-REPO TRANSACTION.

A security, which is the subject of a repurchase, or securities lending agreement will be treated as if it were still owned by the lender of the security, i.e. it shall be treated in the same manner as other securities positions.

6. INTEREST RATE DERIVATIVES.

The measurement system should include all interest rate derivatives and off-balance sheet instruments in the trading book, which are interest rate sensitive. These include Forward rate agreement, interest rate and cross currency swaps and forward foreign exchange contracts. Options are also subject to capital charge; however the calculation of capital requirement for options is set out separately in Para 10. The derivatives should be converted into positions in the relevant underlying and become subject to general market risk.

a. FRAs:

These instruments are treated as a combination of a long and short position in a notional government security. The maturity of a forward rate agreement will be the period until

exercise of the contract, plus where applicable the life of the underlying instrument. For instance a 3 Vs 6 forward rate agreement with a party means a short position in 1 to 3 months time band and long position in 3 to 6 month time band.

b. Swaps:

Swaps will be treated as two notional positions in government securities with the relevant maturities. For example an interest rate swap under which a bank is receiving floating rate and paying fixed rate will be treated as a long position in floating rate instrument of maturity equivalent to the period until the next interest fixing and a short position in a fixed rate instrument of maturity equivalent to the residual life of the swap. Both legs of swap are to be reported at their market values (or face value of the notional underlying in case market value is not available). The separate legs of cross-currency swaps are to be reported in the relevant maturity ladders for the currencies concerned.

7. CALCULATION OF CAPITAL CHARGE FOR DERIVATIVES.

a. Allowable offsetting of matched positions.

Banks may exclude from the interest rate maturity framework altogether (for both specific and general market risk) long and short positions (both actual and notional) in identical instruments with exactly the same issuer, coupon, currency and maturity.

b. Specific risk

Interest rate and currency swaps, FRAs, Options and forward foreign exchange contracts will not be subject to a specific risk charge unless the underlying is a corporate debt security.

c. General market risk

General market risk applies to positions in all derivative products in the same manner as for cash positions, subject only to an exemption for fully or very closely matched positions in identical instruments as defined above. The various categories of instruments should be slotted into the maturity ladder and treated according to the rules identified earlier.

8. EQUITY POSITION RISK

For equity investments in trading portfolio, the capital requirement would be the sum of capital charge for specific risk and general market risk. To calculate the capital requirement, all positions would be marked to market. The portfolio, subject to this capital requirement, shall be excluded from the capital requirement prescribed in Part II of these instructions.

The specific risk capital requirement shall be 8% of bank's gross position i.e. long plus short equity position.

The general market risk charge shall be 8% of institution's net position in equities.

9. FOREIGN EXCHANGE RISK

To calculate the capital charge for foreign exchange risk, nominal amount (or net present value) of the net position in each foreign currency shall be converted at spot rates into PKR.

The overall net open position is measured by aggregating the sum of the net short positions or the sum of the net long positions; whichever is the greater, regardless of sign. The capital charge will be 8% of the overall net open position[1]. For example, we may assume that a bank has long and short positions in Yen, Euro, GB£, Australian dollar and US dollar as given below in Table 4.

Table 4
Example (foreign exchange risk)

Currency	YEN	Euro	GB£	AUD	US$
Position in PKR	+40	+300	-130	-20	-150
Absolute Value	+340		-300		

The capital charge would be 8% of the higher of either the net long currency positions or the net short currency positions (i.e. 340)

Capital Requirement = 340 x 8% = 27.20

A bank doing negligible business in foreign currency is exempted from capital requirements for foreign exchange risk provided that:

a. Its foreign currency business, defined as the greater of the sum of its gross long positions and the sum of its gross short positions in all foreign currencies, does not exceed 100% of eligible capital as defined earlier; **and**

b. Its overall net open position as defined in the paragraph above does not exceed 2% of its eligible capital as defined earlier.

