4 July 2005

All Commercial Banks (excluding RRBs)

Dear Sir,

## Master Circular- Prudential Norms on Capital Adequacy

Please refer to the Master Circular No. DBOD. BP. BC. 12/ 21.01.002/ 2004- 2005 dated July 19, 2004 consolidating instructions/ guidelines issued to banks till 6th July 2004 on matters relating to prudential norms on capital adequacy. The Master Circular has been suitably updated by incorporating instructions issued up to 30<sup>th</sup> June 2005 and has also been placed on the RBI web-site (http://www.rbi.org.in).

It may be noted that all relevant instructions on the above subject contained in the circulars listed in the Appendix have been consolidated. We advise that the revised Master Circular supersedes the instructions contained in these circulars issued by the RBI.

Yours faithfully,

(Anand Sinha) Chief General Manager-in-Charge

# PRUDENTIAL NORMS ON CAPITAL ADEQUACY

- 1. General
- 2. Capital funds
- 3. Risk adjusted assets and off-balance sheet items
- 4. Capital charge for market risk
- 5. Capital adequacy for subsidiaries
- 6. Procedure
- 7. Worked out examples for computing capital charge for credit and market risks
- 8. Reporting Formats
- 9. Attachments
- 10. Annexures

### PRUDENTIAL NORMS ON CAPITAL ADEQUACY

#### 1. General

- 1.1 With a view to adopting the Basle Committee framework on capital adequacy norms which takes into account the elements of risk in various types of assets in the balance sheet as well as off-balance sheet business and also to strengthen the capital base of banks, Reserve Bank of India decided in April 1992 to introduce a risk asset ratio system for banks (including foreign banks) in India as a capital adequacy measure.
- 1.2 Essentially, under the above system the balance sheet assets, non-funded items and other off-balance sheet exposures are assigned weights according to the prescribed risk weights and banks have to maintain unimpaired minimum capital funds equivalent to the prescribed ratio on the aggregate of the risk weighted assets and other exposures on an ongoing basis. The broad details of the capital adequacy framework are detailed below.

# 2. Capital funds

# 2.1 Capital funds of Indian banks

For Indian banks, 'capital funds' would include the following elements:

## 2.1.1 Elements of Tier I capital

- Paid-up capital, statutory reserves, and other disclosed free reserves, if any.
- ii) Capital reserves representing surplus arising out of sale proceeds of assets.
- 2.1.2 Equity investments in subsidiaries, intangible assets and losses in the current period and those brought forward from previous periods, should be deducted from Tier I capital.
- 2.1.3 In the case of public sector banks which have introduced Voluntary Retirement Scheme (VRS), in view of the extra-ordinary nature of the

event, the VRS related Deferred Revenue Expenditure would not be reduced from Tier I capital. However, it will attract 100% risk weight for capital adequacy purpose.

2.1.4 Creation of deferred tax asset (DTA) results in an increase in Tier I capital of a bank without any tangible asset being added to the banks' balance sheet. Therefore, DTA, which is an intangible asset, should be deducted from Tier I capital.

## 2.1.5 Elements of Tier II capital

i) <u>Undisclosed reserves and cumulative perpetual preference shares</u>
 These often have characteristics similar to equity and disclosed

reserves. These elements have the capacity to absorb unexpected losses and can be included in capital, if they represent accumulations of post-tax profits and not encumbered by any known liability and should not be routinely used for absorbing normal loss or operating losses. Cumulative perpetual preference shares should be fully paid-up and should not contain clauses, which permit redemption by the holder.

## ii) Revaluation reserves

These reserves often serve as a cushion against unexpected losses, but they are less permanent in nature and cannot be considered as 'Core Capital'. Revaluation reserves arise from revaluation of assets that are undervalued on the bank's books, typically bank premises and marketable securities. The extent to which the revaluation reserves can be relied upon as a cushion for unexpected losses depends mainly upon the level of certainty that can be placed on estimates of the market values of the relevant assets, the subsequent deterioration in values under difficult market conditions or in a forced sale, potential for actual liquidation at those values, tax consequences of revaluation, etc. Therefore, it would be prudent to consider revaluation reserves at a discount of 55 percent while determining their value for inclusion in Tier II capital. Such reserves will have to be reflected on the face of the Balance Sheet as revaluation reserves.

## iii) General provisions and loss reserves

Such reserves, if they are not attributable to the actual diminution in value or identifiable potential loss in any specific asset and are available to meet unexpected losses, can be included in Tier II capital. Adequate care must be taken to see that sufficient provisions have been made to meet all known losses and foreseeable potential losses before considering general provisions and loss reserves to be part of Tier II capital. General provisions/loss reserves will be admitted up to a maximum of 1.25 percent of total risk weighted assets.

'Floating Provisions' held by the banks which is general in nature and not made against any identified assets may be treated as a part of Tier II capital within the overall ceiling of 1.25 percent of total risk weighted assets, if such provisions are not reduced from gross NPA to arrive at the net NPA

## iv) Hybrid debt capital instruments

In this category, fall a number of capital instruments, which combine certain characteristics of equity and certain characteristics of debt. Each has a particular feature, which can be considered to affect its quality as capital. Where these instruments have close similarities to equity, in particular when they are able to support losses on an ongoing basis without triggering liquidation, they may be included in Tier II capital.

## v) Subordinated debt

(a) To be eligible for inclusion in Tier II capital, the instrument should be fully paid-up, unsecured, subordinated to the claims of other creditors, free of restrictive clauses, and should not be redeemable at the initiative of the holder or without the consent of the Reserve Bank of India. They often carry a fixed maturity, and as they approach maturity, they should be subjected to progressive discount, for inclusion in Tier II capital. Instruments with an initial maturity of less than 5 years or with a

remaining maturity of one year should not be included as part of Tier II capital. Subordinated debt instruments eligible to be reckoned as Tier II capital will be limited to 50 percent of Tier I capital.

- b) In the case of public sector banks, the bonds issued to the VRS employees as a part of the compensation package, net of the unamortised VRS Deferred Revenue Expenditure, could be treated as Tier II capital, subject to compliance with the terms and conditions stipulated in para 2.4 below.
- c) The subordinated debt instruments included in Tier II capital may be subjected to discount at the rates shown below:

Remaining Maturity of Instruments	Rate	of
	Discount (%)	
Less than one year	100	
One year and more but less than two years	80	
Two years and more but less than three years	60	
Three years and more but less than four years	40	
Four years and more but less than five years	20	

d) Banks should indicate the amount of subordinated debt raised as Tier II capital by way of explanatory notes/ remarks in the Balance Sheet as well as in Schedule 5 under 'Other Liabilities & Provisions'.

# vi) Investment Fluctuation Reserve (IFR)

- (a). IFR would continue to be treated as Tier II capital but would not be subject to the ceiling of 1.25 percent of the total risk weighted assets.
- (b) With a view to encourage banks for early compliance with the guidelines for maintenance of capital charge for market risks, banks which have maintained capital of at least 9 percent of the risk weighted assets for both credit risks and market risks for both Held for Trading (HFT) and Available for Sale (AFS) category may transfer the balance in excess of 5 per cent of securities included under HFT and AFS categories to Statutory Reserve, which is eligible for inclusion in Tier I capital. This

- transfer shall be made as a 'below the line' in the Profit and Loss Appropriation Account.
- (c) The provisions required to be created on account of depreciation in the AFS and HFT categories should be debited to the P&L Account and an equivalent amount (net of tax benefit, if any, and net of consequent reduction in the transfer to Statutory Reserve) or the balance available in excess of 5 per cent of securities included under the HFT / AFS categories in the Investment Fluctuation Reserve Account, whichever is less, may be transferred from the Investment Fluctuation Reserve Account to the P&L Account. This transfer shall be made as a 'below the line' in the Profit and Loss Appropriation account. The amount drawn down from the Investment Fluctuation Reserve will not be available to a bank for payment of dividend among the shareholders. Hence, the amount drawn down may be appropriated to the Statutory Reserve, which would be eligible to be reckoned as Tier 1 capital.
- vii) Banks are allowed to include the 'General Provisions on Standard Assets' and 'provisions held for country exposures' in Tier II capital. However, the provisions on 'standard assets together with other 'general provisions/ loss reserves' and 'provisions held for country exposures' will be admitted as Tier II capital up to a maximum of 1.25 per cent of the total risk-weighted assets.
- 2.1.6 Tier II elements should be limited to a maximum of 100 percent of total Tier I elements for the purpose of compliance with the norms.

## 2.1.7 Norms on cross holdings

(i) A bank's / FI's investments in all types of instruments listed at 2.1.7 (ii) below, which are issued by other banks / FIs and are eligible for capital status for the investee bank / FI, will be limited

to 10 per cent of the investing bank's capital funds (Tier I plus Tier II capital).

- (ii) Banks' / Fls' investment in the following instruments will be included in the prudential limit of 10 per cent referred to at 2.1.7(i) above.
  - a) Equity shares;
  - b) Preference shares eligible for capital status;
  - c) Subordinated debt instruments:
  - d) Hybrid debt capital instruments; and
  - e) Any other instrument approved as in the nature of capital.
- (iii) Banks / FIs should not acquire any fresh stake in a bank's equity shares, if by such acquisition, the investing bank's / FI's holding exceeds 5 per cent of the investee bank's equity capital.
- (iv) Banks' / Fls' investments in the equity capital of subsidiaries are at present deducted from their Tier I capital for capital adequacy purposes. Investments in the instruments issued by banks / Fls which are listed at paragraph 2.1.7(ii) above, which are not deducted from Tier I capital of the investing bank/ Fl, will attract 100 per cent risk weight for credit risk for capital adequacy purposes.

## Note:

Following investments are excluded from the purview of the ceiling of 10 percent prudential norm prescribed above:

- a) Investments in equity shares of other banks /FIs in India held under the provisions of a statute.
- b) Strategic investments in equity shares of other banks/Fls incorporated outside India as promoters/significant shareholders (i.e. Foreign Subsidiaries / Joint Ventures / Associates).
- c) Equity holdings outside India in other banks / Fls incorporated outside India

## 2.2 Capital funds of foreign banks operating in India

For foreign banks, 'capital funds' would include the following elements:

## 2.2.1 Elements of Tier I capital

- i) Interest-free funds from Head Office kept in a separate account in Indian books specifically for the purpose of meeting the capital adequacy norms.
- ii) Statutory reserves kept in Indian books.
- iii) Remittable surplus retained in Indian books which is not repatriable so long as the bank functions in India.

#### Notes:

- a) The foreign banks are required to furnish to Reserve Bank, (if not already done), an undertaking to the effect that the banks will not remit abroad the remittable surplus retained in India and included in Tier I capital as long as the banks function in India.
- b) These funds may be retained in a separate account titled as 'Amount Retained in India for Meeting Capital to Risk-weighted Asset Ratio (CRAR) Requirements' under 'Capital Funds'.
- c) An auditor's certificate to the effect that these funds represent surplus remittable to Head Office once tax assessments are completed or tax appeals are decided and do not include funds in the nature of provisions towards tax or for any other contingency may also be furnished to Reserve Bank.
- d) Foreign banks operating in India are permitted to hedge their entire Tier I capital held by them in Indian books subject to the following conditions:

- (i) the forward contract should be for tenor of one year or more and may be rolled over on maturity. Rebooking of cancelled hedge will require prior approval of Reserve Bank.
- (ii) the capital funds should be available in India to meet local regulatory and CRAR requirements. Therefore, foreign currency funds accruing out of hedging should not be parked in nostro accounts but should remain swapped with banks in India at all times.
- iv) Capital reserve representing surplus arising out of sale of assets in India held in a separate account and which is not eligible for repatriation so long as the bank functions in India.
- v) Interest-free funds remitted from abroad for the purpose of acquisition of property and held in a separate account in Indian books.
- vi) The net credit balance, if any, in the inter-office account with Head Office/overseas branches will not be reckoned as capital funds. However, any debit balance in Head Office account will have to be set-off against the capital.

## 2.2.2 Elements of Tier II capital

To the extent relevant, elements of Tier II capital as indicated above in paragraph 2.1.5 in respect of Indian banks will be eligible.

2.2.3 The elements of Tier I & Tier II capital do not include foreign currency loans granted to Indian parties.

## 2.3 Minimum requirement of capital funds

Banks are required to maintain a minimum CRAR of 9 percent on an ongoing basis.

## 2.4 Issue of subordinated debt for raising Tier II capital

2.4.1 The Reserve Bank has given autonomy to Indian banks to raise rupee subordinated debt as Tier II capital, subject to the terms and conditions given in the *Annexure 1*. It should be ensured that the terms & conditions are strictly adhered to.

- 2.4.2 Foreign banks also would not require prior approval of RBI for raising subordinated debt in foreign currency through borrowings from Head Office for inclusion in Tier II capital. To ensure transparency and uniformity, detailed guidelines in this regard are given at <u>Annexure 1A</u>.
- 2.4.3 The banks should submit a report to Reserve Bank of India giving details of the Subordinated debt issued for raising Tier II capital, such as, amount raised, maturity of the instrument, rate of interest together with a copy of the offer document, soon after the issue is completed.

## 3. Risk adjusted assets and off-balance sheet items

- 3.1 Risk adjusted assets would mean weighted aggregate of funded and non-funded items. Degrees of credit risk expressed as percentage weightings, have been assigned to balance sheet assets and conversion factors to off-balance sheet items.
- 3.2 The banks' overall minimum capital requirement will be the sum of: (a) capital requirement for credit risk on all credit exposures excluding items comprising trading book as defined in para 4.5.1 and including counter party credit risk on all OTC derivatives on the basis of the risk weights indicated in Annexure 2 and (b) capital requirement for market risks in the trading book.
- 3.3 The value of each asset/ item shall be multiplied by the relevant weights to produce risk adjusted values of assets and off-balance sheet items. The aggregate will be taken into account for reckoning the minimum capital ratio.
- 3.4 The risk-weights allotted to each of the items of assets and off-balance sheet items are furnished in the *Annexure 2*.

