Management of Commercial Banking
Professor Jitendra Mahakud
Department of Humanities and Social Sciences
Indian Institute of Technology, Kharagpur
Lecture 03
Regulation of Commercial Banks

Okay, so after discussing about the different functions than the objectives, constants of the commercial bank.

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Today we will be discussing about another major issue, which is most relevant issue in the context of commercial banks, that are the regulations of the commercial bank. Then you know that why we talk about the regulations because this is basically a buzzword always we come across, whenever we talk about the commercial banking. The banks are basically highly regulated.

So, as banks are regulated and obviously, the question always arises that why regulation? Why banks are regulated? What is the basic reason for the regulation? So, these are the different questions always comes to the mind that really regulation is why it is required for the commercial bank.

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CONCEPTS COVERED

- Why commercial banks are regulated?
- Reasons for failure of commercial banks
- Regulation of commercial banks in India

So, in this context, there are three things what we will be discussing. Why the commercial banks are regulated? And what are those basic reasons which makes the commercial bank fail? Or there is a failure what are the reasons for failure of the commercial banks? What are the possible reasons because of that, the commercial banks fail in the market? And what are those kinds of regulatory norms or regulatory regulations which are made in the commercial banks in India for the betterment of the commercial banks and as well as to protect the different stakeholders. So, these are the different three major questions always we can answer whenever you talk about the regulations in the commercial banking.

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Reasons for Regulation of Banks

- To reduce the risk of large-scale failure in the economic system
- To avoid systematic risk and contagious effect in global economy
- To guard against deposit insurance losses
- To achieve the desired social goal
- To promote an efficient and effective banking system that finances economic growth, impartially allocates credit and meets the customer needs

One by one if you see, let's take the first one. Why the commercial banks are regulated? The commercial banks are regulated, you know that whenever we are dealing with a larger mass with a different motives, then there is always prone to failure. If there is a prone to failure, then there is a possibility that the banking system will collapse. If the banking system will collapse, then as we know that banks are the most vital part of the economic growth process, then the economic system will collapse.

So, the first point if you see, to reduce the risk of large scale failure in the economic system, because if one time you see if the banks fail, then whole economy will collapse. So, this is the backbone of the financial system. Because banks are the backbone of the financial system, then we have to be very cautious that the banks should be sound, the banks should be efficient, and banks should be stable. But there is all way possibility bank can fail, because they are dealing with many stakeholders, with many objectives, the intentions of the different stakeholders are different.

So, then what happens, if those thing happens, then obviously, what we can say that there is a possibility that the bank can fail and to get rid of that kind of a failure or to reduce the risk of the failure, we always try to regulate the banks, number one. Another thing to avoid the contagious effect and systematic risk in the global economy because the markets are integrated. If the American banking sector collapse, then it will have the larger impact on all those developed and as well as the developing economy.

Because we are heavily dependent on different activities, lot of training takes place. Our financial stock markets are highly integrated with them. We have lot of other type of services what we provide from the different segments and for everything the payment gateway is the commercial bank. And the system is working because of the existence of a robust banking structured, banking system. So, if any kind of economic collapses, then obviously, it will have a spillover impact on other economies, which are integrated to them.

So, therefore, to reduce that or to avoid that contagious effect or to not to make that particular problem, so big the banks should be regulated because it deals with the common mass. Third point if you see it is not very prominent for country like India, but it is quite prominent for countries like US and other countries where the deposit insurance plays a very significant role, what exactly the deposit insurance is? Whenever we have a bank deposit, for anything if your bank fails, for anything if a bank gets liquidated then your deposit is insured. You will get back your money back, you will get back to your money, but with a certain amount.

In India, this amount is only one lakh rupees, whatever money you have deposited, but your one lakh rupees you will get back even if you have kept 50 lakhs rupees, if the bank fails, then you will get back one lakh rupees. Why? Because our deposit insurance market is not very developed, this process is not have any permanence in the banking sector. Because the insurance premium what we pay for that this is quite minimal. But whenever we talk about the other developed economies, the concept of deposit insurance has his own significance. The bank pays lot of money to the insurance company to make that particular deposit insured.

So, if there is a failure then obviously what will happen? That there is a huge loss in terms of deposit insurance and that money has to be paid by the insurance company and overall the system also gets affected by that. Obviously, because banks are integral part of the financial inclusion process, banks are basically assessed by all type of customers to the stakeholders in the economy. So, they have some social obligations. And that social obligations, how the banks we can provide even it is not regulated, the bank will be only profit motive.

They will not take care of the interest of the other stakeholders. Because it is affecting the poorest of the poor, the banks should have some social objective also and that social objective can be made or social objective can be fulfilled if the banks are regulated. They will be instructed that these are the things that they have to do. So, unless this social objective cannot be fulfilled. Another one is to promote an efficient and effective banking system that finances economic growth, impulsively allocates the credit and meets the customer needs.

What does it mean? I will give you the example. In India we have a concept of the priority sector lending. Why this priority sector lending is there? The reason is, the interest rate on the priority sector is very less. The lending rates or the loans which are provided to the priority sector, these are lesser than the other type of loans so at the commercial banks provide. Why? Because they are bound, there is a regulation by the regulatory body that this much of the total money has to be given as a priority sector lending by the commercial bank.