10. CAPITAL REQUIREMENT FOR OPTIONS.

The methodology to calculate capital charge against position in option is based on simplified approach and is specifically for institutions that handle a limited range of purchased options. The capital requirement against options is set out in table 5. As an example of how the calculation would work, if a holder of 100 shares currently valued at Rs 10 each holds an equivalent put option with a strike price of Rs 11, the capital charge would be Rs. 1000 x 16% (8% specific risk and 8% general market risk charge for equity) = Rs160 less the amount the option is in the money,. (11- 10) x 100 = Rs 100. The capital requirement, therefore, will be Rs 60 i.e (160-100).A similar methodology applies for options whose underlying is a foreign currency or an interest rate related instrument.

[1] Banks are required to follow guidelines outlined in F.E manual for the calculation of Net open position.

Table 5
Simplified Approach: Capital Charges

Position	Capital Charge
Long Cash and Long Put Or Short Cash and Long Call	The capital Charge will be the Market Value of the underlying of the option multiplied by the sum of specific and general market risk charges for the underlying less the amount the option is in the money (if any), with the reduced capital charge bounded at zero.
Long Call Or Long Put	The capital charge will be the lesser of: The market Value of the underlying of the option multiplied by the sum of specific and general market risk charges for the underlying and The market value of the option.

EXAMPLE

Calculation of general Market Risk charge for Interest related instruments in bank's Trading Book.

Suppose a bank has following positions in its trading portfolio;

1. A 4% government bond having market value 15 million and residual maturity of 6 years.
2. A 3% qualifying bond having market value 12 million, residual maturity 2 months.
3. An interest rate swap[2], Rs 150 million, bank receives floating rate interest and pays fixed next fixing after 9 months, residual life of swap 8 years.
4. An interest rate swap with face value Rs 30 million and residual maturity 2.5 years. Bank receives fixed interest at 7% and pays floating rate of 5.5%. Next repricing after 4 months.
5. A nine versus fifteen, Forward Rate Agreement sold on 6 months KIBOR with nominal amount Rs 20 million and settlement date after nine months.

Table 5 shows how these positions are slotted into the time-bands and are weighted according to the weights given in Table 1. After weighting the positions the next steps in the calculation will be:

(a) The *vertical disallowance* in time-band 6-12 month has to be calculated: The matched position in this time-band is 0.14 (the lesser of the absolute values of the added (weighted) long and (weighted) short positions in the same time-band) which leads to a capital charge of 10% of 0.14 = 0.014 million or 14,000. The remaining net (long) position is 0.91

(b) The *horizontal disallowances within the zones* have to be calculated: In doing this, the matched position in zone 1 and 3 are 0.12 and 0.488 respectively (the lesser of the absolute values of the added long and short positions in the same zone). The capital charge as described in table 2 shall be 40% of matched position in zone 1 and 30% of matched position in zone 3; worked out as Rs 0.048 M and Rs 0.146 million respectively.

(c) The *horizontal disallowances between adjacent zones* have to be calculated: After calculating the net position within zones the following positions remain: long position in zone 1 of Rs. 0.814 million, long position of Rs 0.775 million in zone 2 and short position of Rs 5.137 million in zone 3. The matched position between zones 2 and 3 is 0.775 (the lesser of the absolute values of the long and short positions between adjacent zones) The capital charge in this case is 40% of 0.775 = Rs. 0.31 million

[2] The position should be reported as the market value of the notional underlying, if it is available. Depending on the current interest rate, the market value of each leg of the swap (i.e. the 8-year bond and the 9-months floater) can be either higher or lower than the notional amount. For the sake of simplicity, the example assumes that the current interest rate is identical with the one on which the swap is based.

(d) The *horizontal disallowance between zones 1 and 3* has to be calculated: The remaining net (long) position in zone 1 is +0.814, in zone 3 the net (short) position is -4.362. The horizontal disallowance between the distant zones is 100% of the matched position, which leads to a capital charge of 100% of 0.814 = Rs. 0.814 million

(e) The overall net position is 3.548 leading to a capital charge of Rs.3.548 million.