## 4. Capital charge for market risk

## 4.1 Introduction

The Basel Committee on Banking Supervision (BCBS) had issued the 'Amendment to the Capital Accord to incorporate market risks' containing comprehensive guidelines to provide explicit capital charge for market risks. Market risk is defined as

the risk of losses in on-balance sheet and off-balance sheet positions arising from movements in market prices. The market risk positions subject to capital charge requirement are:

- The risks pertaining to interest rate related instruments and equities in the trading book; and
- Foreign exchange risk (including open position in precious metals) throughout the bank (both banking and trading books).
- 4.2 As an initial step towards prescribing capital requirement for market risks, banks were advised to:
  - i) assign an additional risk weight of 2.5 per cent on the entire investment portfolio;
  - ii) assign a risk weight of 100 per cent on the open position limits on foreign exchange and gold; and
  - iii) build up Investment Fluctuation Reserve up to a minimum of five per cent of the investments held in Held for Trading and Available for Sale categories in the investment portfolio.
- 4.3 The interim measures adopted in India represent a broad brush and simplistic approach. Besides, over a period of time, banks' ability to identify and measure market risk has improved. Keeping in view the ability of banks to identify and measure market risk, it was decided to assign explicit capital charge for market risks. Banks are required to maintain capital charge for market risks in a phased manner over a two year period, as detailed below:
  - (a) Banks were required to maintain capital for market risks on securities included in the Held for Trading category, open gold position, open forex position, trading positions in derivatives and derivatives entered into for hedging trading book exposures *by March 31, 200*5. Consequently, the additional risk weight of 2.5% towards market risk on the investment included under Held for Trading category is not required.

- (b) Banks should maintain capital for market risks on securities included in the Available for Sale category also by *March 31, 200*6. Consequently, the additional risk weight of 2.5% towards market risks maintained at present on the investment included under Available for Sale and Held to Maturity categories would not be required with effect from the above date or from an earlier date from which bank provides capital for market risk for securities held in the Available for Sale category.
- 4.4 The guidelines in this regard are organized under the following seven sections:

Section	Particulars		
<u>A</u>	Scope and coverage of capital charge for market risks		
<u>B</u>	Measurement of capital charge for interest rate risk in the trading book		
<u>C</u>	Measurement of capital charge for equities in the trading book		
<u>D</u>	Measurement of capital charge for foreign exchange risk and gold open positions		

#### Section A

4.5 Scope and coverage of capital charge for market risks

#### General

- 4.5.1. These guidelines seek to address the issues involved in computing capital charges for interest rate related instruments in the trading book, equities in the trading book and foreign exchange risk (including gold and other precious metals) in both trading and banking books. Trading book for the purpose of these guidelines will include:
  - Securities included under the Held for Trading category
  - Securities included under the Available for Sale category
  - Open gold position limits
  - Open foreign exchange position limits
  - · Trading positions in derivatives, and
  - Derivatives entered into for hedging trading book exposures.

- 4.5.2 To begin with, capital charge for market risks is applicable to banks on a global basis. At a later stage, this would be extended to all groups where the controlling entity is a bank.
- 4.5.3. Banks are required to manage the market risks in their books on an ongoing basis and ensure that the capital requirements for market risks are being maintained on a continuous basis, i.e. at the close of each business day. Banks are also required to maintain strict risk management systems to monitor and control intra-day exposures to market risks.

#### Section B

## 4.6 Measurement of capital charge for interest rate risk in the trading book

- 4.6.1 This section describes the framework for measuring the risk of holding or taking positions in debt securities and other interest rate related instruments in the **domestic currency** in the trading book.
- 4.6.2. The capital charge for interest rate related instruments and equities would apply to current market value of these items in bank's trading book. The current market value will be determined as per extant RBI guidelines on valuation of investments.
- 4.6.3 The minimum capital requirement is expressed in terms of two separately calculated charges, (i) "specific risk" charge for each security, which is akin to the conventional capital charge for credit risk, both for short (short position is not allowed in India except in derivatives) and long positions, and (ii) "general market risk" charge towards interest rate risk in the portfolio, where long and short positions (which is not allowed in India except in derivatives) in different securities or instruments can be offset.

### Specific risk

4.6.4 The capital charge for specific risk is designed to protect against an adverse movement in the price of an individual security owing to factors related to the individual issuer. The specific risk charge is graduated for various exposures as follows:

Sr. No.	Nature of investment	Maturity	Specific risk capital charge (as % of exposure)
	Claims on Government		. ,
1.	Investments in Government Securities.	All	0.0
2.	Investments in other approved securities guaranteed by Central/ State Government.	All	0.0
3.	Investments in other securities where payment of interest and repayment of principal are guaranteed by Central Govt. (This will include investments in Indira/Kisan Vikas Patra (IVP/KVP) and investments in Bonds and Debentures where payment of interest and principal is guaranteed by Central Govt.)	All	0.0
4.	Investments in other securities where payment of interest and repayment of principal are guaranteed by State Governments.	All	0.0
5.	Investments in other approved securities where payment of interest and repayment of principal are not guaranteed by Central/State Govt.	All	1.80
6.	Investments in Government guaranteed securities of Government Undertakings which do not form part of the approved market borrowing programme.	All	1.80
7	Investment in state government guaranteed securities included under items 2, 4 and 6 above where the investment is non-performing. However the banks need to maintain capital at 9.0% only on those State Government guaranteed securities issued by the defaulting entities and not on all the securities issued or guaranteed by that State Government.	All	9.00
	Claims on Banks		
8	Claims on banks, including investments in securities which are guaranteed by banks as to payment of interest and repayment of principal	term to final	0.30

Sr. No.	Nature of investment	Maturity	Specific risk capital charge (as % of exposure)
		For residual term to final maturity between 6 and 24 months	1.125
		For residual term to final maturity exceeding 24 months	1.80
9.	Investments in subordinated debt instruments and bonds issued by other banks for their Tier II capital.	All	9.00
	Claims on Others		
10.	Investment in Mortgage Backed Securities (MBS) of residential assets of Housing Finance Companies (HFCs) which are recognised and supervised by National Housing Bank (subject to satisfying terms & conditions given in <i>Annexure</i> 2B).	All	6.75
11.	Investment in securitised paper pertaining to an infrastructure facility. (subject to satisfying terms & conditions given in Annexure 3).	All	4.50
12.	All other investments	All	9.00

4.6.5. The category 'claim on government' will include all forms of government securities including dated Government securities, Treasury bills and other short-term investments and instruments where repayment of both principal and interest are fully guaranteed by the Government. The category 'Claims on Others' will include issuers of securities other than Government and banks.

# **General Market Risk**

- 4.6.6. The capital requirements for general market risk are designed to capture the risk of loss arising from changes in market interest rates. The capital charge is the sum of four components:
- the net short (short position is not allowed in India except in derivatives) or long position in the whole trading book;

- a small proportion of the matched positions in each time-band (the "vertical disallowance");
- a larger proportion of the matched positions across different time-bands (the "horizontal disallowance"), and
- a net charge for positions in options, where appropriate.
- 4.6.7. The Basle Committee has suggested two broad methodologies for computation of capital charge for market risks. One is the standardised method and the other is the banks' internal risk management models method. As banks in India are still in a nascent stage of developing internal risk management models, it has been decided that, to start with, banks may adopt the standardised method. Under the standardised method there are two principal methods of measuring market risk, a "maturity" method and a "duration" method. As "duration" method is a more accurate method of measuring interest rate risk, it has been decided to adopt standardised duration method to arrive at the capital charge. Accordingly, banks are required to measure the general market risk charge by calculating the price sensitivity (modified duration) of each position separately. Under this method, the mechanics are as follows:
  - first calculate the price sensitivity (modified duration) of each instrument;
  - next apply the assumed change in yield to the modified duration of each instrument between 0.6 and 1.0 percentage points depending on the maturity of the instrument (see Table-1 below);
  - slot the resulting capital charge measures into a maturity ladder with the fifteen time bands as set out in Table-1:
  - subject long and short positions (short position is not allowed in India except in derivatives) in each time band to a 5 per cent vertical disallowance designed to capture basis risk; and
  - carry forward the net positions in each time-band for horizontal offsetting subject to the disallowances set out in Table-2.

Table 1

Duration method – time bands and assumed changes in yield

Time Bands	Assumed
	Change in Yield
Zone 1	
1 month or less	1.00
1 to 3 months	1.00
3 to 6 months	1.00
6 to 12 months	1.00
Zone 2	
1.0 to 1.9 years	0.90
1.9 to 2.8 years	0.80
2.8 to 3.6 years	0.75
Zone 3	
3.6 to 4.3 years	0.75
4.3 to 5.7 years	0.70
5.7 to 7.3 years	0.65
7.3 to 9.3 years	0.60
9.3 to 10.6 years	0.60
10.6 to 12 years	0.60
12 to 20 years	0.60
over 20 years	0.60

**Table 2**Horizontal Disallowances

	Zones	Time band	Within the	Between	Between zones
			zones	adjacent zones	1 and 3
)	-	month or less			
7	Zone 1	1 to 3 months	40%		
}		3 to 6 months	, ,		
		6 to 12 months		40%	
J		1 <del>,0</del> to 1.9 years		4070	
<sup>)</sup> Z	Zone 2	1.9 to 2.8 years	30%		100%
		2.8 to 3.6 years			10070
		3.6 to 4.3 years		40%	
		4.3 to 5.7 years			
	Τ:	5.7 to 7.3 years	30%		
_	Zone 3	7.3 to 9.3 years			
	zone 3	9.3 to 10.6 years			
		10.6 to 12 years			
		12 to 20 years			
		over 20 years			

## Capital charge for interest rate derivatives

- 4.6.8 The measurement of capital charge for market risks should include all interest rate derivatives and off-balance sheet instruments in the trading book and derivatives entered into for hedging trading book exposures which would react to changes in the interest rates, like FRAs, interest rate positions etc. The details of measurement of capital charge for interest rate derivatives are furnished in **Attachment I**. Details of computing capital charges for market risks in major currencies are detailed in **Attachment II**. In the case of residual currencies the gross positions in each time-band will be subject to the assumed change in yield set out in Table-1 with no further offsets.
- 4.6.9 Two examples for computing capital charge for market risks, including the vertical and horizontal disallowances are given in Para 7 below.

### **Section C**

## 4.7 Measurement of capital charge for equities in the trading book

4.7.1 Minimum capital requirement to cover the risk of holding or taking positions in equities in the trading book is set out below. This is applied to all instruments that exhibit market behaviour similar to equities but not to non-convertible preference shares (which are covered by the interest rate risk requirements described earlier). The instruments covered include equity shares, whether voting or non-voting, convertible securities that behave like equities, for example: units of mutual funds, and commitments to buy or sell equity.

## Specific and general market risk

4.7.2 Capital charge for specific risk (akin to credit risk) will be 9% and specific risk is computed on the banks' gross equity positions (i.e. the sum of all long equity positions and of all short equity positions – short equity position is, however, not allowed for banks in India). The general market risk charge will also be 9% on the gross equity positions.

## **Section D**

# 4.8. Measurement of capital charge for foreign exchange and gold open positions

4.8.1 Foreign exchange open positions and gold open positions are at present risk-weighted at 100%. Thus, capital charge for foreign exchange and gold open position is 9% at present. These open positions, **limits or actual whichever is higher**, would continue to attract capital charge at 9%. This is in line with the Basel Committee requirement.

## 5. Capital Adequacy for Subsidiaries

- 5.1 The Basel Committee on Banking Supervision has proposed that the New Capital Adequacy Framework should be extended to include, on a consolidated basis, holding companies that are parents of banking groups. On prudential considerations, it is necessary to adopt best practices in line with international standards, while duly reflecting local conditions.
- 5.2 Accordingly, banks may voluntarily build-in the risk weighted components of their subsidiaries into their own balance sheet on notional basis, at par with the risk weights applicable to the bank's own assets. Banks should earmark additional capital in their books over a period of time so as to obviate the possibility of impairment to their net worth when switchover to unified balance sheet for the group as a whole is adopted after sometime. The additional capital required may be provided in the bank's books in phases, beginning from the year ended March 2001.
- 5.3 A Consolidated bank defined as a group of entities which include a licensed bank should maintain a minimum Capital to Risk-weighted Assets Ratio (CRAR) as applicable to the parent bank on an ongoing basis from the year ended 31 March 2003. While computing capital funds, parent bank may consider the following points:
  - (i) Banks are required to maintain a minimum capital to risk weighted assets ratio of 9%. Non-bank subsidiaries are required to maintain the capital adequacy ratio prescribed by their respective regulators. In case of any shortfall in the capital adequacy ratio of any of the subsidiaries, the

parent should maintain capital in addition to its own regulatory requirements to cover the shortfall.

(ii) Risks inherent in deconsolidated entities (i.e., entities which are not consolidated in the Consolidated Prudential Reports) in the group need to be assessed and any shortfall in the regulatory capital in the deconsolidated entities should be deducted (in equal proportion from Tier 1 and Tier 2 capital) from the consolidated bank's capital in the proportion of its equity stake in the entity.

## 6. Procedure

- 6.1 While calculating the aggregate of funded and non-funded exposure of a borrower for the purpose of assignment of risk weight, banks may 'net-off' against the total outstanding exposure of the borrower -
  - (a) advances collateralised by cash margins or deposits,
  - (b) credit balances in current or other accounts which are not earmarked for specific purposes and free from any lien,
  - (c) in respect of any assets where provisions for depreciation or for bad debts have been made
  - (d) claims received from DICGC/ ECGC and kept in a separate account pending adjustment, and
  - (e) subsidies received against advances in respect of Government sponsored schemes and kept in a separate account.
- 6.2 After applying the conversion factor as indicated in Annexure 2, the adjusted off Balance Sheet value shall again be multiplied by the risk weight attributable to the relevant counter-party as specified.
- 6.3 Foreign exchange contracts with an original maturity of 14 calendar days or less, irrespective of the counterparty, may be assigned "zero" risk weight as per international practice.

