

FSA

Solvency Ratios

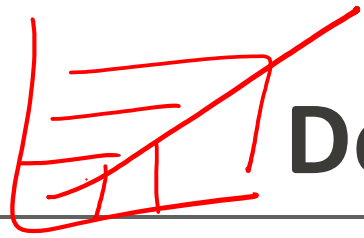
Solvency ratios are calculated to determine the ability of the business to service its debt in the long run.

Long-term stability → Banks/Lenders

Long term investors are interested in safety of their principal amount and interest.

1. Debt-Equity ratio
2. Interest Coverage ratio

CMB Group



Debt-Equity Ratio

✦ Measures the relationship between long-term debt and equity.

✦ From security point of view, capital structure with less debt and more equity is considered favourable as it reduces the chances of bankruptcy.

D/E
8:1
Repay + Principal
Interest

10:1
3:1 | 4:1 | 10:1



Debt-Equity Ratio = Long-term Debts / Shareholders' Funds

Shareholders' Funds (Equity) = Share capital + Reserves and Surplus + Retained Earnings

Zero-debt

D/E Ratio, *ideal Ratio* - **2:1**

Asset-Liability - **3-4:1**

Kingfisher

2. Interest Coverage ratio

✦ It is a measure of security of interest payable on long-term debts. It expresses the relationship between profits available for payment of interest and the amount of interest payable.

Interest Coverage Ratio = EBIT / Interest on long-term debts

✦ A higher ratio ensures safety of interest on debts.



	A	B
EBIT	100	50
Interest	(30)	(50 Lakhs)
	<u>70</u>	<u>0</u>

Valuation Ratios

★ A valuation ratio shows the relationship between the market value of a company to the company's earnings and dividends. The point of a **valuation ratio** is to show the price you are paying for some stream of earnings, revenue, or cash flow (or other financial metric).

★ In other words, valuation ratio helps an investor to determine the cost of an investment with respect to the value or benefits of owning that investment.

Growth Potential

1. P/E Ratio ✓
2. P/BV Ratio ✓
3. Dividend Yield Ratio ✓

Market Share Price
Price/Earning
Actual Facts
P/E Ratio

P/E Ratio

★ Used to determine how much investors are willing to pay for a stock relative to the company's earnings.

$$\text{P/E Ratio} = \frac{\text{Market Value per Share}}{\text{Earnings per Share}}$$

$\frac{NI}{\text{No. of shares}}$

P/E is sometimes referred to as the price multiple because it shows how much investors are willing to pay per dollar of earnings.

1400 / 1

P/E ↑

Let's say, P/E ratio = 20

↑ 20 / 1 → 22 → 25

An investor is willing to pay \$20 for \$1 of current earnings.

Bubble

P/E :- Growth Potential
Investor confidence

Particulars	Company A (in US \$)	Company B (in US \$)
<u>Market value per share</u>	18 ✓	18 ✓
<u>EPS</u>	2 ✓	6 ✓
<u>P/E ratio</u>	9 ✓	3 ✓

Short-term Investor /
Trader

Long-term Invest-
strategy

P/BV
P/BV Ratio

- ✦ To compare a company's market value with its book value.
- ✦ This ratio also indicates whether you're paying too much for what would remain if the company went bankrupt immediately.

P/BV ratio = market price per share / book value per share

low / 1 ↓

A lower P/B ratio could mean the stock is undervalued. However, it could also mean something is fundamentally wrong with the company. As with most ratios, this varies by industry.