Table 5

(Rs. in Million)

	Zone 1				**Zone 2**			**Zone 3**					
Time Band	0–1	1–3	3–6	6–12	1–2	2–3	3–4	4–5	5–7	7–10	10–15	15–20	Over 20
	Months				Years								
Positions		+12	-30	+150									
				-20	+20	+30			+15	-150			
Weights %	0	0.2	0.4	0.7	1.25	1.75	2.25	2.75	3.25	3.75	4.5	5.25	6.00
Weighted Positions		0.024	-0.12	1.05	0.25	0.525			0.488	-5.625			
				-0.14									
Vertical Disallowance				0.14 x 10% =0.014									
Positions after V. D		0.024	-0.12	0.91	0.25	.525			0.488	-5.625			
Horizontal Disallowance 1	= 0.12 x 40% = 0.048							=0.488x 30% = 0.146					
Positions	0.814				0.775			- 5.137					
Horizontal Disallowance 2					= 0.775 x 40% = 0.31								
Positions	0.814							- 4.362					
Horizontal Disallowance 3	=0.814 x 100% = 0.814												
The overall net position = - 3.548													

Thus the total capital requirement for general market risk in this example shall be

For the vertical disallowance	14,000
For the horizontal disallowance in zone 1	48,000
For the horizontal disallowance in zone 3	146,000
For horizontal disallowance between adjacent zones	310,000
For the horizontal disallowance between zones 1 and 3	814,000
For overall net open position	3,548,000
	Rs 4,880,000

PART IV: CAPITAL ADEQUACY RETURN.

A- SUMMARY / OVERALL CAPITAL ADEQUACY RATIO (Rs in Thousands)

1	**Equity**		
	1.1	Fully Paid-up capital/Capital deposited with SBP	xxxxx
	1.2	Balance in Share Premium Account	xxxxx
	1.3	Reserve for Bonus Shares	xxxxx
	1.4	General Reserves as disclosed on the Balance Sheet	xxxxx
	1.5	Un-appropriated/ un-remitted profits (net of accumulated losses, if any)	xxxxx
	1.6	Sub-Total (1.1 to 1.5)	xxxxx
		Less:	
	1.7	Goodwill	xxxxx
	1.8	Investments in equity of subsidiary companies engaged in banking and financial activities (including insurance) not consolidated in the balance sheet	xxxxx
	1.9	Shortfall in Provisions required against Classified assets	xxxxx
	1.10	Deficit on account of revaluation of AFS investments	xxxxx
	1.11	Sub-Total (1.7 to 1.9)	xxxxx
	1.12	**TOTAL EQUITY (1.6- 1.10)**	xxxxx
2	**Supplementary Capital**		
	2.1	Freely available General Provisions or reserves for loan losses-up to maximum of 1.25% of Risk Weighted assets (see para 5 (b) of Part I of Instructions)	xxxxx
	2.2	Revaluation reserves eligible upto 50% (see para 5 of Part I of Instructions)	xxxxx
	2.3	Foreign Exchange Translation Reserves	xxxxx
	2.4	Undisclosed reserves (see para 5d of Part I of instructions)	xxxxx
	2.5	Subordinated debt –upto maximum of 50% of Total Equity –Item 1.11 (see Para 5 of Part 1 of the Instructions)	xxxxx
	2.6	Total tier 2 Supplementary Capital (2.1 to 2.5)	xxxxx
	2.7	**Eligible tier 3** (as worked out in 3.9 below)	xxxxx
	2.8	**Total Supplementary Capital eligible for MCR** (Maximum upto 100% of Total Equity-see Para 5 of Part 1 of the Instructions)	xxxxx
	2.9	**TOTAL CAPITAL (1.12 + 2.8)**	xxxxx
3	**Risk Assets and Off-Balance Sheet Items**		
	3.1	Adjusted value of funded risk assets i.e., On-Balance Sheet Items (To tally with total of schedule B pf part IV)	xxxxx
	3.2	Adjusted value of non-funded risk exposure i.e. Off-Balance Sheet Items (To tally with total of schedule C1 and C2 of part IV)	xxxxx
	3.3	**TOTAL CREDIT RISK-WEIGHTED ASSETS** (3.1+3.2)	xxxxx
	3.4	**TOTAL MARKET RISK WEIGHTED ASSETS.** To tally with total of Part IV (D)	xxxxx
	3.5	**MINIMUM CAPITAL REQUIRED** (for Credit Risk) (8% of Credit Risk-Weighted Assets – Item 3.3)	xxxxx
	3.6	**Tier 1 and Tier 2 Capital held** (1.12 + 2.6)	xxxxx
	3.7	**Tier 3 Capital limit** (see Para 5 of part I of instructions)	xxxxx
	3.8	**Actual Tier 3 Capital**	xxxxx
	3.9	**Eligible Tier 3 Capital** (see para 5 of Part I of instruction)	xxxxx
		CAPITAL ADEQUACY RATIO CREDIT RISK.	0.00%
		TOTAL CAPITAL ADEQUACY RATIO (2.9 / 3.3+3.4)	0.00%