- 6.4 Foreign Exchange and Interest Rate related Contracts
- (i) Foreign exchange contracts include the following:
  - (a) Cross currency interest rate swaps
  - (b) Forward foreign exchange contracts
  - (c) Currency futures
  - (d) Currency options purchased
  - (e) Other contracts of a similar nature
- (ii) As in the case of other off-Balance Sheet items, a two stage calculation prescribed below shall be applied:
  - (a) **Step 1** The notional principal amount of each instrument is multiplied by the conversion factor given below:

Original Maturity	Conversion
	Factor
Less than one year	2%
One year and less than two years	5%
	(i.e. 2% + 3%)
For each additional year	3%

- (b) **Step 2** The adjusted value thus obtained shall be multiplied by the risk weightage allotted to the relevant counter-party as given in IIA and above.
- (iii) Interest rate contracts include the following:
  - (a) Single currency interest rate swaps
  - (b) Basis swaps
  - (c) Forward rate agreements
  - (d) Interest rate futures
  - (e) Interest rate options purchased
  - (f) Other contracts of a similar nature
- (iv) As in the case of other off-Balance Sheet items, a two stage calculation prescribed below shall be applied:
  - (a) **Step 1** The notional principal amount of each instrument is multiplied by the percentages given below:

Original Maturity	Conversion Factor
Less than one year	0.5%
One year and less than two years	1.0%
For each additional year	1.0%

(b) **Step 2** - The adjusted value thus obtained shall be multiplied by the risk weightage allotted to the relevant counter-party as given in IIA above.

# 6.5 Aggregation of capital charge for market risks

Calculation of the risk-weighted assets for market risk

6.5.1. As explained earlier capital charges for specific risk and general market risk are to be computed separately before aggregation. For computing the total capital charge for market risks, the calculations may be plotted in the following table:

## Proforma 1

(Rs. in crore)

Risk Category	Capital charge
I. Interest Rate (a+b)	
a. General market risk	
Net position (parallel shift)	
<ul> <li>Horizontal disallowance (curvature)</li> </ul>	
<ul> <li>Vertical disallowance (basis)</li> </ul>	
<ul> <li>Options</li> </ul>	
b. Specific risk	
II. Equity (a+b)	
a. General market risk	
b. Specific risk	
III. Foreign Exchange & Gold	
IV.Total capital charge for market risks (I+II+III)	

# 6.5.2 Calculation of total risk-weighted assets and capital ratio

- Arrive at the risk weighted assets for credit risk in the banking book and for counterparty credit risk on all OTC derivatives.
- b) Convert the capital charge for market risk to notional risk weighted assets by multiplying the capital charge arrived at as above in

Proforma-1 by  $100 \div 9$  [the present requirement of CRAR is 9% and hence notional risk weighted assets are arrived at by multiplying the capital charge by  $(100 \div 9)$ ]

- c) Add the risk-weighted assets for credit risk as at (a) above and notional risk-weighted assets of trading book as at (b) above to arrive at total risk weighted assets for the bank.
- d) Compute capital ratio on the basis of regulatory capital maintained and risk-weighted assets.

## Computation of capital available for market risk:

6.5.3 Capital required for supporting credit risk should be deducted from total capital funds to arrive at capital available for supporting market risk. This is illustrated below:

## Illustration 1

(Rs. in Crore)

1	Capital funds	Ì	105
	Tier I capital	55	
	Tier II capital	50	
2	Total risk weighted assets		1140
	RWA for credit risk	1000	
	RWA for market risk	140	
3	Total CRAR		9.21
4	Minimum capital required to support credit risk (1000*9%)		90
	<ul> <li>Tier I - 45 (@ 4.5% of 1000)</li> </ul>	45	
	<ul> <li>Tier II - 45 (@ 4.5% of 1000)</li> </ul>	45	
5	Capital available to support market risk (105 - 90)		15
	• Tier I - (55 - 45)	10	
	• Tier II - (50 - 45)	5	

# 7. Worked out examples for computing capital charge for credit and market risks

- 7.1. Example indicating computation of capital charge for credit and market risks – without equities and interest rate related derivative instruments is given below:
- 7.1.1 A bank may have the following position:

SI.	Details	Amount
No		Rs. Crore
1	Cash & Balances with RBI	200.00
2	Bank balances	200.00
3	<u>Investments</u> :	
	Held for Trading	500.00
	Available for Sale	1000.00
	Held to Maturity	500.00
4	Advances (net)	2000.00
5	Other Assets	300.00
6	Total Assets	4700.00

# 7.1.2 In terms of counter party, the investments are assumed to be as under:

Government - Rs.1000 crore
Banks - Rs. 500 crore
Others - Rs. 500 crore

For simplicity sake let us assume the details of investments as under: Government securities

Date of	Date of	Maturity	Amount	Coupon	Тур
Issue	reporting	Date	Rs.in	(%)	е
			crore		
01/03/1992	31/03/2003	01/03/2004	100	12.50	AFS
01/05/1993	31/03/2003	01/05/2003	100	12.00	AFS
01/03/1994	31/03/2003	31/05/2003	100	12.00	AFS
01/03/1995	31/03/2003	01/03/2015	100	12.00	AFS
01/03/1998	31/03/2003	01/03/2010	100	11.50	AFS
01/03/1999	31/03/2003	01/03/2009	100	11.00	AFS
01/03/2000	31/03/2003	01/03/2005	100	10.50	HFT
01/03/2001	31/03/2003	01/03/2006	100	10.00	HTM
01/03/2002	31/03/2003	01/03/2012	100	8.00	HTM
01/03/2003	31/03/2003	01/03/2023	100	6.50	HTM
Total			1000		

## **Bank Bonds**

Date of Issue	Date of reporting	Maturity Date	Amount Rs. in crore	Coupon (%)	Туре
01/03/1992	31/03/2003	01/03/2004	100	12.50	AFS
01/05/1993	31/03/2003	01/05/2003	100	12.00	AFS
01/03/1994	31/03/2003	31/05/2003	100	12.00	AFS
01/03/1995	31/03/2003	01/03/2006	100	12.50	AFS
01/03/1998	31/03/2003	01/03/2007	100	11.50	HFT
Total			500		

### **Others**

Date of Issue	Date of reporting	Maturity Date	Amount Rs. in	Coupon (%)	Туре
			crore		
01/03/1992	31/03/2003	01/03/2004	100	12.50	HFT
01/05/1993	31/03/2003	01/05/2003	100	12.00	HFT
01/03/1994	31/03/2003	31/05/2003	100	12.00	HFT
01/03/1995	31/03/2003	01/03/2006	100	12.50	HTM
01/03/1998	31/03/2003	01/03/2017	100	11.50	HTM
Total			500		

## 7.1.3 Computation of risk weighted assets

A. Risk weighted assets for credit risk

As per the guidelines, held for trading and available for sale securities would qualify to be categorized as Trading Book. Thus trading book in the instant case would be Rs.1500 crore. While computing the credit risk, the securities held under trading book would be excluded and hence the credit risk based risk-weights would be as under:

(Rs. in crore)

SI.N o.	Details of Assets	Book Value	Risk Weight (%)	Risk weighted Assets
1	Cash & balances with RBI	200	0	0
2	Bank balances	200	20	40
3	Investments:			
	Government	300	0	0
	Banks	0	20	0
	Others	200	100	200
4	Advances (net)	2000	100	2000
5	Other Assets	300	100	300
6	Total Assets	3200		
7	Total RWAs			2540

# B. Risk weighted assets for market risk

Computation of capital charge for Trading Book:

- a. Specific Risk
- (i) Government securities: Rs.700 crore Nil
- (ii) Banks:

(Rs. in crore)

Details	Capital	Amount	Capital
	charge		charge
For residual term to final maturity 6	0.30%	200	0.60
months or less			
For residual term to final maturity	1.125%	100	1.125
between 6 and 24 months			
For residual term to final maturity	1.80%	200	3.60
exceeding 24 months			
Total		500	5.325

(iii) Others: Rs.300 crore @ 9% =Rs. 27 crore

(i)+(ii)+(iii) = Rs.0 crore+Rs.5.325 crore + Rs.27 crore = Rs. 32.325 crore

Therefore, capital charge for specific risk in trading book is Rs.32.33 crore.

# b. General Market Risk

Modified duration is used to arrive at the price sensitivity of an interest rate related instrument.

For all the securities listed below, date of reporting is taken as 31/3/2003. (Rs. in crore)

Counter	Maturity	Amount	Coupo	Capital Charge
Party	Date	(market	n	for general
		value)	(%)	market risk
Govt.	01/03/2004	100	12.50	0.84
Govt.	01/05/2003	100	12.00	0.08
Govt.	31/05/2003	100	12.00	0.16
Govt.	01/03/2015	100	12.50	3.63
Govt.	01/03/2010	100	11.50	2.79
Govt.	01/03/2009	100	11.00	2.75
Govt.	01/03/2005	100	10.50	1.35
Banks	01/03/2004	100	12.50	0.84
Banks	01/05/2003	100	12.00	0.08
Banks	31/05/2003	100	12.00	0.16
Banks	01/03/2006	100	12.50	1.77
Banks	01/03/2007	100	11.50	2.29
Others	01/03/2004	100	12.50	0.84
Others	01/05/2003	100	12.00	0.08
Others	31/05/2003	100	12.00	0.16
	Total	1500		17.82

c. Adding the capital charges for specific risk as well as general market risk would give the total capital charge for the trading book of interest rate related

instruments. Therefore, capital charge for Market Risks = Rs.32.33 crore + Rs.17.82 crore, i.e., Rs.50.15 crore.

d. To facilitate computation of CRAR for the whole book, this capital charge needs to be converted into equivalent risk weighted assets. In India, the minimum CRAR is 9%. Hence, the capital charge could be converted to risk weighted assets by multiplying the capital charge by  $(100 \div 9)$ , Thus risk weighted assets for market risk is  $50.15*(100 \div 9) = Rs.557.23$  crore.

## 7.1.4 Computing the capital ratio:

(Rs. in Crore)

1	Total Capital	400
2	Risk weighted assets for Credit Risk	2540.00
3	Risk weighted assets for Market Risk	557.23
4	Total Risk weighted assets (2+3)	3097.23
5	CRAR [(1÷4)*100]	12.91 %

7.2 Example indicating computation of capital charge for credit and market risks – with equities and interest rate related derivative instruments. Foreign exchange and gold open positions also have been assumed.

# 7.2.1 A bank may have the following position:

SI.	Details	Amount
No		Rs. Crore
1	Cash & Balances with	200.00
2	Bank balances	200.00
3	Investments:  Held for Trading Available for Sale Held to Maturity	500.00 1000.00 500.00 300.00
4	Equities Advances (net)	2000.00
5	Other Assets	300.00
6	Total Assets	5000.00

In addition,

(a) foreign exchange open position limit is assumed as Rs.60 crore and

- (b) Gold open position is assumed at Rs.40 crore.
- (c) Let us also assume that the bank is having the following **positions in interest** rate related derivatives:
  - (i) Interest Rate Swaps (IRS), Rs.100 crore bank received floating rate interest and pays fixed, next interest fixing after 6 months, residual life of swap 8 years, and
  - (ii) Long position in interest rate future (IRF), Rs.50 crore, delivery after 6 months, life of underlying government security 3.5 years.
- 7.2.2 In terms of counter party the investments are assumed to be as under:
  - a) Interest rate related securities

Government - Rs.1000 crore
Banks - Rs. 500 crore
Others - Rs. 500 crore

b) Equities

Others - Rs.300 crore

For simplicity sake let us assume the details of investments in interest rate related securities as under:

#### **Government securities**

Date of	Date of	Maturity	Amount	Coup	Type
Issue	reporting	Date	Rs.crore	on	
				(%)	
01/03/1992	31/03/2003	01/03/2004	100	12.50	AFS
01/05/1993	31/03/2003	01/05/2003	100	12.00	AFS
01/03/1994	31/03/2003	31/05/2003	100	12.00	AFS
01/03/1995	31/03/2003	01/03/2015	100	12.50	AFS
01/03/1998	31/03/2003	01/03/2010	100	11.50	AFS
01/03/1999	31/03/2003	01/03/2009	100	11.00	AFS
01/03/2000	31/03/2003	01/03/2005	100	10.50	HFT
01/03/2001	31/03/2003	01/03/2006	100	10.00	HTM
01/03/2002	31/03/2003	01/03/2012	100	8.00	HTM
01/03/2003	31/03/2003	01/03/2023	100	6.50	HTM
Total			1000		

#### **Bank Bonds**

Date of	Date of	Maturity	Amount		Туре
Issue	reporting	Date	Rs.crore	Coupon	
				(%)	
01/03/1992	31/03/2003	01/03/2004	100	12.50	AFS
01/05/1993	31/03/2003	01/05/2003	100	12.00	AFS
01/03/1994	31/03/2003	31/05/2003	100	12.00	AFS
01/03/1995	31/03/2003	01/03/2006	100	12.50	AFS
01/03/1998	31/03/2003	01/03/2007	100	11.50	HFT
Total			500		

#### **Others**

Date of Issue	Date of reporting	Maturity Date	Amount Rs.crore	Coupon (%)	Туре
01/03/1992	31/03/2003	01/03/2004	100	12.50	HFT
01/05/1993	31/03/2003	01/05/2003	100	12.00	HFT
01/03/1994	31/03/2003	31/05/2003	100	12.00	HFT
01/03/1995	31/03/2003	01/03/2006	100	12.50	HTM
01/03/1998	31/03/2003	01/03/2017	100	11.50	HTM
Total			500		