Investors' - Returns
→ Dividend

Dividend Yield Ratio

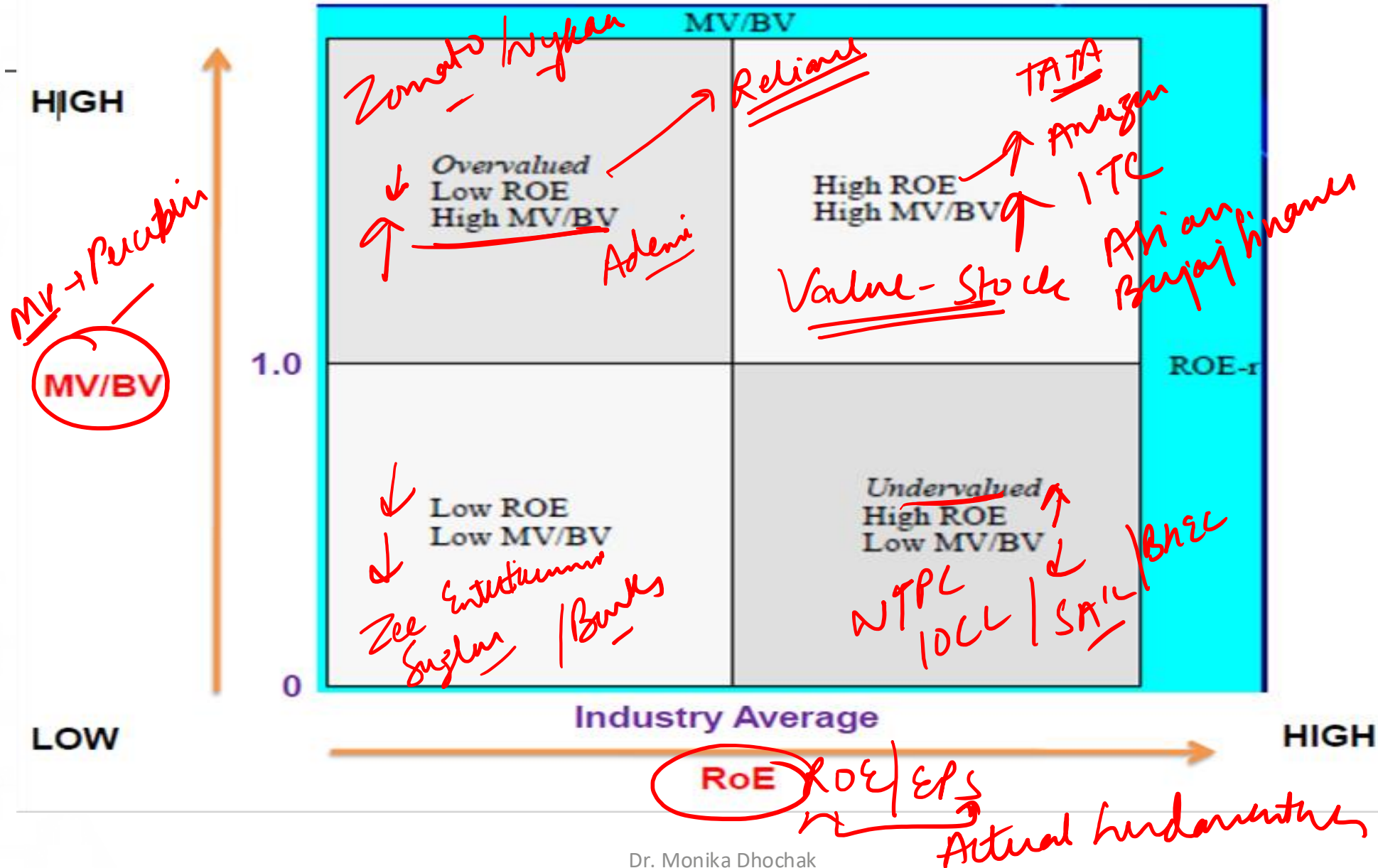
✦ A financial ratio that indicates how much a company pays out in dividends each year relative to its share price.

✦ For Investors, dividend yield is a way to measure how much cash flows they are getting for each dollar invested in a dividend-paying shares.

Dividend Yield ratio = Annual dividend per share / Market Price per share

↓
↑ DYR

MV/BV and ROE



Du Pont Analysis

✦ Du Pont Corporation - 1920

↑ ROE (Return on Equity) = Net Profit / Shareholders' Equity

↑ ROE ↑ or ↓

Why ?

Du Pont Analysis

ROE

↑ NI
↑ Shareholder's Equity

3-factor

Increase Profits

Utilize Resources

Reduce Equity

Sales ↑
Cost ↓

Profitability

Assets Turnover/ Efficiency ?

Leverage ? → Debt

Debt	Equity
407	607
↓	
457	557

↑

Net Profit
Net Sales

×

Net Sales
Total Assets

↓

Total Assets
Sh. Equity ? ↓

ROA

= NI
Equity

Summary

Ratio analysis is to provide a deeper analysis of the profitability, liquidity, solvency and activity levels in the business. It is also to identify the problem areas as well as the strong areas of the business.