B- RISK-WEIGHTED ASSETS –ON-BALANCE SHEET ITEMS

(Rupees in thousands)

S.NO	ITEMS	BOOK VALUE	RISK WEIGHTS %	ADJUSTED VALUE
1	**Cash (including approved Foreign Currencies and Gold bullion)**		0%	
2	**Balances with Central Banks :**			
	2.1 With State Bank of Pakistan		0%	
	2.2 With Other Central Banks		0%	
3	**Balances with other Banks (including Term Deposits /Certificates of Deposit):**			
	3.1 With Scheduled Banks in Pakistan		20%	
	3.2 With Banks outside Pakistan		20%	
4	**Money at Call & Short notice in Pakistan**			
	4.1 With Scheduled Banks		20%	
	4.2 Others		100%	
5	**Investments in :**			
	5.1 Federal Govt. Securities		0%	
	5.2 Provincial Govt. Securities		0%	
	5.3 Shares of :			
	a) Enterprises owned or controlled by Fed Govt.		0% - 50%*	
	b) Private Sector Enterprises		100%	
	5.4 Debentures, Bonds, PTCs, TFCs, etc, of:			
	a) Enterprises owned or controlled by Fed. Govt.,			
	i) Guaranteed by Federal Govt./ SBP		0%	
	ii) Enterprises other than those having corporate status or being run on commercial basis.		20%	
	ii) Enterprises having corporate status or being run on commercial basis.		50% to 100% to be determined by institution	
	b) Private Sector Enterprises		100%	
	5.5 Other Investments (to be specified)		100%	
6	**Loans & Advances including Bills Purchased / Discounted (Less Cash Margin and Govt. Securities held) to :**			
	6.1 Federal Government		0%	
	6.2 Provincial Government		0%	
	6.3 Loans guaranteed by Federal Govt./SBP		0%	
	6.4 Enterprises Owned or Controlled by Federal Govt.			
	i) Guaranteed by Federal Govt./ SBP		0%	
	ii) Enterprises other than those having corporate status or being run on commercial basis.		20%	
	iii) Enterprises having corporate status or being run on commercial basis.		50% to 100% To be determined by institution	
	6.5 Claims on or guaranteed by banks of international repute incorporated in G-10 countries		20%	
	6.6 Private Sector Enterprises		100%	
	6.7 Loans fully secured by mortgage of residential or commercial property (excluding Industrial Property)		50%	
	6.8 Staff loans		0%	
	6.9 Others (to be specified)		100%	
7	**Fixed Assets (Net of Accumulated Depreciation)**		100%	
8	**Assets deducted from Capital** :			
	8.1 Goodwill		0%	
	8.2 Unconsolidated Investment in subsidiary companies engaged in banking and financial activities (including insurance)		0%	
9	**Other Assets**			
	9.1 Taxation (Net of Provisions)		0%	
	9.2 Accrued Interest/Profit on Govt. Securities		0%	
	9.3 Others (to be specified)		100%	
	Total			

* 0%, 10%, 20% or 50% as may be prudently determined by the bank/DFI.