## 7.2.3 Computation of risk weighted assets

## A. Risk weighted assets for credit risk

As per the guidelines, held for trading and available for sale securities would qualify to be categorized as Trading Book. Thus trading book in respect of interest rate related investments in the instant case would be Rs.1500 crore. In addition, equities position of Rs.300 crore would be in the trading book. The derivative products held by banks are to be considered as part of trading book. Open position on foreign exchange and gold also would be considered for market risk. While computing the capital charge for credit risk, the securities held under trading book would be excluded and hence the credit risk based risk-weights would be as under:

(Rs. in crore)

Details of Assets	Book Value	Risk Weight	Risk weighted Assets
Cash& RBI	200	0%	0
Bank balances	200	20%	40

Investments in (HTM category)			
Government	300	0%	0
Banks	0	20%	0
Others	200	100%	200
Advances (net)	2000	100%	2000
Other Assets	300	100%	300
Total	4700		2540
Credit Risk for			
OTC Derivaties:			
IRS	100	1% + 1%	8.00
IRF	50	per year	4.00
		and 100%	
		RW	
Total	4850		2552.00

# B. Risk weighted assets for market risk

Computation of capital charge for the Trading Book:

- a. Specific Risk
- 1. Investments in interest rate related instruments:
  - (i) Government securities Rs.700 crore Nil
  - (ii) Banks

(Rs.crore)

Details	Capital charge	Amount	Capital Charge
For residual term to final maturity 6 months or less	0.30%	200	0.60
For residual term to final maturity between 6 and 24 months	1.125%	100	1.125
For residual term to final maturity exceeding 24 months	1.80%	200	3.60
Total		500	5.325

- (iii) Others Rs.300 crore @ 9% = Rs.27 crore
- (i)+(ii)+(iii) = Rs.0 crore+Rs.5.325 crore+Rs.27 crore = **Rs.32.325 crore**
- 2. Equities capital charge of 9% **Rs.27 crore**Therefore, capital charge for specific risk in the trading book is Rs. 59.33 crore (Rs. 32.33 crore + Rs. 27 crore).
  - b. General Market Risk
  - (1). <u>Investments in interest rate related instruments:</u>

Modified duration is used to arrive at the price sensitivity of an interest rate related instrument.

For all the securities listed below, date of reporting is taken as 31/3/2003

(Rs.crore)

Counter Party	Maturity Date	Amount market value	Coupon (%)	Capital charge for general market risk
Govt.	01/03/2004	100	12.50	0.84
Govt.	01/05/2003	100	12.00	0.08
Govt.	31/05/2003	100	12.00	0.16
Govt.	01/03/2015	100	12.50	3.63
Govt.	01/03/2010	100	11.50	2.79
Govt.	01/03/2009	100	11.00	2.75
Govt.	01/03/2005	100	10.50	1.35
Banks	01/03/2004	100	12.50	0.84
Banks	01/05/2003	100	12.00	0.08
Banks	31/05/2003	100	12.00	0.16
Banks	01/03/2006	100	12.50	1.77
Banks	01/03/2007	100	11.50	2.29
Others	01/03/2004	100	12.50	0.84
Others	01/05/2003	100	12.00	0.08
Others	31/05/2003	100	12.00	0.16
	Total	1500		17.82

# (2) Positions in interest rate related derivatives

# Interest rate swap

Counter Party	Maturity Date	Notional Amount (i.e.,market value)	Modified duration or price sensitivity	Assumed change in yield	Capital charge
GOI	30/09/2003	100	0.47	1.00	0.47
GOI	31/03/2011	100	5.14	0.60	(-) 3.08
					(-) 2.61

## Interest rate future

Counter Party	Maturity Date	Notional Amount (i.e.,market value)	Modified duration or price sensitivity	Assumed change in yield	Capital charge
GOI	30/09/2003	50	0.45	1.00	(-) 0.45
GOI	31/03/2007	50	2.84	0.75	2.13
					1.68

## (3) Disallowances

The price sensitivities calculated as above have been slotted into a duration-based ladder with fifteen time-bands (Attachment III). Long and short positions within a time band have been subjected to vertical disallowance of 5%. In the instant case, vertical disallowance is applicable under 3-6 month time band and 7.3-9.3 year time band. Then, net positions in each time band have been computed for horizontal offsetting subject to the disallowances mentioned in the table. In the instant case, horizontal disallowance is applicable only in respect of Zone 3. Horizontal disallowances in respect of adjacent zones are not applicable in the instant case.

(4) The total capital charge in this example for general market risk for interest rate related instruments is computed as under:

SI. No	Capital charge	Amount (Rs.)
1	For the vertical disallowance (under 3-6 month time band)	2,25,000
2	For the vertical disallowance (under 7.3-9.3 year time band)	13,95,000
3	For the horizontal disallowance (under Zone 3)	9,00,000
4	For the horizontal disallowances between adjacent zones	0
5	For the overall net open position (17.82 – 2.61 + 1.68)	16,89,00,000
6	Total capital charge for general market risk on interest rate related instruments (1 + 2 + 3 + 4 + 5)	17,14,00,000

## (5) Equities

Capital charge for General Market Risk for equities is 9%. Thus, general market risk capital charge on equities would work out to Rs.27 crore.

## (6) Forex / Gold Open Position

Capital charge on forex/gold position would be computed at 9%. Thus the same works out to Rs.9 crore

(7) Capital charge for market risks in this example is computed as under:

(Rs. crore)

Details	Capital charge for Specific Risk	Capital charge for General Market Risk
Interest Rate Related	32.33	17.14
Equities	27.00	27.00
Forex/Gold		9.00
Total	59.33	
		53.14

Total capital charge for specific risk and general market risk: Rs. 112.47 crore.

# **Computing Capital Ratio**

7.2.4 To facilitate computation of CRAR for the whole book, this capital charge for market risks in the Trading Book needs to be converted into equivalent risk weighted assets. As in India, a CRAR of 9% is required, the capital charge could be converted to risk weighted assets by multiplying the capital charge by  $(100 \div 9)$ , i.e. Rs.  $112.47*(100 \div 9) = Rs$ . 1249.67 crore. Therefore, risk weight for market risk is: Rs. 1249.67 crore.

(Rs. Crore)

1	Total Capital	400
2	Risk weighted assets for Credit	2552.00
	Risk	
3	Risk weighted assets for Market	
	Risk	1249.67
4	Total Risk weighted assets (2+3)	
		3801.67
5	CRAR [(1÷4)*100]	
	_	10.52 %

# 8. Reporting Formats

8.1 Reporting format for the purpose or	f monitoring the capital ratio is given
hereunder:	
Name of bank:	Position as on:

# A. Capital Base

(Rs. in crore)

SI. No.	Details	Amount
A1.	Tier I Capital	
A2.	Tier II Capital	
A3.	Total Regulatory Capital	

# B. Risk Weighted Assets

B1.	Risk Weighted Assets on Banking Book			
	a) On-balance sheet assets			
	b) Contingent Credits			
	c) Forex contracts			
	d) Other off-balance sheet items			
	Total			
B2.	Risk Weighted Assets on Trading Book	AFS	Other trading book exposur es	Total
	a) Capital charge on account of Specific Risk			
	i) On interest rate related instruments			
	ii) On Equities			
	Sub-total			
	b) Capital charge on account of general market risk			
	i) On interest rate related instruments			
	ii) On Equities			
	iii) On Foreign Exchange and gold open			
	positions			
	Sub-total			
	Total Capital Charge on Trading Book			
	Total Risk weighted Assets on Trading Book			
	(total capital charge on trading book * (100/9))			
B3.	Total Risk Weighted Assets (B1 + B2)			

# C. Capital Ratio

C1	Capital to Risk-weighted Assets Ratio (CRAR)	
	(A3/B3*100)	

## D. Memo items

D1	Investment Fluctuation Reserve	
D2	Book value of securities held in HFT category	
D3	Book value of securities held in AFS category	
D4	Net unrealised gains in HFT category	
D5	Net unrealised gains in AFS category	

8.2 Banks should furnish data in the above format as on the last day of each calendar quarter to the Chief General Manager-in-Charge, Department of Banking Supervision, Central Office, World Trade Centre I, 3<sup>rd</sup> floor, Cuffe Parade, Mumbai 400 005 both in hard copy and soft copy. Soft copy in excel format may also be forwarded through e-mail to <a href="mailto:osmos@rbi.org.in">osmos@rbi.org.in</a> and <a href="mailto:dbodmrg@rbi.org.in">dbodmrg@rbi.org.in</a>...

## Attachment I (Para 4.6.8, Section B)

Measurement system in respect of interest rate derivatives and options

### A. Interest rate derivatives

The measurement system should include all interest rate derivatives and off-balance-sheet instruments in the trading book, which react to changes in interest rates, (e.g. forward rate agreements (FRAs), other forward contracts, bond futures, interest rate and cross-currency swaps and forward foreign exchange positions). Options can be treated in a variety of ways as described in B.1 below. A summary of the rules for dealing with interest rate derivatives is set out in the Table at the end of this section.

## 1. Calculation of positions

The derivatives should be converted into positions in the relevant underlying and be subjected to specific and general market risk charges as described in the guidelines. In order to calculate the capital charge, the amounts reported should be the market value of the principal amount of the underlying or of the notional underlying. For instruments where the apparent notional amount differs from the <u>effective notional</u> amount, banks must use the effective notional amount.

## (a) Futures and forward contracts, including forward rate agreements

These instruments are treated as a combination of a long and a short position in a notional government security. The maturity of a future or a FRA will be the period until delivery or exercise of the contract, plus - where applicable - the life of the underlying instrument. For example, a long position in a June three-month interest rate future (taken in April) is to be reported as a long position in a government security with a maturity of five months and a short position in a government security with a maturity of two months. Where a range of deliverable instruments may be delivered to fulfill the contract, the bank has flexibility to elect which deliverable security goes into the duration ladder but should take account of any conversion factor defined by the exchange.

## (b) Swaps

Swaps will be treated as two notional positions in government securities with relevant maturities. For example, an interest rate swap under which a bank is receiving floating rate interest and paying fixed will be treated as a long position in a 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. For swaps that pay or receive a fixed or floating interest rate against some other reference price, e.g. a stock index, the interest rate component should be slotted into the appropriate repricing maturity category, with the equity component being included in the equity framework.

Separate legs of cross-currency swaps are to be reported in the relevant maturity ladders for the currencies concerned.

## 2. Calculation of capital charges for derivatives under the standardised methodology

## (a) Allowable offsetting of matched positions

Banks may exclude the following 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.
- A matched position in a future or forward and its corresponding underlying may also be fully offset, (the leg representing the time to expiry of the future should however be reported) and thus excluded from the calculation.

When the future or the forward comprises a range of deliverable instruments, offsetting of positions in the future or forward contract and its underlying is only permissible in cases where there is a readily identifiable underlying security which is most profitable for the trader with a short position to deliver. The price of this security, sometimes called the "cheapest-to-deliver", and the price of the future or forward contract should in such cases move in close alignment.

No offsetting will be allowed between positions in different currencies; the separate legs of cross-currency swaps or forward foreign exchange deals are to be treated as notional positions in the relevant instruments and included in the appropriate calculation for each currency.

In addition, opposite positions in the same category of instruments can in certain circumstances be regarded as matched and allowed to offset fully. To qualify for this treatment the positions must relate to the same underlying instruments, be of the same nominal value and be denominated in the same currency. In addition:

- for futures: offsetting positions in the notional or underlying instruments to which the futures contract relates must be for identical products and mature within seven days of each other;
- for swaps and FRAs: the reference rate (for floating rate positions) must be identical and the coupon closely matched (i.e. within 15 basis points); and
- for swaps, FRAs and forwards: the next interest fixing date or, for fixed coupon positions or forwards, the residual maturity must correspond within the following limits:
  - less than one month hence: same day;
  - o between one month and one year hence: within seven days;
  - o over one year hence: within thirty days.

Banks with large swap books may use alternative formulae for these swaps to calculate the positions to be included in the duration ladder. The method would be to calculate the sensitivity of the net present value implied by the change in yield used in the duration method and allocate these sensitivities into the time-bands set out in Table 1 in Section B.

## (b) Specific risk

Interest rate and currency swaps, FRAs, forward foreign exchange contracts and interest rate futures will not be subject to a specific risk charge. This exemption also applies to futures on an interest rate index (e.g. LIBOR). However, in the case of futures contracts where the underlying is a debt security, or an index representing a basket of debt securities, a specific risk charge will apply according to the credit risk of the issuer as set out in paragraphs above.

## (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 in paragraphs above. The various categories of instruments should be slotted into the maturity ladder and treated according to the rules identified earlier.

Table - Summary of treatment of interest rate derivatives

Instrument	Specific risk charge	General Market risk charge
Exchange-traded future  - Government debt security  - Corporate debt security  - Index on interest rates (e.g. MIBOR)	No Yes No	Yes, as two positions Yes, as two positions Yes, as two positions
OTC forward  - Government debt security  - Corporate debt security  - Index on interest rates (e.g. MIBOR)	No Yes No	Yes, as two positions Yes, as two positions Yes, as two positions
FRAs, Swaps	No	Yes, as two positions
Forward Foreign Exchange	No	Yes, as one position in each currency
Options - Government debt security - Corporate debt security - Index on interest rates (e.g. MIBOR) - FRAs, Swaps	No Yes No No	

### **B.** Treatment of Options

- 1. In recognition of the wide diversity of banks' activities in options and the difficulties of measuring price risk for options, alternative approaches are permissible as under:
- those banks which solely use purchased options<sup>1</sup> will be free to use the simplified approach described in Section I below;

<sup>1</sup> Unless all their written option positions are hedged by perfectly matched long positions in exactly the same options, in which case no capital charge for market risk is required

- those banks which also write options will be expected to use one of the intermediate approaches as set out in Section II below.
- 2. In the **simplified approach**, the positions for the options and the associated underlying, cash or forward, are not subject to the standardised methodology but rather are "carved-out" and subject to separately calculated capital charges that incorporate both general market risk and specific risk. The risk numbers thus generated are then added to the capital charges for the relevant category, i.e. interest rate related instruments, equities, and foreign exchange as described in Sections B to D. The delta-plus method uses the sensitivity parameters or "Greek letters" associated with options to measure their market risk and capital requirements. Under this method, the delta-equivalent position of each option becomes part of the standardised methodology set out in Section B to D with the delta-equivalent amount subject to the applicable general market risk charges. Separate capital charges are then applied to the gamma and vega risks of the option positions. The *scenario approach* uses simulation techniques to calculate changes in the value of an options portfolio for changes in the level and volatility of its associated underlyings. Under this approach, the general market risk charge is determined by the scenario "grid" (i.e. the specified combination of underlying and volatility changes) that produces the largest loss. For the delta-plus method and the scenario approach the specific risk capital charges are determined separately by multiplying the delta-equivalent of each option by the specific risk weights set out in Section B and Section C.