Users can not rely on single ratios for decision-making

Identify the right Industry

Case – Financial Detectives

Even Groups – First 4

Odd Groups – Last 4



Examining the Financial Statements of Banks

Dr. Monika Dhochak

Banks – SBI and HDFC Banks

Let's see the MS Excel file for analysis

General Observations

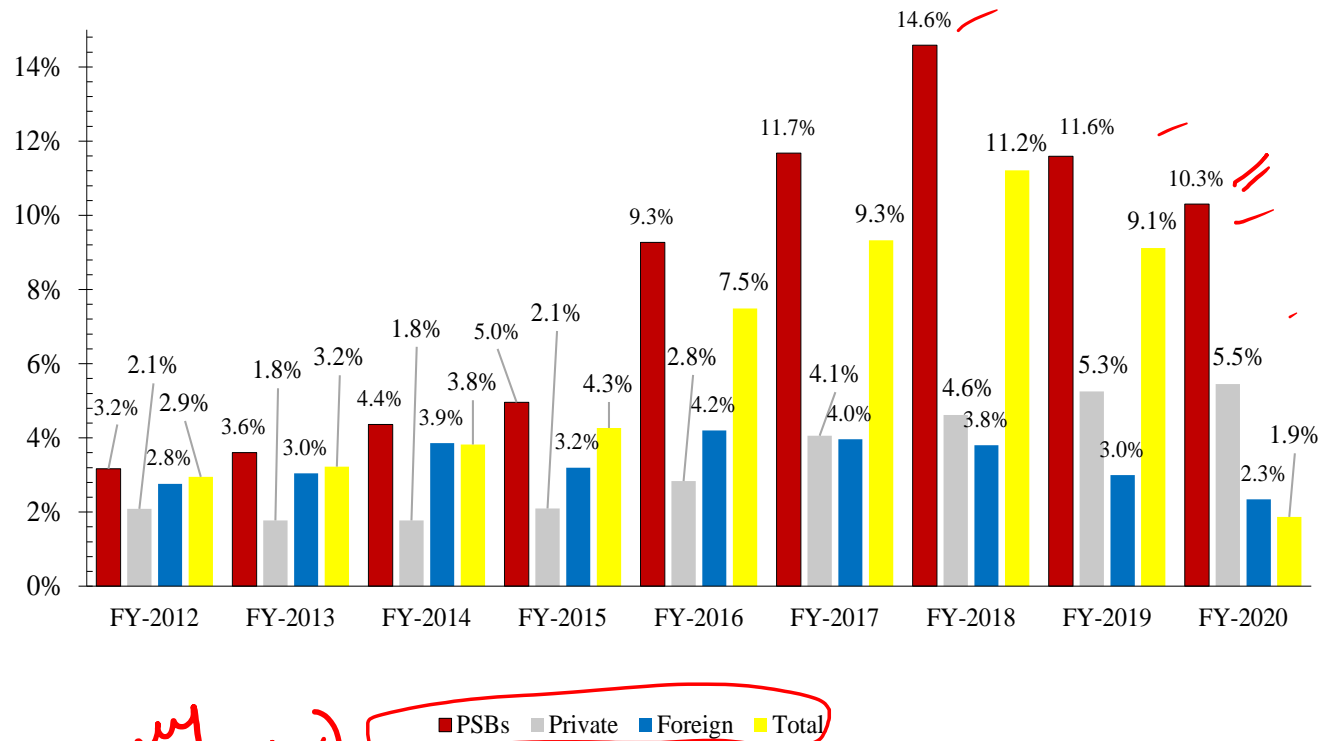
→ Bank → Business Model

- Some of the most complex businesses to understand from the outside
- Accounting statements give an overview of the banks performance but the clarity of the picture they present depends on the accounting decisions that management takes.
- Analysts will lack vital information about the bank's economics
 - Extent of credit losses
 - Mismatch of assets and liabilities
- Banks are highly levered