C(1) - WEIGHTED NON-FUNDED EXPOSURES /OFF-BALANCE SHEET ITEMS (Non – Market Related)

(Rupees in thousands)

S.NO	ITEMS	BOOK VALUE	Conversion Factor %	Equivalent Value	RISK WEIGHTS %	ADJUSTED VALUE
1	**Loans Repayment Guarantees & Acceptances**					
	(Less Cash Margin) issued on behalf of :					
	1.1 Federal / Provincial Govts. and SBP or guaranteed by the Federal Govt. / SBP		100%		0%	
	1.2 Enterprises owned or controlled by the Federal Govt..		100%		0-50%*	
	1.3. Banks of international repute incorporated in G-10 countries and domestic banks having at least rating of A		100%		20%	
	1.4 Private Sector Enterprises		100%		100%	
	1.5 Others (to be specified)		100%		100%	
2	**Purchase & Resale Agreements (Reverse Repo) other than those effected through SGL of SBP**		100%		0%	
3	**Performance Bonds, Bid Bonds, Warranties & similar instruments (less Cash Margin & Govt. Securities held)**					
	issued on behalf of					
	3.1 Federal / Provincial Govts. and SBP or guaranteed by the Federal Govt. / SBP.		50%		0%	
	3.2 Enterprises owned or controlled by the Federal Govt.		50%		0-50%*	
	3.3 Banks of international repute incorporated in G-10 countries and domestic banks having rating at least of A.		50%		20%	
	3.4 Private Sector Enterprises		50%		100%	
	3.5 Others (to be specified)		50%		100%	
4	**Revolving Underwriting Commitments**		50%		100%	
5	**Standby L/Cs & other Standby facilities with an original maturity of over one year, and other L/Cs (less cash Margin & Govt. Securities held)**					
	Issued on behalf of :					
	5.1 Federal / Provincial Govts., and SBP or guaranteed by the Federal Govt. / SBP.		50%		0%	
	5.2 Enterprises owned or controlled by the Federal Govt.		50%		0-50%*	
	5.3 Banks of international repute incorporated in G-10 countries		50%		20%	
	5.4 Private Sector Enterprises		50%		100%	
	5.5 Others (to be specified)		50%		100%	
6	**Outstanding Foreign Exchange Contracts**					
	6.1 With SBP		3%		0%	
	6.2 With other banks		3%		20%	
	TOTAL					

* 0%, 10%, 20% or 50% as may be prudently determined by the bank/DFI.

C (2) - WEIGHTED NON-FUNDED EXPOSURES /OFF-BALANCE SHEET ITEMS (Market Related)

(Rupees in thousands)

S.NO	ITEMS	BOOK VALUE	Conversion Factor %	Equivalent Value	RISK WEIGHTS %	ADJUSTED VALUE
1	Outstanding Foreign Exchange Contracts With SBP				0%	
2	Outstanding Foreign Exchange Contracts with other banks					
3	Cross Currency Swaps					
4	Forward Rate Agreement					
5	Single currency Interest Rate Swaps					
	Total.					

SUMMARY

D - CAPITAL CHARGE FOR MARKET RISK

1. Capital Charge for Interest Rate Risk	**Amount in Thousands**	
i. Specific Risk	**D1 (a)**	
ii. General Market Risk	**D1 (b)**	
2. Capital Charge For Equity Exposure		
i. Specific Risk	**D2 (a)**	
ii. General Market Risk	**D2 (b)**	
3. Capital Charge for Foreign Exchange Risk	**D3**	
4. Capital Charge for position in Options	**D4**	
5. Total Capital Charge for Market Risk	**Sum of D1 to D4.**	
Market Risk Weighted Assets (5 above x 12.5)		

D1: INTEREST RATE EXPOSURES (TRADING BOOK)