## I. Simplified approach

3. Banks which handle a limited range of purchased options only will be free to use the simplified approach set out in Table A, on page 32, for particular trades. 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.1,000 x 18% (i.e. 9% specific plus 9% general market risk) = Rs.180, less the amount the option is in the money (Rs.11 – Rs.10) x 100 = Rs.100, i.e. the capital charge would be Rs.80. A similar methodology applies for options whose underlying is a foreign currency or an interest rate related instrument.

Table A

Simplified approach: capital charges

Position	Treatment
Long cash and Long put	The capital charge will be the market value of the
Or	underlying security <sup>2</sup> multiplied by the sum of

<sup>2</sup> In some cases such as foreign exchange, it may be unclear which side is the "underlying security"; this should be taken to be the asset which would be received if the option were exercised. In addition the nominal value should be used for items where the market value of the underlying instrument could be zero, e.g. caps and floors, swaptions etc.

<sup>&</sup>lt;sup>3</sup> Some options (e.g. where the underlying is an interest rate or a currency) bear no specific risk, but specific risk will be present in the case of options on certain interest rate-related instruments (e.g. options on a corporate debt security or corporate bond index; see Section B for the relevant capital charges) and for options on equities and stock indices (see Section C). The charge under this measure for currency options will be 9%.

Position	Treatment
Short cash and Long call	specific and general market risk charges <sup>3</sup> for the underlying less the amount the option is in the money (if any) bounded at zero <sup>4</sup>
Long call or Long put	The capital charge will be the lesser of: (i) the market value of the underlying security multiplied by the sum of specific and general market risk charges <sup>3</sup> for the underlying (ii) the market value of the option <sup>5</sup>

## II. Intermediate approaches

## (a) Delta-plus method

4. Banks which write options will be allowed to include delta-weighted options positions within the standardised methodology set out in Section B - D. Such options should be reported as a position equal to the market value of the underlying multiplied by the delta.

However, since delta does not sufficiently cover the risks associated with options positions, banks will also be required to measure gamma (which measures the rate of change of delta) and vega (which measures the sensitivity of the value of an option with respect to a change in volatility) sensitivities in order to calculate the total capital charge. These sensitivities will be calculated according to an approved exchange model or to the bank's proprietary options pricing model subject to oversight by the Reserve Bank of India<sup>6</sup>.

5. Delta-weighted positions with *debt securities or interest rates as the underlying* will be slotted into the interest rate time-bands, as set out in Table 1 of Section B, under the following procedure. A two-legged approach should be used as for other derivatives, requiring one entry at the time the underlying contract takes effect and a second at the time the underlying contract matures. For instance, a bought call option on a June three-month interest-rate future will in April be considered, on the basis of its delta-equivalent value, to be a long position with a maturity of five months and a short position with a maturity of two months<sup>7</sup>. The written option will be

<sup>4</sup> For options with a residual maturity of more than six months, the strike price should be compared with the forward, not current, price. A bank unable to do this must take the "in-the-money" amount to be zero.

<sup>&</sup>lt;sup>5</sup> Where the position does not fall within the trading book (i.e. options on certain foreign exchange or commodities positions not belonging to the trading book), it may be acceptable to use the book value instead.

<sup>&</sup>lt;sup>6</sup> Reserve Bank of India may wish to require banks doing business in certain classes of exotic options (e.g. barriers, digitals) or in options "at-the-money" that are close to expiry to use either the scenario approach or the internal models alternative, both of which can accommodate more detailed revaluation approaches.

<sup>&</sup>lt;sup>7</sup> A two-months call option on a bond future, where delivery of the bond takes place in September, would be considered in April as being long the bond and short a five-months deposit, both positions being delta-weighted.

similarly slotted as a long position with a maturity of two months and a short position with a maturity of five months. Floating rate instruments with caps or floors will be treated as a combination of floating rate securities and a series of European-style options. For example, the holder of a three-year floating rate bond indexed to six month LIBOR with a cap of 15% will treat it as:

- (i) a debt security that reprices in six months; and
- (ii) a series of five written call options on a FRA with a reference rate of 15%, each with a negative sign at the time the underlying FRA takes effect and a positive sign at the time the underlying FRA matures<sup>8</sup>.
- 6. The capital charge for *options with equities as the underlying* will also be based on the delta-weighted positions which will be incorporated in the measure of market risk described in Section C. For purposes of this calculation each national market is to be treated as a separate underlying. The capital charge for *options on foreign exchange* and gold positions will be based on the method set out in Section D. For delta risk, the net delta-based equivalent of the foreign currency and gold options will be incorporated into the measurement of the exposure for the respective currency (or gold) position.
- 7. In addition to the above capital charges arising from delta risk, there will be further capital charges for *gamma* and for *vega risk*. Banks using the delta-plus method will be required to calculate the gamma and vega for each option position (including hedge positions) separately. The capital charges should be calculated in the following way:
  - (i) for **each individual option** a "gamma impact" should be calculated according to a Taylor series expansion as:

Gamma impact = ½ x Gamma x VU<sup>2</sup>

where VU = Variation of the underlying of the option.

- (ii) VU will be calculated as follows:
  - for interest rate options if the underlying is a bond, the price sensitivity should be worked out as explained. An equivalent calculation should be carried out where the underlying is an interest rate.
  - for options on equities and equity indices; which are not permitted at present, the market value of the underlying should be multiplied by 9%<sup>9</sup>;
  - for foreign exchange and gold options: the market value of the underlying should be multiplied by 9%;
- (iii) For the purpose of this calculation the following positions should be treated as *the same underlying*:

<sup>&</sup>lt;sup>8</sup> The rules applying to closely-matched positions set out in paragraph 2 (a) of this Attachment will also apply in this respect.

<sup>&</sup>lt;sup>9</sup> The basic rules set out here for interest rate and equity options do not attempt to capture specific risk when calculating gamma capital charges. However, Reserve Bank may require specific banks to do so.

- for interest rates, 10 each time-band as set out in Table 1 of Section B; 11
- for equities and stock indices, each national market;
- for foreign currencies and gold, each currency pair and gold;
- (iv) Each option on the same underlying will have a gamma impact that is either positive or negative. These individual gamma impacts will be summed, resulting in a net gamma impact for each underlying that is either positive or negative. Only those net gamma impacts that are negative will be included in the capital calculation.
- (v) The total gamma capital charge will be the sum of the absolute value of the net negative gamma impacts as calculated above.
- (vi) For **volatility risk**, banks will be required to calculate the capital charges by multiplying the sum of the vegas for all options on the same underlying, as defined above, by a proportional shift in volatility of ±25%.
- (vii) The *total capital charge* for vega risk will be the sum of the absolute value of the individual capital charges that have been calculated for vega risk.

## (b) Scenario approach

- 8. More sophisticated banks will also have the right to base the market risk capital charge for options portfolios and associated hedging positions on *scenario matrix analysis*. This will be accomplished by specifying a fixed range of changes in the option portfolio's risk factors and calculating changes in the value of the option portfolio at various points along this "grid". For the purpose of calculating the capital charge, the bank will revalue the option portfolio using matrices for simultaneous changes in the option's underlying rate or price and in the volatility of that rate or price. A different matrix will be set up for each individual underlying as defined in paragraph 7 above. As an alternative, at the discretion of each national authority, banks which are significant traders in options for interest rate options will be permitted to base the calculation on a minimum of six sets of time-bands. When using this method, not more than three of the time-bands as defined in Section B should be combined into any one set.
- 9. The options and related hedging positions will be evaluated over a specified range above and below the current value of the underlying. The range for interest rates is consistent with the assumed changes in yield in Table 1 of Section B. Those banks using the alternative method for interest rate options set out in paragraph 8 above should use, for each set of time-bands, the highest of the assumed changes in yield applicable to the group to which the time-bands belong. The other ranges are ±9 % for equities and ±9 % for foreign exchange and gold. For all risk categories, at least

<sup>&</sup>lt;sup>10</sup> Positions have to be slotted into separate maturity ladders by currency.

<sup>11</sup> Banks using the duration method should use the time-bands as set out in Table 1 of Section B

<sup>&</sup>lt;sup>12</sup> If, for example, the time-bands 3 to 4 years, 4 to 5 years and 5 to 7 years are combined, the highest assumed change in yield of these three bands would be 0.75.

seven observations (including the current observation) should be used to divide the range into equally spaced intervals.

- 10. The second dimension of the matrix entails a change in the volatility of the underlying rate or price. A single change in the volatility of the underlying rate or price equal to a shift in volatility of + 25% and 25% is expected to be sufficient in most cases. As circumstances warrant, however, the Reserve Bank may choose to require that a different change in volatility be used and / or that intermediate points on the grid be calculated.
- 11. After calculating the matrix, each cell contains the net profit or loss of the option and the underlying hedge instrument. The capital charge for each underlying will then be calculated as the largest loss contained in the matrix.
- 12. In drawing up these intermediate approaches it has been sought to cover the major risks associated with options. In doing so, it is conscious that so far as specific risk is concerned, only the delta-related elements are captured; to capture other risks would necessitate a much more complex regime. On the other hand, in other areas the simplifying assumptions used have resulted in a relatively conservative treatment of certain options positions.
- 13. Besides the options risks mentioned above, the RBI is conscious of the other risks also associated with options, e.g. rho (rate of change of the value of the option with respect to the interest rate) and theta (rate of change of the value of the option with respect to time). While not proposing a measurement system for those risks at present, it expects banks undertaking significant options business at the very least to monitor such risks closely. Additionally, banks will be permitted to incorporate rho into their capital calculations for interest rate risk, if they wish to do so.

## Attachment II (Para 4.6.8, Section B)

## Details of computing capital charges for positions in other currencies

Capital charges should be calculated for each currency separately and then summed with no offsetting between positions of opposite sign. In the case of those currencies in which business is insignificant (where the turnover in the respective currency is less than 5 per cent of overall foreign exchange turnover), separate calculations for each currency are not required. The bank may, instead, slot within each appropriate time-band, the net long or short position for each currency. However, these individual net positions are to be summed within each time-band, irrespective of whether they are long or short positions, to produce a gross position figure.

## Example for computing the capital charge including the vertical and horizontal disallowances on interest rate related instruments

\*\* 0.45 x 5%=0.02

@ 2.79 x 5%=0.14

# 0.29 x 30%=0.09

	0.45 x 5 /0-0.02															
	Zone 1 Zone 2 Zone 3															
Time-band	0-1 month	1-3 month	3-6 mont h	6m - 1y	1– 1.9y	1.9– 2.8y	2.8– 3.6y	3.6- 4.3y	4.3– 5.7y	5.7- 7.3y	7.3- 9.3y	9.3- 10.6y	10.6- 12y	12- 20y	Over 20y	Capital Charge
Position		0.72		2.51		1.35	1.77	2.29		2.75	2.79		3.63			17.82
Derivatives (long)			0.47					1.07								1.54
Derivatives (short)			(-)0.22								(-)3.08					(-)3.30
Net Position		0.72	0.25	2.51		1.35	1.77	3.36		2.75	(-)0.29		3.63			16.06
Vertical Disallowance (5%)			0.01**								0.14					0.15
Horizontal Disallowance 1 (under Zone 3)											0.09#					0.09
Horizontal disallowance 2																
Horizontal Disallowance 3																

#### 1. Calculation of Vertical Disallowance

While calculating capital charge for general market risk on interest rate related instruments, banks should recognize the basis risk (different types of instruments whose price responds differently for movement in general rates) and gap risk (different maturities within timebands). This is addressed by a small capital charge (5%) on matched (off-setting) positions in each time band ("Vertical Disallowance")

An off-setting position, for vertical disallowance, will be the either the sum of long positions and or the short positions within a time band, whichever is lower. In the above example, except for the time band 3-6 months in Zone 1 and the time band of 7.3-9.3 years, where there are off-setting positions of (-) 0.45 and 2.79, there is no off-setting position in any other time band. The sum of long positions in the 3-6 months time band is + 0.47 and the sum of short positions in this time band is (-) 0.45. This off-setting position of 0.45 is subjected to a capital charge of 5% i.e. 0.0225. The sum of long positions in the 7.3-9.3 years time band is + 2.79 and the sum of short positions in this time band is (-) 3.08. This off-setting position of 2.79 is subjected to a capital charge of 5% i.e. 0.1395. It may be mentioned here that if a bank does not have both long and short positions in the same time band, there is no need for any vertical disallowance. Banks in India are not allowed to take any short position in their books, except in derivatives. Therefore, banks in India will generally not be subject to vertical disallowance unless they have a short position in derivatives.