Introductory remarks

- NPA levels, recovery, and what to accept while resolving insolvency

Gross NPAs of Public, Private & Foreign Banks



*NPA's
Non-performing
Assets
1-2%
3-4%
7-9%
Lower*

*Insolvency
&
Bankruptcy
Code (2016)*

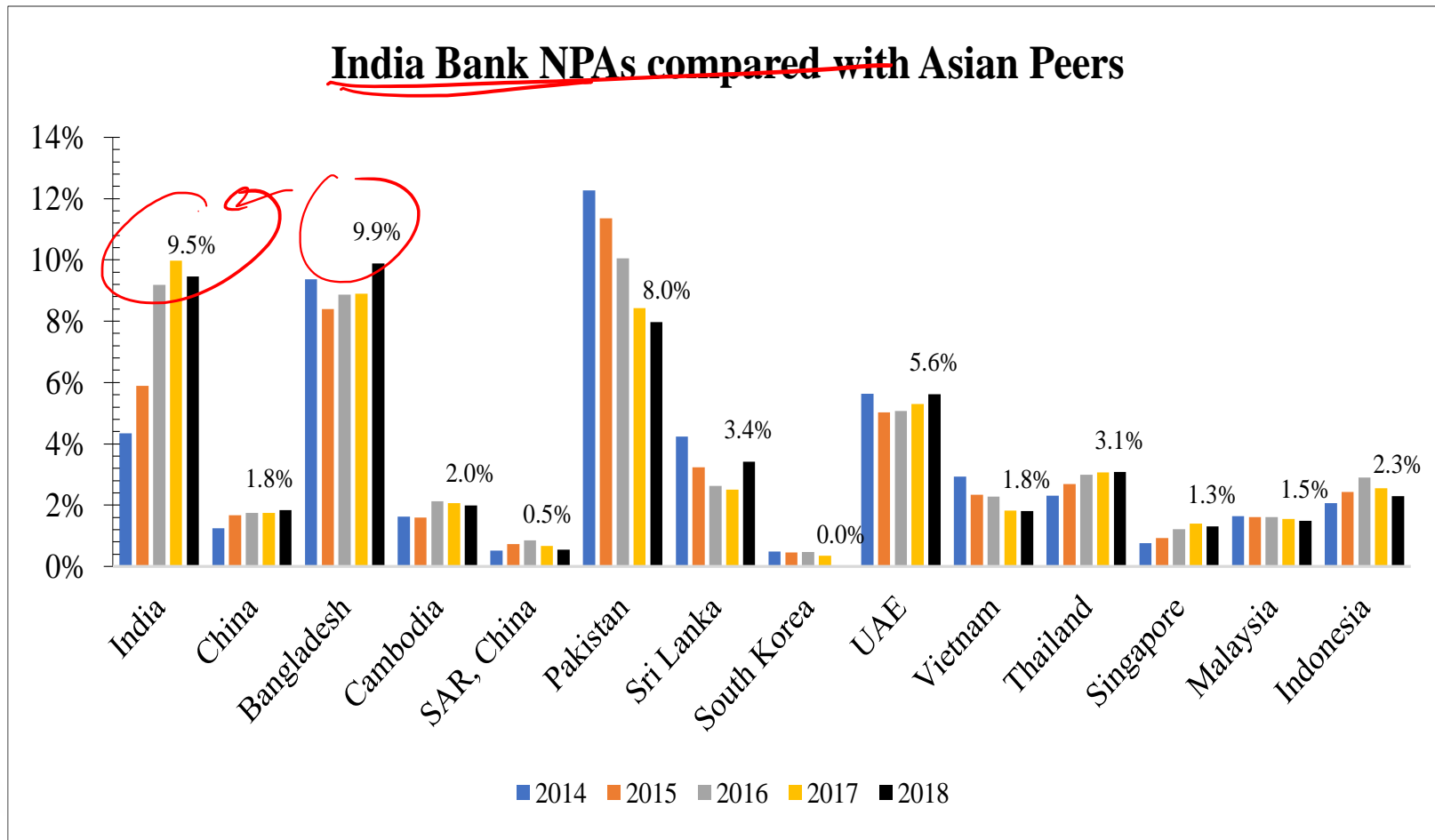
Can IBC help the banks chart a new way forward?

Points for discussion

- Are the NPA levels acceptable or too high?
- Does the ownership pattern of the banks impact NPAs?
- Why are we looking at these figures?
- For (b) above, let's see peer comparison