(Rs in Thousands)

(a) DEBT SECURITIES AND OTHER DEBT RELATED DERIVATIVES – SPECIFIC RISK						
Nature of Item	**Positions**	**Residual Maturity**			**Total Exposures**	**TOTAL SPECIFIC RISK CAPITAL CHARGE**
		6 months or less	**Over 6 months to 24 months**	**Over 24 months**		
1. Debt securities issued by central governments or central banks.	Long					
	Short					
2. Debt securities eligible for 'Qualifying' Category.	Long					
	Short					
3. Other debt securities	Long					
	Short					
TOTAL (ITEMS 2 & 3 above)	Long					
	Short					
Risk Weight		0.25%	1.00%	1.60%	8.00%	
SPECIFIC RISK CAPITAL CHARGE FOR DEBT SECURITIES AND DEBT DERIVATIVES (ON GROSS POSITION – LONG PLUS SHORT)						

D1(b). DEBT SECURITIES, DEBT DERIVATIVES AND OTHER INTEREST RATE DERIVATIVES – GENERAL MARKET RISK*.

(Rs in Thousands)

Zone	Time Band		Individual positions						Risk Weight	Weighted positions	
	Coupon 3% or more	Coupon less than 3%	Debt securities & debt derivatives		Interest rate derivatives		Total				
			Long	Short	Long	Short	Long	Short		Long	Short
1	1 month or less	1 month or less							0.00%		
	1 to 3 months	1 to 3 months							0.20%		
	3 to 6 months	3 to 6 months							0.40%		
	6 to 12 months	6 to 12 months							0.70%		
2	1 to 2 years	1.0 to 1.9 years							1.25%		
	2 to 3 years	1.9 to 2.8 years							1.75%		
	3 to 4 years	2.8 to 3.6 years							2.25%		
3	4 to 5 years	3.6 to 4.3 years							2.75%		
	5 to 7 years	4.3 to 5.7 years							3.25%		
	7 to 10 years	5.7 to 7.3 years							3.75%		
	10 to 15 years	7.3 to 9.3 years							4.50%		
	15 to 20 years	9.3 to 10.6 years							5.25%		
	Over 20 years	10.6 to 12 years							6.00%		
		12 to 20 years							8.00%		
		Over 20 years							12.50%		
TOTAL											

OVERALL NET OPEN POSITION

Calculation	Vertical disallowance	Horizontal Disallowance in			Horizontal Disallowance between			Overall net open position	Total General Market Risk Charge
		Zone 1	Zone 2	Zone 3	Zones 1 & 2	Zones 2 & 3	Zones 1 & 3		
GENERAL MARKET RISK CAPITAL CHARGE									

Total Capital Charge for Interest Rate Risk (a + b)

*Separate Forms to be used for different currencies

D2 - EQUITY EXPOSURES *(Trading Book*

(Rs in Thousands)

	Inside Pakistan	**Outside Pakistan***	**Total**
Gross (Long plus Short) Positions			
Risk Weight	8%	8%	
a. Specific Risk Charge			
Net Long/Short Position			
Risk Weight	8%	8%	
b. General Market Risk Capital Charge			
Total Capital Charge for Equity Exposures (a+ b)			

- Report position on a market-by-Market basis i.e. separate column for each national market to be used

D3. FOREIGN EXCHANGE RISK.

(Rs in Thousands)

Currency	Position in F/C	PKR Rate	Position in PKR
		Overall Long/Short Position	
		Capital Charge (8% x Net Open Position)	

D4- MARKET RISK CAPITAL CHARGE FOR OPTIONS

LONG OPTIONS WITH RELATED CASH POSITIONS.

Underlying of the Option	Specific Risk Charge	General Market Risk Charge	Long Cash & Long Put	Short Cash & Long Call	Total
Foreign Exchange		8%			

LONG CALL or LONG PUT OPTIONS.

Underlying of the Option	Specific Risk Charge	General Market Risk Charge	Long Put	Long Call	Total
Foreign Exchange		8%			