#### 2. Calculation of Horizontal Disallowance

While calculating capital charge for general market risk on interest rate related instruments, banks must subject their positions to a second round of off-setting across time bands with a view to give recognition to the fact that interest rate movements are not perfectly correlated across maturity bands (yield curve risk and spread risk) i.e matched long and short positions in different time bands may not perfectly off-set. This is achieved by a "Horizontal Disallowance".

An off-setting position, for horizontal disallowance, will be the either the sum of long positions and or the short positions within a Zone, whichever is lower. In the above example, except in Zone 3 (7.3 to 9.3 years) where there is an off-setting (matched) position of (-) 0.29, there is no off-setting position in any other Zone. The sum of long positions in this Zone is 10.81 and the sum of short positions in this Zone is (-) 0.29. This off-setting position of 0.29 is subject to horizontal disallowance as under:

With in the same Zone (Zone 3) 30% of 0.29 = 0.09 Between adjacent Zones (Zone 2 & 3) = Nil Between Zones 1 and Zone 3 = Nil

It may be mentioned here that if a bank does not have both long and short positions in different time zones, there is no need for any horizontal disallowance. Banks in India are not allowed to take any short position in their books except in derivatives. Therefore, banks in India will generally not be subject to horizontal disallowance unless they have short positions in derivatives.

## 3. Total capital charge for interest rate related instruments

For overall net position	16.89
For vertical disallowance	0.16
For horizontal disallowance in Zone 3	0.09
For horizontal disallowance in adjacent zones	nil
For horizontal disallowance between Zone 1 & 3	Nil
Total capital charge for interest rate related instruments	17.14

#### **ANNEXURE 1**

## PRUDENTIAL NORMS ON CAPITAL ADEQUACY

## Issue of unsecured bonds as Subordinated Debt by banks for raising Tier II capital

(Vide paragraph 2.4.1)

## I. Rupee Subordinated Debt

#### 1. Terms of Issue of Bond

To be eligible for inclusion in Tier - II Capital, terms of issue of the bonds as subordinated debt instruments should be in conformity with the following:

## (i) Amount

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

## (ii) Maturity period

(a) Subordinated debt instruments with an initial maturity period of less than 5 years, or with a remaining maturity of one year should not be included as part of Tier-II Capital. Further, they should be subjected to progressive discount as they approach maturity at the rates shown below:

Remaining Maturity of Instruments	Rate of
	Discount (%)
Less than one year	100
More than One year and less than Two years	80
More than Two years and less than Three years	60
More than Three years and less than Four years	40
More than Four years and less than Five years	20

(b) The bonds should have a minimum maturity of 5 years. However if the bonds are issued in the last quarter of the year i.e. from 1st January to 31st March, they should have a minimum tenure of sixty three months.

#### (iii) Rate of interest

The interest rate should not be more than 200 basis points above the yield on Government of India securities of equal residual maturity at the time of issuing

bonds. The instruments should be 'vanila' with no special features like options etc.

## (iv) Other conditions

- a) The instruments should be fully paid-up, unsecured, subordinated to the claims of other creditors, free of restrictive clauses and should not be redeemable at the initiative of the holder or without the consent of the Reserve Bank of India.
- b) Necessary permission from Foreign Exchange Department should be obtained for issuing the instruments to NRIs/OCBs/FIIs.
- c) Banks should comply with the terms and conditions, if any, set by SEBI/other regulatory authorities in regard to issue of the instruments.
- d) In the case of foreign banks rupee subordinated debt should be issued by the Head Office of the bank, through the Indian branch after obtaining specific approval from Foreign Exchange Department.

## 2. Inclusion in Tier II capital

Subordinated debt instruments will be limited to 50 per cent of Tier-I Capital of the bank. These instruments, together with other components of Tier II capital, should not exceed 100% of Tier I capital.

## 3. Grant of advances against bonds

Banks should not grant advances against the security of their own bonds.

#### 4. Compliance with Reserve Requirements

The total amount of Subordinated Debt raised by the bank has to be reckoned as liability for the calculation of net demand and time liabilities for the purpose of reserve requirements and, as such, will attract CRR/SLR requirements.

#### 5. Treatment of Investment in subordinated debt

Investments by banks in subordinated debt of other banks will be assigned 100% risk weight for capital adequacy purpose. Also, the bank's aggregate investment in Tier II bonds issued by other banks and financial institutions shall be within the overall

ceiling of 10 percent of the investing bank's total capital. The capital for this purpose will be the same as that reckoned for the purpose of capital adequacy.

## II. Subordinated Debt in foreign currency and Subordinated Debt in the form of Foreign Currency Borrowings from Head Office by foreign banks

Banks may take approval of RBI on a case-by-case basis.

## III. Reporting Requirements

The banks should submit a report to Reserve Bank of India giving details of the capital raised, such as, amount raised, maturity of the instrument, rate of interest together with a copy of the offer document soon after the issue is completed.

## ANNEXURE 1A

## PRUDENTIAL NORMS ON CAPITAL ADEQUACY

# Tier II capital - Subordinated debt - Head Office borrowings in foreign currency raised by foreign banks operating in India for inclusion in Tier II capital

(Vide paragraph 2.4.2)

Detailed guidelines on the standard requirements and conditions for Head Office borrowings in foreign currency raised by foreign banks operating in India for Inclusion, as subordinated debt in Tier II capital are as indicated below:-

## **Amount of borrowing**

2. The total amount of HO borrowing in foreign currency will be at the discretion of the foreign bank. However, the amount eligible for inclusion in Tier II capital as subordinated debt will be subject to a maximum ceiling of 50% of the Tier I capital maintained in India, and the applicable discount rate mentioned in para 5 below. Further as per extant instructions, the total of Tier II capital should not exceed 100% of Tier I capital.

## **Maturity period**

3. Head Office borrowings should have a minimum initial maturity of 5 years. If the borrowing is in tranches, each tranche will have to be retained in India for a minimum period of five years. HO borrowings in the nature of perpetual subordinated debt, where there may be no final maturity date, will not be permitted.

#### **Features**

4. The HO borrowings should be fully paid up, i.e. the entire borrowing or each tranche of the borrowing should be available in full to the branch in India. It should be unsecured, subordinated to the claims of other creditors of the foreign bank in India, free of restrictive clauses and should not be redeemable at the instance of the HO.

#### Rate of discount

5. The HO borrowings will be subjected to progressive discount as they approach maturity at the rates indicated below:

Remaining maturity of borrowing	Rate of discount
More than 5 years	Not Applicable (the entire amount can
Word than 5 years	be included as subordinated debt in Tier
	II capital subject to the ceiling
	mentioned in para 2)
More than 4 years and less than 5 years	20%
More than 3 years and less than 4 years	40%
More than 2 years and less than 3 years	60%
More than 1 year and less than 2 years	80%
Less than 1 year	100% (No amount can be treated as
	subordinated debt for Tier II capital)

#### Rate of interest

6. The rate of interest on HO borrowings should not exceed the on-going market rate. Interest should be paid at half yearly rests.

## Withholding tax

7. The interest payments to the HO will be subject to applicable withholding tax.

## Repayment

8. All repayments of the principal amount will be subject to prior approval of Reserve Bank of India, Department of Banking Operations and Development.

#### **Documentation**

9. The bank should obtain a letter from its HO agreeing to give the loan for supplementing the capital base for the Indian operations of the foreign bank. The loan documentation should confirm that the loan given by Head Office would be subordinated to the claims of all other creditors of the foreign bank in India. The loan agreement will be governed by, and construed in accordance with the Indian law. Prior approval of the RBI should be obtained in case of any material changes in the original terms of issue.

#### **Disclosure**

10. The total eligible amount of HO borrowings may be disclosed in the balance sheet under the head 'Subordinated loan in the nature of long term borrowings in foreign currency from Head Office'.

## **Reserve requirements**

11. The total amount of HO borrowings is to be reckoned as liability for the calculation of net demand and time liabilities for the purpose of reserve requirements and, as such, will attract CRR/SLR requirements.

## Hedging

12. The total eligible amount of HO borrowing should remain fully swapped with banks at all times. The swap should be in Indian rupees.

## **Reporting & Certification**

13. Such borrowings done in compliance with the guidelines set out above, would not require prior approval of Reserve Bank of India. However, information regarding the total amount of borrowing raised from Head Office under this circular, along with a certification to the effect that the borrowing is as per the guidelines, should be advised to the Chief General Managers-in-Charge of the Department of Banking Operations & Development (International Banking Section), Department of External Investments & Operations and Foreign Exchange Department (Forex Markets Division), Reserve Bank of India, Mumbai.

## **ANNEXURE 2**

## **PRUDENTIAL NORMS ON CAPITAL ADEQUACY**

## **Risk Weights for Calculation of CRAR**

(Vide paragraph 3.4)

## I. <u>Domestic Operations</u>

## A Funded Risk Assets

Sr.	Item of asset or liability	Risk
No.		Weight
		%
I	Balances	
1.	Cash, balances with RBI	0
2.	i. Balances in current account with other banks	20
	ii. Claims on Bank	20
	<u> </u>	
II	Investments**	
1.	Investments in Government Securities.	2.5
2.	Investments in other approved securities guaranteed by	2.5
	Central/ State Government.	
	Note: If the repayment of principal / interest in respect of State Government Guaranteed securities included in item 2, 4 and 6 has remained in default, for a period of more than 180 days (more than 90 days with effect from March 31, 2006) banks should assign 102.5% risk weight. However the banks need to assign 102.5% risk weight only on those State Government guaranteed securities issued by the defaulting entities and not on all the securities issued or guaranteed by that State Government.	

- a. Applicable to securities held in HTM and AFS categories only.
- b. Banks are required to maintain capital for market risks on securities included under HFT and AFS categories by March 31, 2006.
  - b. Consequently the risk weights a
  - c. s above will not be applicable for securities included under AFS category with effect from that date
- d. Consequently the risk weight would stand reduced by 2.5% uniformly in all categories and the modified risk weight would be applicable to the HTM category only.
- e. If a bank chooses to provide capital for market risk for securities held in the AFS category from a date prior to 31<sup>st</sup> March 2006, the modification to the risk weight as above and its applicability to HTM category only (as at items C. and D above) will be effective from that date.

3.	Investments in other securities where payment of interest	2.5
	and repayment of principal are guaranteed by Central	
	Govt. (This will include investments in Indira/Kisan Vikas	
	Patra (IVP/KVP) and investments in Bonds and	
	Debentures where payment of interest and principal is	
	guaranteed by Central Govt.)	
	(cf para (i) of circular listed at item 4 part 'B' of Appendix)	
4.	Investments in other securities where payment of interest	2.5
	and repayment of principal are guaranteed by State	
	Governments.	
5.	Investments in other approved securities where payment	22.50
	of interest and repayment of principal are not guaranteed	
	by Central/State Govt.	
6.	Investments in Government guaranteed securities of	22.50
	Government Undertakings which <b>do not</b> form part of the	
	approved market borrowing programme.	
7.	Claims on commercial banks	22.50
8.	Investments in bonds issued by other banks	22.50
9.	Investments in securities which are guaranteed by banks	22.50
	as to payment of interest and repayment of principal.	
10.	Investments in subordinated debt instruments and bonds	102.50
	issued by other banks or Public Financial Institutions for	
	their Tier II capital.	
11.	Deposits placed with SIDBI/NABARD in lieu of shortfall in	102.50
	lending to priority sector.	
	1	ı

<sup>\*\*</sup> Note:

12.	Investment in Mortgage Backed Securities (MBS) of	77.50
	residential assets of Housing Finance Companies (HFCs)	77.00
	which are recognised and supervised by National Housing	
	Bank (subject to satisfying terms & conditions given in	
10	Annexure 2B).	50.50
13.	Investment in securitised paper pertaining to an	52.50
	infrastructure facility. (subject to satisfying terms &	
	conditions given in Annexure 3).	
14	Investments in debentures/ bonds/ security receipts/ Pass	102.50
	Through Certificates issued by Securitisation Company /	
	Reconstruction Company and held by banks as	
	investment	
15.	All other investments including investments in securities	102.50
	issued by PFIs.	
	Note: Equity investments in subsidiaries, intangible assets	
	and losses deducted from Tier I capital should be assigned	
	zero weight	
Ш	Loans & Advances including bills purchased and	
	discounted and other credit facilities	
1.	Loans guaranteed by Govt. of India	0
2.	Loans guaranteed by State Govts.	0
	<b>Note:</b> If the loans guaranteed by State Govts. have remained in default for a period of more than 180 days (more than 90 days with effect from March 31, 2006) a risk weight of 100 percent should be assigned.	
3.	Loans granted to public sector undertakings of Govt. of	100
	India	
4.	Loans granted to public sector undertakings of State	100
1	Govts.	