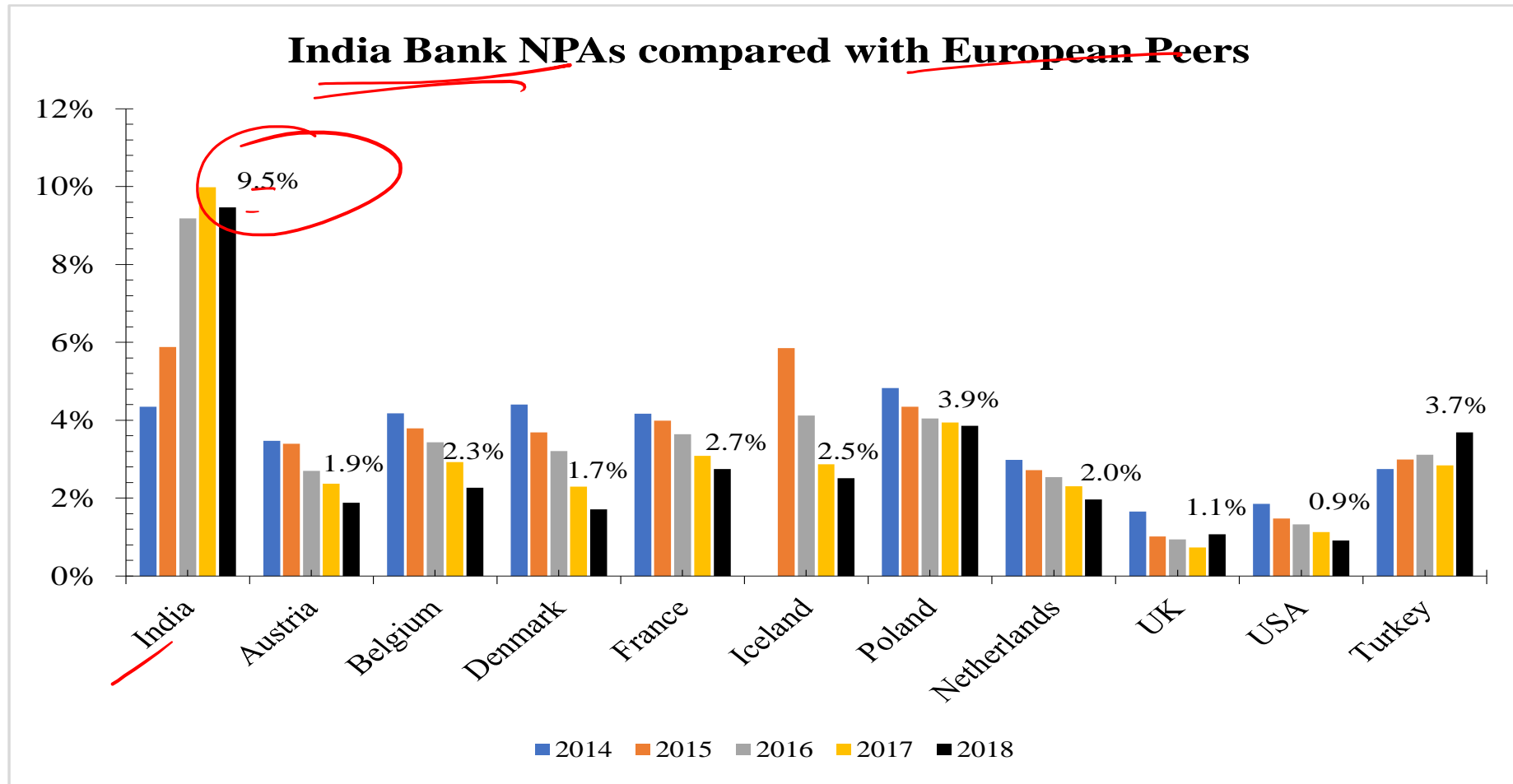
Introductory remarks

Indian banks' NPAs compared with those of Asian peers



Introductory remarks

Indian banks' NPAs compared with those of European / US peers



Balance Sheet of a Bank



How does Balance Sheet look for a Bank?

How to analyze each line item using schedule to Balance Sheet?

Assets – HDFC Bank

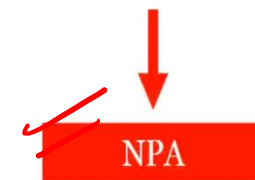
Advances

Schedule 9

- Loans to customers are classified as assets. This is because the bank expects to receive interest and principal repayments for loans in the future
- Term Loan** - loan for a specific amount that has a specified repayment schedule and a fixed or floating interest rate
- Secured by Tangible Assets** – These are the loans secured by collateral like house, car, stocks and so on.
- Unsecured Loan** – It includes personal loans, business loans etc. that are not secured by any collateral.
- Advances in India**
 - ✓ Loan to the priority sectors like agriculture, small business
 - ✓ Larger % of loan is classified as other and would have preferred to see the details

		As at 31-Mar-21
SCHEDULE 9 - ADVANCES		
A	(i) Bills purchased and discounted	345,427,765
	(ii) Cash credits, overdrafts and loans repayable on demand	2,559,778,239
	(iii) Term loans	8,423,160,305
	Total	11,328,366,309
B	(i) Secured by tangible assets*	7,618,839,623
	(ii) Covered by bank / government guarantees	393,758,390
	(iii) Unsecured	3,315,768,296
	Total	11,328,366,309
* Including advances against book debts		
C	I Advances in India	
	(i) Priority sector	2,574,675,399
	(ii) Public sector	1,199,082,740
	(iii) Banks	85,383,854
	(iv) Others	7,153,125,825
	Total	11,012,267,818