5.		
	For the purpose of credit exposure, bills purchased /	
	discounted / negotiated under LCs or otherwise should	
	be reckoned on the bank's borrower constituent.	
	Accordingly, the exposure should attract a risk weight	
	appropriate to the borrower constituent for capital	
	adequacy purposes, as under.	
		0
	(i) Government	20
	(ii) Banks	100
	(iii) Firms, individuals, corporates etc.	100
6.	Others including PFIs	100
7.	Leased assets	100
8.	Advances covered by DICGC/ECGC	50
	Note: The risk weight of 50% should be limited to the	
	amount guaranteed and not the entire outstanding	
	balance in the accounts. In other words, the	
	outstandings in excess of the amount guaranteed,	
	will carry 100% risk weight.	
9.	SSI Advances Guaranteed by Credit Guarantee Fund	0
	Trust for Small Industries (CGTSI) up to the guaranteed	
	portion.	
	Note: Banks may assign zero risk weight for the	
	guaranteed portion. The balance outstanding in	
	excess of the guaranteed portion would attract a	
	risk-weight as appropriate to the counter-party. Two	
	illustrative examples are given in <i>Annexure 2A</i> .	

of New India Assurance Company Ltd. (Subject to Conditions given in Annexure 4)  Note: The risk weight of 50% should be limited to the amount guaranteed and not the entire outstanding balance in the accounts. In other words, the outstandings in excess of the amount guaranteed, will carry 100% risk weight.  11 Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  10.			
Conditions given in Annexure 4)  Note: The risk weight of 50% should be limited to the amount guaranteed and not the entire outstanding balance in the accounts. In other words, the outstandings in excess of the amount guaranteed, will carry 100% risk weight.  11 Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution i) the amount to be taken over ii) the amount not to be taken over (iii) Conditional take-over (in the books of lending and Taking over institution)  10. Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)	10.	Insurance cover under Business Credit Shield the product	50
Note: The risk weight of 50% should be limited to the amount guaranteed and not the entire outstanding balance in the accounts. In other words, the outstandings in excess of the amount guaranteed, will carry 100% risk weight.  11 Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		of New India Assurance Company Ltd. (Subject to	
amount guaranteed and not the entire outstanding balance in the accounts. In other words, the outstandings in excess of the amount guaranteed, will carry 100% risk weight.  11 Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (iii) Conditional take-over (in the books of lending and Taking over institution)  10. Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		Conditions given in Annexure 4)	
in the accounts. In other words, the outstandings in excess of the amount guaranteed, will carry 100% risk weight.  Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  Housing loans to individuals against the mortgage of residential housing properties.  Consumer credit including personal loans and credit cards  Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over iii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  I. Premises, furniture and fixtures  10  11  12  13  14  15  16  16  17  17  18  19  10  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  19  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  18  19  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  18  19  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  18  19  19  19  10  10  10  10  10  11  11		Note: The risk weight of 50% should be limited to the	
of the amount guaranteed, will carry 100% risk weight.  Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  Housing loans to individuals against the mortgage of residential housing properties.  Consumer credit including personal loans and credit cards  Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  I. Premises, furniture and fixtures  10  11  12  13  14  15  16  17  16  17  17  18  19  10  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  19  19  10  10  10  11  11  12  13  14  15  16  16  17  17  18  18  19  19  10  10  10  10  11  11  12  13  14  15  16  16  17  17  18  18  19  19  10  10  10  10  11  11  11  12  13  14  15  16  16  17  17  18  18  18  18  19  19  19  10  10  10  10  11  11  11		amount guaranteed and not the entire outstanding balance	
11 Advances against term deposits, Life policies, NSCs, IVPs and KVPs where adequate margin is available.  12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  10. Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		in the accounts. In other words, the outstandings in excess	
and KVPs where adequate margin is available.  12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over  ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		of the amount guaranteed, will carry 100% risk weight.	
12. Loans and Advances granted to staff of banks which are fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over  ii) the amount not to be taken over  (iii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)	11	Advances against term deposits, Life policies, NSCs, IVPs	0
fully covered by superannuation benefits and mortgage of flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution i) the amount to be taken over ii) the amount not to be taken over (iii) Conditional take-over (in the books of lending and Taking over institution)  10. Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		and KVPs where adequate margin is available.	
flat/house.  13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (iii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)	12.	Loans and Advances granted to staff of banks which are	20
13. Housing loans to individuals against the mortgage of residential housing properties.  14. Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		fully covered by superannuation benefits and mortgage of	
residential housing properties.  14 Consumer credit including personal loans and credit cards  15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		flat/house.	
15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution i) the amount to be taken over ii) the amount not to be taken over (iii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)	13.	Housing loans to individuals against the mortgage of	75
15. Takeout Finance  (i) Unconditional takeover (in the books of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		residential housing properties.	
(i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)	14	Consumer credit including personal loans and credit cards	125
(i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)			
(i) Unconditional takeover (in the books of lending institution)  (a) Where full credit risk is assumed by the taking over institution  (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)			
of lending institution) (a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)	15.	Takeout Finance	
(a) Where full credit risk is assumed by the taking over institution (b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (iii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)			
(b) Where only partial credit risk is assumed by taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		· · · · · · · · · · · · · · · · · · ·	20
taking over institution  i) the amount to be taken over ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)			20
ii) the amount not to be taken over  (ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)			
(ii) Conditional take-over (in the books of lending and Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		i) the amount to be taken over	20
Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		ii) the amount not to be taken over	100
Taking over institution)  IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		(ii) Conditional take ever (in the books of landing and	100
IV Other Assets  1. Premises, furniture and fixtures  2. (i) Income tax deducted at source (net of provision)		, ,	100
Premises, furniture and fixtures     (i) Income tax deducted at source (net of provision)	11/	,	
2. (i) Income tax deducted at source (net of provision)			100
provision)		·	
	۷.	, ,	0
(II) Advance tax paid (net of provision)		,	•
		(II) Advance tax paid (net of provision)	0
l I			

(iii)	Interest due on Government securities	0
(iv)	Accrued interest on CRR balances and claims	0
	on RBI on account of Government transactions	
	(net of claims of Government/RBI on banks on	
	account of such transactions)	
(v)	All other assets	100

## B. Off-Balance Sheet Items

The credit risk exposure attached to off-Balance Sheet items has to be first calculated by multiplying the face value of each of the off-Balance Sheet items by 'credit conversion factor' as indicated in the table below. This will then have to be again multiplied by the weights attributable to the relevant counter-party as specified above.

Sr. No.	Instruments	Credit Conversion Factor (%)		
1.	Direct credit substitutes e.g. general guarantees of indebtedness			
	(including standby L/Cs serving as financial guarantees for loans			
	and securities) and acceptances (including endorsements with			
	the character of acceptance).			
2.	Certain transaction-related contingent items (e.g. performance	50		
	bonds, bid bonds, warranties and standby L/Cs related to			
	particular transactions).			
3.	Short-term self-liquidating trade-related contingencies (such as	20		
	documentary credits collateralised by the underlying shipments).			
4.	Sale and repurchase agreement and asset sales with recourse,	100		
	where the credit risk remains with the bank.			
5.	Forward asset purchases, forward deposits and partly paid	100		
	shares and securities, which represent commitments with certain			
	drawdown.			
6.	Note issuance facilities and revolving underwriting facilities.	50		
7.	Other commitments (e.g., formal standby facilities and credit	50		
	lines) with an original maturity of over one year.			
8.	Similar commitments with an original maturity upto one year, or	0		
	which can be unconditionally cancelled at any time.			
<u> </u>				

Sr. No.	Instruments	Credit Conversion Factor (%)		
9.	Aggregate outstanding foreign exchange contracts of original maturity -			
	less than one year	2		
	for each additional year or part thereof	3		
10.	Take-out Finance in the books of taking-over institution			
	(i) Unconditional take-out finance	100		
	(ii) Conditional take-out finance	50		
	Note: As the counter-party exposure will determine the risk			
	weight, it will be 100 percent in respect of all borrowers or zero			
	percent if covered by Government guarantee.			

NOTE: In regard to off-balance sheet items, the following transactions with non-bank counterparties will be treated as claims on banks and carry a risk-weight of 20%

- a) Guarantees issued by banks against the counter guarantees of other banks.
- b) Rediscounting of documentary bills accepted by banks. Bills discounted by banks which have been accepted by another bank will be treated as a funded claim on a bank.

In all the above cases banks should be fully satisfied that the risk exposure is in fact on the other bank.

## C. Risk weights for Open positions

Sr. No.	Item	Risk weight (%)
1.	Foreign exchange open position.	100
2.	Open position in gold  Note: The risk weighted position both in respect of foreign exchange and gold open position limits should be added to the other risk weighted assets for calculation of CRAR	100

## D. Risk weights for Forward Rate Agreement (FRA) /Interest Rate Swap (IRS)

For reckoning the minimum capital ratio, the computation of risk weighted assets on account of FRAs / IRS should be done as per the two steps procedure set out below:

## Step 1

The notional principal amount of each instruments is to be multiplied by the conversion factor given below:

Original Maturity	Conversion Factor
Less than one year	0.5 per cent
One year and less than two years	1.0 per cent
For each additional year	1.0 per cent

## Step 2

The adjusted value thus obtained shall be multiplied by the risk weightage allotted to the relevant counter-party as specified below:

Counter party	Risk weight
Banks	20 per cent
Central & State Govt.	0 percent
All others	100 per cent

## II. Overseas operations (applicable only to Indian banks having branches abroad)

## A. Funded Risk Assets

Sr. No.	Item of asset or liability	Risk Weight %
i)	Cash	0
ii)	Balances with Monetary Authority	0
iii)	Investments in Government securities	2.5
iv)	Balances in current account with other banks	20
v)	All other claims on banks including but not limited to funds	
	loaned in money markets, deposit placements, investments in	20
	CDs/FRNs. Etc.	
vi)	Investment in non-bank sectors	102.5
vii)	Loans and advances, bills purchased and discounted and	
	other credit facilities	

	a) Claims guaranteed by Government of India.	0			
	b) Claims guaranteed by State Governments	0			
	c) Claims on public sector undertakings of Government of				
	India.				
	d) Claims on public sector undertakings of State Governments	100			
	e) Others	100			
viii)	All other banking and infrastructural assets	100			

## B. Non-funded risk assets

Sr.	Instruments	Credit
No.		Conversion
		Factor (%)
i)	Direct credit substitutes, e.g. general guarantees of	100
	indebtedness (including standby letters of credit serving as	
	financial guarantees for loans and securities) and acceptances	
	(including endorsements with the character of acceptances)	
ii)	Certain transaction-related contingent items (e.g. performance	50
	bonds, bid bonds, warranties and standby letters of credit	
	related to particular transactions)	
iii)	Short-term self-liquidating trade related contingencies (such as	20
	documentary credits collateralised by the underlying	
	shipments)	
iv)	Sale and repurchase agreement and asset sales with	100
	recourse, where the credit risk remains with the bank .	
v)	Forward asset purchases, forward deposits and partly paid	100
	shares and securities, which represent commitments with	
	certain drawdown	
vi)	Note issuance facilities and revolving underwriting facilities	50
vii)	Other commitments (e.g. formal standby facilities and credit	50
	lines) with an original maturity of over one year.	
viii)	Similar commitments with an original maturity up to one year,	0
	or which can be unconditionally cancelled at any time.	

### ANNEXURE 2 A

## PRUDENTIAL NORMS ON CAPITAL ADEQUACY

SSI Advances Guaranteed by Credit Guarantee Fund Trust for Small Industries (CGTSI) – Risk weights and Provisioning norms (paragraph I (A)(III)(9) of *Annexure 2*)

## **Risk-Weight**

### Example I

CGTSI Cover: 75% of the amount outstanding or 75% of the unsecured amount or

Rs.18.75 lakh, whichever is the least.

Realisable value of Security : Rs.1.50 lakh

a) Balance outstanding : Rs. 10.00 lakh
b) Realisable value of security : Rs. 1.50 lakh
c) Unsecured amount (a) - (b) : Rs 8.50 lakh
d) Guaranteed portion (75% of (c) ) : Rs. 6.38 lakh
e) Uncovered portion (8.50 lakh - 6.38; Rs. 2.12 lakh lakh)

Risk-weight on (b) and (e) — Linked to the counter party

Risk-weight on (d) – Zero

#### Example II

CGTSI cover: 75% of the amount outstanding or 75% of the unsecured amount or

Rs.18.75 lakh whichever is the least.

Realisable value of Security : Rs. 10.00 lakh.

a) Balance outstanding : Rs. 40.00 lakh

b) Realisable value of security : Rs. 10.00 lakh

c) Unsecured amount (a) - (b) : Rs. 30.00 lakh

d) Guaranteed portion (max.) : Rs. 18.75 lakh

e) Uncovered portion (Rs.30 lakh-18.75: Rs. 11.25 lakh

lakh)

Risk-weight (b) and (e) - Linked to the counter

party

Risk-weight on (d) - Zero

\*\*\*\*\*

## **ANNEXURE 2B**

## PRUDENTIAL NORMS ON CAPITAL ADEQUACY

Terms and conditions for the purpose of liberal Risk Weight for Capital Adequacy for investments in Mortgage Backed Securities (MBS) of residential assets of Housing Finance Companies (HFC).

(Vide item (I)(A)(II)(12)of Annexure 2)

- 1(a) The right, title and interest of a HFC in securitised housing loans and receivables thereunder should irrevocably be assigned in favour of a Special Purpose Vehicle (SPV) / Trust.
- 1(b) Mortgaged securities underlying the securitised housing loans should be held exclusively on behalf of and for the benefit of the investors by the SPV/Trust.
- 1(c) The SPV or Trust should be entitled to the receivables under the securitised loans with an arrangement for distribution of the same to the investors as per the terms of issue of MBS. Such an arrangement may provide for appointment of the originating HFC as the servicing and paying agent. However, the originating HFC participating in a securitisation transaction as a seller, manager, servicer or provider of credit enhancement or liquidity facilities:
  - shall not own any share capital in the SPV or be the beneficiary of the trust used as a vehicle for the purchase and securitisation of assets.
     Share capital for this purpose shall include all classes of common and preferred share capital;
  - ii. shall not name the SPV in such manner as to imply any connection with the bank:
  - shall not have any directors, officers or employees on the board of the SPV unless the board is made up of at least three members and where there is a majority of independent directors. In addition, the official(s) representing the bank will not have veto powers;
  - iv. shall not directly or indirectly control the SPV; or

- v. shall not support any losses arising from the securitisation transaction or by investors involved in it or bear any of the recurring expenses of the transaction.
- 1(d) The loans to be securitised should be loans advanced to individuals for acquiring/constructing residential houses which should have been mortgaged to the HFC by way of exclusive first charge.
- 1(e) The loans to be securitised should be accorded an investment grade credit rating by any of the credit rating agencies at the time of assignment to the SPV.
- 1(f) The investors should be entitled to call upon the issuer SPV to take steps for recovery in the event of default and distribute the net proceeds to the investors as per the terms of issue of MBS.
- 1(g) The SPV undertaking the issue of MBS should not be engaged in any business other than the business of issue and administration of MBS of individual housing loans.
- 1(h) The SPV or Trustees appointed to manage the issue of MBS should have to be governed by the provisions of Indian Trusts Act, 1882.
- 2. If the issue of MBS is in accordance with the terms and conditions stated in paragraph 1 above and includes irrevocable transfer of risk and reward of the housing loan assets to the Special Purpose Vehicle (SPV)/Trust, investment in such MBS by any bank would not be reckoned as an exposure on the HFC originating the securitised housing loan. However, it would be treated as an exposure on the underlying assets of the SPV / Trust.