Bank's ↑ Performance



Capital & Liabilities – HDFC Bank

₹ in '000

	Schedule	As at 31-Mar-21	As at 31-Mar-20
CAPITAL AND LIABILITIES			
✓ Capital	1	5,512,776	5,483,286
✓ Reserves and surplus	2	2,031,695,513	1,704,377,008
✓ Deposits	3	13,350,602,208	11,475,022,947
✓ Borrowings	4	1,354,873,236	1,446,285,372
Other liabilities and provisions	5	726,021,504	673,943,976
Total		17,468,705,237	15,305,112,589

Liabilities - Deposits

Deposits

Schedule 3

- Demand Deposits**
 - ✓ Money can be withdrawn without prior notice.
 - ✓ This is like Current account and banks pays very minimum or no interest
 - ✓ Current account is opened for business use
- Savings Bank Deposits**
 - ✓ It allows individual to deposit money, withdrawal and earn small amount of interest as well.
- Term Deposit**
 - ✓ This is a fixed deposit where money is invested for fixed period and interest rate
 - ✓ It allows withdrawal before the maturity
 - ✓ The interest will be reduced by penalty amount.

₹ in '000

	As at 31-Mar-21	As at 31-Mar-20
SCHEDULE 3 - DEPOSITS		
A I Demand deposits		
(i) From banks	38,701,928	36,285,672
(ii) From others	2,083,119,132	1,706,193,073
Total	2,121,821,060	1,742,478,745
II Savings bank deposits	4,035,000,577	3,103,771,353
III Term deposits		
(i) From banks	106,458,399	136,163,876
(ii) From others	7,087,322,172	6,492,608,973
Total	7,193,780,571	6,628,772,849
Total	13,350,602,208	11,475,022,947

CASA

Deposit under Current and Savings account is called as CASA deposit

Bank
Spread
(NIM)

CASA deposit is the cheapest source of money available for bank since they pay very minimum rate of interest to account holder

Growing CASA deposit is always a good sign for bank

47.2% → 157.

Income Statement - HDFC

	Schedule	Year ended 31-Mar-21	Year ended 31-Mar-20
I INCOME			
Interest earned ←	13	1,208,582,265	1,148,126,509
Other income ←	14	252,048,927	232,608,187
Total		1,460,631,192	1,380,734,696
II EXPENDITURE			
Interest expended ←	15	559,786,560	586,263,979
Operating expenses	16	327,226,301	306,975,289
Provisions and contingencies [Refer Schedule 18 (24)]		262,453,079	224,922,278
Total		1,149,465,940	1,118,161,546
III PROFIT			
Net profit for the year		311,165,252	262,573,150
Balance in the Profit and Loss account brought forward		574,924,020	492,233,022
Total		886,089,272	754,806,172
IV APPROPRIATIONS			
Transfer to Statutory Reserve		77,791,313	65,643,288
Dividend (including tax / cess thereon) pertaining to previous year paid during the year, net of dividend tax credits		-	48,933,585
Interim Dividend (including tax)		-	16,469,504
Transfer to General Reserve		31,116,525	26,257,315
Transfer to Capital Reserve		22,916,842	11,238,460
Transfer to / (from) Investment Reserve Account		616,645	-
Transfer to / (from) Investment Fluctuation Reserve		17,120,000	11,340,000
Balance carried over to Balance Sheet		736,527,947	574,924,020
Total		886,089,272	754,806,172
V EARNINGS PER EQUITY SHARE (Face value ₹ 1 per share)			
Basic		₹ 56.58	₹ 48.01
Diluted		₹ 56.32	₹ 47.66

For the purpose of financial analysis, the major ratios for banks are as follows:

- Profitability analysis: Net Interest Margin, CASA, ROA, ROE
- Efficiency Analysis: Non-Interest Cost to total revenue, Credit deposit ratio
↓
- Credit Risk Analysis: Interest Income as % of total income, NPL (Non-performing loans) ratio

Why some banks perform better than others?

- High NIM ↑
- Lower non-interest cost to total revenue → *efficiency*
- More productive business segments
- Low NPA resulting from effective credit appraisal, monitoring and risk management
- Interest income constitutes 81% to 87% of the total income. So credit risk management is major risk management task.
- Let's also browse through facets of risk management by banks

Thank You!