## **ANNEXURE 3**

### PRUDENTIAL NORMS ON CAPITAL ADEQUACY

# Conditions for availing concessional risk weight on investment in securitised paper pertaining to an infrastructure facility (Vide item (I)(A)(II)(13)of Annexure 2)

- 1. The infrastructure facility should satisfy the conditions stipulated in our circular DBOD. No. BP. BC. 92/21.04.048/ 2002- 2003 dated June 16, 2004.
- 2. The infrastructure facility should be generating income/ cash flows which would ensure servicing/ repayment of the securitised paper.
- 3. The securitised paper should be rated at least 'AAA' by the rating agencies and the rating should be current and valid. The rating relied upon will be deemed to be current and valid if:
  - (i) The rating is not more than one month old on the date of opening of the issue, and the rating rationale from the rating agency is not more than one year old on the date of opening of the issue, and the rating letter and the rating rationale is a part of the offer document.
  - (ii) In the case of secondary market acquisition, the 'AAA' rating of the issue should be in force and confirmed from the monthly bulletin published by the respective rating agency.
- 4. The securitised paper should be a performing asset on the books of the investing/lending institution.

## ANNEXURE 4

## PRUDENTIAL NORMS ON CAPITAL ADEQUACY

Conditions for availing concessional risk weight for Advances covered by Insurance cover under Business Credit Shield the product of New India Assurance Company Ltd.

(Vide item (I)(A)(III)(10)of Annexure 2)

New India Assurance Company Limited (NIA) should comply with the provisions of the Insurance Act, 1938, the Regulations made thereunder - especially those relating to Reserves for unexpired risks and the Insurance Regulatory and Development Authority (Assets, Liabilities and Solvency Margin of Insurers) Regulations, 2000 and any other conditions/regulations that may be prescribed by IRDA in future, if their insurance product - Business Credit Shield (BCS) - is to quality for the above treatment.

- 2. To be eligible for the above regulatory treatment in respect of export credit covered by BCS policy of **NIA**, **banks should ensure that:** 
  - i) The BCS policy is assigned in its favour, and
  - ii) NIA abides by the provisions of the Insurance Act, 1938 and the regulations made thereunder, especially those relating to Reserves for unexpired risks and the Insurance Regulatory and Development Authority (Assets, Liabilities and Solvency Margin of Insurers) Regulations, 2000, and any other conditions/regulations that may be prescribed by IRDA in future.
- **3.** Banks should maintain separate account(s) for the advances to exporters, which are covered by the insurance under the "Business Credit Shield" to enable easy administration/verification of risk weights/provisions.

## <u>Appendix</u>

## PRUDENTIAL NORMS ON CAPITAL ADEQUACY

## Part - A

## **List of Circulars**

No.	Circular No.	Date	Subject	Para No. in this circular
1.	DBOD.NO.BP.BC.23/21. 01.002/2002-03	29.8.2002	Capital Adequacy and Provisioning Requirements for Export Credit Covered by Insurance/Guarantee.	Annexure2 (I)(A)(III)(10)
2.	DBOD. No. IBS. BC.65/ 23. 10.015 / 2001-02	14.02.2002	Subordinated debt for inclusion in Tier II capital – Head Office borrowings in foreign currency by Foreign Banks operating in India	2.4.2
3.	DBOD No. BP. BC. 106/21. 01.002/2001- 02	24.05 2002	Risk Weight on Housing Finance and Mortgage Backed Securities	Annexure 2(I)(A)(II)(12) Annexure 2(I)(A)(III) (11)
4.	DBOD.No.BP.BC.128/21. 04.048/00-01	7.06.2001	SSI Advances Guaranteed by Credit Guarantee Fund Trust for Small Industries (CGTSI)	
5.	DBOD.BP.BC.110/21.01. 002/00-01	20.04.2001	Risk Weight on Deposits placed with SIDBI /NABARD in lieu of shortfall in lending to Priority Sectors	
6.	DBOD.BP.BC.83/21.01.0 02/00-01	28.02.2001	Loans and advances to staff  – assignment of risk weight and treatment in the balance sheet.	2(I)(A)(10)
7.	DBOD.No.BP.BC.87/21.0 1.002/99		Investments in Bonds/Securities Issued by Financial Institutions	2(I)(A)(2) (ii)
8.	DBOD.No.BP.BC.5/21.01 .002/98-99	08.02.99	Issue of Subordinated Debt for Raising Tier II Capital	2.1.4 (v)(c) 2.4.1, 2.4.2

No.	Circular No.	Date	Subject	Para No. in
9.	DBOD.No.BP.BC.119/21. 01.002/ 98	28.12.98	,	
10.	DBOD.No.BP.BC.152/21. 01.002/ 96	27.11.96	Capital Adequacy Measures	2.3.1 (ii)
11.	DBOD.No.IBS.BC.64/23. 61.001/ 96	24.05.96	Capital Adequacy Measures	2.2.1 (a) & (b)
12.	DBOD.No.BP.BC.13/21.0 1.002/96	08.02.96	Capital Adequacy Measures	Annexure 2(I)(A)(II) (10)
13.	DBOD.No.BP.BC.99/21.0 1.002/94	24.08.94	Capital Adequacy Measures	2.1.4 (ii)
14.	DBOD.No.BP.BC.9/21.01	08.02.94	Capital Adequacy Measures	Annexure 2(I)(A)(II)(7),  Annexure 2(I)(A)(III)(2),  Annexure 2(I)(B),  Annexure 2(I)(A)(III)(7),  Annexure 2(I)(A)(IV)(2),  Annexure 2(I)(A)(IV)(2),
15.	DBOD.No.IBS.BC.98/23- 50-001-92/93	06.04.93	Capital Adequacy Measures - Treatment of Foreign Currency Loans to Indian Parties (DFF)	2.2.3
16.	DBOD.No.BP.BC.117/21. 01.002-92	22.04.92	Capital Adequacy Measures	2

Part – B

List of Other Circulars containing Instructions/
Guidelines/Directives related to Prudential Norms

No.	Circular No.	Para No. of circular	Date	Subject	Para No. in this circular
1	DBOD.BP.BC.105/ 21.01.002/2002- 2003,	1	7.05.2003	Monetary And Credit Policy 2003-04 - Investment Fluctuation Reserve	2.1.4(vi)
2	DBOD.No.BP.BC.9 6/21.04.048/2002- 03	5(B) of Annexure	23.4.2003	Guidelines on Sale Of Financial Assets to Securitisation Company (SC)/Reconstruction Company (RC) (Created Under The Securitisation and Reconstruction of Financial Assets And Enforcement of Security Interest Act, 2002) and Related Issues.	Annexure2 (I)(A)(II)(14)
3	DBOD No. BP.BC. 89/21.04.018/2002- 03		29.3.2003	Guidelines on compliance with Accounting Standards (AS) by banks	2.1.4
4	DBOD.No.BP.BC.7 2/21.04.018/2002- 03	27 of Annexure	25.2.2003	Guidelines for Consolidated Accounting And Other Quantitative Methods to Facilitate Consolidated Supervision.	4.3
5	DBOD NO. BP.BC 71/21.04.103/2002- 03	Annexure	19.2.2003	Risk Management system in Banks Guidelines in Country Risk Managements	2.1.5 (vii)
6	DBOD.No.BP.BC. 67/21.04.048/2002- 2003	5.2 of Annexure	4.2.2003	Guidelines on Infrastructure Financing.	Annexure2 (I)(A)(II)(13)

No.	Circular No.	Para No. of circular	Date	Subject	Para No. in this circular
7	DBOD.Dir.BC. 62/13.07.09/2002- 03	2(iv)	24.1.2003	Discounting/ Rediscounting of Bills by Banks.	Annexure2 (I)(A)(III)(5)
8	A.P.(DIR Series) Circular No. 63	5	21.12.2002	Risk Management and Inter Bank Dealings	2.2.1 Notes (d)
9	No.EC.CO.FMD.6/0 2.03.75/2002-2003	1	20.11.2002	Hedging of Tier I Capital	2.2.1 Notes (d)
10	DBOD.No.BP.BC. 57/ 21.04.048/2001-02	2(v)	10.01.2002	Valuation of investments by banks	2.1.4(vi)
11	DBOD.No.BC.34/1 2.01.001/2001-02	2(b)	22.10.2001	Section 42(1) Of The Reserve Bank Of India Act, 1934 - Maintenance of Cash Reserve Ratio (CRR).	
12	DBOD.BP.BC. 73/21.04.018/2000- 01	3	30.01.2001	Voluntary Retirement Scheme (VRS) Expenditure – Accounting and Prudential Regulatory Treatment.	2.1.3 & 2.1.4(v)(b)
13	DBOD.No.BP.BC.3 1/21.04.048/ 2000	2 & 3	10.10.2000	Monetary & Credit Policy Measures – Mid term review for the year 2000-01	
14	DBOD.No.BP.BC.1 69/21.01.002/ 2000	3	03.05.2000	Monetary & Credit Policy Measures	5.2
15	DBOD.No.BP.BC.1 44/21.04.048/ 2000	1 (A), (B)(a)	29.02.2000	Income Recognition, Asset Classification and Provisioning and Other Related Matters and Adequacy Standards - Takeout Finance	
16	DBOD.No.BP.BC.1 21/21.04.124/ 99	1(i)	03.11.99	Monetary & Credit Policy Measures	3.2
17	DBOD.No.BP.BC.1 01/21.04.048/ 99	2 & 3	18.10.99	Income Recognition, Asset Classification and Provisioning – Valuation of Investments by Banks in Subsidiaries.	2.4.3, & 4.1
18	DBOD.No.BP.BC.8 2/ 21.01.002/99	2	18.08.99	Monetary & Credit Policy Measures	One Time Report

No.	Circular No.	Para No. of circular	Date	Subject	Para No. in this circular
19	FSC.BC.70/24.01.0 01 /99	5(i)	17.7.1999	Equipment Leasing Activity - Accounting / Provisioning Norms	2(I)(A)(III)(6),
20	MPD.BC.187/07.01 .279/1999-2001	11	7.7.1999	Agreements / Interest Rate Swaps	Annexure 2.(I)(D)
21	DBOD.No.BP.BC.2 4/ 21.04.048/99	1 & 2	30.03.99	Prudential Norms - Capital Adequacy - Income Recognition, Asset Classification and Provisioning	
22	DBOD.No.BP.BC.3 5/ 21.01.002/99	2(ii)	24.04.99	Monetary & Credit Policy Measures	Annexure 2 (II)(10), 2.1.5
23	DBOD.No.BP.BC.1 03/21.01.002/ 98	1,2,3,4	31.10.98	Monetary & Credit Policy Measures	2.3, 3.2, Annexure 2 (I) (A) (II) (Sr.no.1–11) Annexure
					2(I)(III)(2) Annexure 2(I)(C)
24	DBOD.No.BP.BC.3 2/ 21.04.018/98	(i)	29.04.98	Monetary and Credit Policy Measures	Annexure 2 (I) (A) (II)(3)
25	DBOD.No.BP.BC.9/ 21.04.018/98	(v)	27.01.1998	Balance Sheet of Bank - Disclosures	2.1.4(v)(c)
26	DBOD.No.BP.BC.9/ 21.04.048/97	1	29.01.97	Prudential Norms - Capital Adequacy, Income Recognition, Asset Classification and Provisioning	Annexure 2 (III)(1)
27	DBOD. BP. BC. No. 3/21.01.002/2004- 05	1,2	06.07.04	Prudential norms on Capital Adequacy – Cross holding of capital among banks/ financial institutions	2.1.7,
28	DBOD.No.BP.BC. 103 / 21.04.151/ 2003-04		June 24, 2004	Guidelines on Capital Charge for Market risks	,

No.	Circular No.	Para No. of circular	Date	Subject	Para No. in this circular
29	DBOD.No.BP.BC. 92 / 21.04.048/ 2003-04		June 16, 2004	Annual Policy Statement for the year 2004-05 — Guidelines on infrastructure financing	Annexure 3 (1)
30	DBOD.No.BP.BC. 91/21.01.002/ 2003-04	Annexure 2. I. A.2 (ii), 7,8,9; III.5 (ii); D (Step 2).	2004	Annual Policy Statement for the year 2004-05 – Risk Weight for Exposure to Public Financial Institutions (PFIs)	7,8,9; III.5 (ii); D (Step
31	F.No.11/7/2003- BOA	Annexure 1 I.19 (iv) (d)	2004	Permission to nationalised banks to issue subordinated debt for augmenting Tier II capital	
32	DBS.FID.No.C- 15/01.02.00/2003- 04	3	15 <sup>th</sup> June 2004	Risk Weight for Exposures to PFIs	Annexure 2
33	DBOD.BP.BC.29/2 1.01.048/2004-05	3(a) & (b)	2004	Prudential Norms- State Govt. guaranteed expsosures	Annexure 2
34	DBOD. BP.BC. 61 / 21.01.002/ 2004- 05	2(i)	23 <sup>rd</sup> December 2004	Mid-Term Review of the Annual Policy Statement for the year 2004- 05. Risk weight on housing loans and consumer credit	Annexure 2 Item A.III (13)
35	DBOD.No.BP.BC.8 5/21.04.141/2004- 05	2	30 <sup>th</sup> April 2005	Capital Adequacy- IFR	2.1.5 (vi)