And that is why it is called the impartially allocates the credit. And they have some obligations, you see farmer loans, the small scale industries, cottage industry, those things will not be getting any kind of loan because they do not have that much kind of capacity to pay that much amount of loan rate, what the bank charges to the industrial and commercial loans. So, unless there is a regulation or unless there is kind of proper guidelines, that this is the way the money has to be allocated, it is very difficult for the whole economy in a larger sense to fulfil objective of all those kind of stakeholders which exist in the system.

So, because of that, the regulations are very much required because the commercial banks are backbone of the economic, backbone of the financial system and the social objectives has to be fulfilled. So, these are the major reasons for the regulations of the commercial bank.

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Why Banks Fail?

- Credit Risk
  - ✓ Banks keep reserves for expected losses
  - ✓ If losses > reserves then the excess amount of losses are deducted from bank capital
  - ✓ Importance of bank capital
- Maximization of the utility of all the stakeholders; i.e. shareholders, managers, employees, customers, communities
- Changes in macro economic conditions
- Financial repression: excess government intervention
- Inadequate diversification of loans

But, another thing is already I told you one of the major reason is commercial banks are regulated because there is a probability of failure. The bank can fail quite. Why? Because if somebody will not pay, take for example, somebody has taken loan and could not repay the loan and why he or she could not repay the loan? That is a part of your credit risk. And why they cannot repay the loan? There are two reasons for that, because that person is not able to repay the loan or the person is not willing it to repay the loan. He has money, but he is not ready to pay the loan.

So, therefore, there are two reasons, one is your ability and another is willingness. This ability to some extent bank can measure. We will discuss that like different methods like evaluate raise, trust testing and all those techniques which are there through which we try to see that what is the probability that their own loan will not be repaid. But how can you measure willingness to pay, difficult. But that is why the credit risk is inevitable, credit risk is there, but still the bank has to work, bank has to operate.

Even if there is a probability of credit risk, the bank provides the loan because that is the major business, major source of income for the commercial banks. But that is a reason for failure also. And how it fails? Because, in today's context, if you see whenever banks provide the loan on the basis of the risk of default, bank basically keeps some reserves. If there is

some expected loss, bank can predict from the beginning, then they always keep some reserves for them.

But the question here is sometimes what happens, the losses what the banks make, maybe more than the reserves what the banks keep. If there is any kind of probability of loss, any kind of loss, the banks keep the reserves to overcome or to fulfill that particular gap. But it is not necessary that whatever calculation bank has made there is a correct calculation and only same amount of loss will incur or the loss will not incur that may not be possible. Then other condition is the loss maybe more than the reserves. If the loss will be more than the reserves then how the bank will basically fill that gap.

They will fill that gap from the existing bank capital where the bank has. So, therefore, the bank capital is quite important, which measures the stability of the banking. The amount of capital what the bank has to keep, a particular amount of capital ratio has to be maintained, why the reason is the bank's stability is measured through the bank capital ratio. And if there is any losses and your provisions are not sufficient enough to fulfill that particular gap or fulfill that losses, then the bank capital is used for that.

But if the bank capital is used, again it is a loss for the bank. So, that is why credit risk is very important, major factor for the failure of the banking. In India we have many cases, you might have already observed. There are many big defaults. So, that is why the NPAs are increasing. But still, the bank is surviving because of other reasons, but still the credit risk is most important factor, which affects or which is the cause for the failure of the banks or the commerce banks.

Another most interesting point, if you see the second point, the maximization of utility of all the stakeholders. You see, there are many stakeholders, you have the shareholder, you have the managers, you have the employees, you have the customer, you have the communities, like locality where the bank is situated and everybody's interests are different. And there is a conflict of interest also.

If you look after the shareholders, sometimes managers are not happy with that. That is why there is a conflict between shareholders and managers and sometimes, this incentives what you pay to the employees out of the total profit whatever you are generating that may not satisfy the employees. Somebody's objective is to maximize a liquidity. Somebody's objective

is to maximize the value of the shares. Somebody's objective is to maximize the profit. Somebody's objective is to provide any kind of services to the community.

And somebody's objective is what they want, customer what they want, their objective is to get the services when they want, when they want the money they can withdraw. Whenever they want loan, they can take the loan. So, that is why the objectives are different. If the bank will look after all the objectives, then there is a probability of failure or the bank will not satisfy the major stakeholders, then there is also a chance of a failure. So there is a conflict.

If you want to maximize the utility of all the stakeholders, the bank is also in the dilemma. If you do not maximize the utility also there is a dilemma and already I told you that profitability and liquidity do not go together. There is a tradeoff between these two. So, that is also another reason for that there is a chance of the failure for the commercial bank. Macroeconomic condition, this is not in our hand, at any point of time any crisis can happen, not only in the domestic economy, in the global economy, interest rate may change, inflation may change, government policies may change that is not in the control of the commercial banks.

If those things happen and banks are not able to cope up with that, then there is also a chance of failure. That is another reason for the failure of the commercial bank. Excess government intervention, financial repression. In India we are the public central bank government intervention is quite large. Government wants to try to merge all the banks. Now, the number of banks in India is going down particularly for the public sector banks, they want to make the banks larger, it may have both, it may have a positive impact from the banking perspective.

But it may not sometimes there is an apprehension among the people that it may not affect the welfare of the employees. But these are the many issues, so excess government intervention. But, in general, if you see that from the banking perspective, the larger size always good for the enhancing the performance of the profitability of the commercial bank. So, in this context what basically we are trying to say that sometimes excess government intervention may not be good. Also intervention is required because intervention helps whenever there is a probability of failure.

But still excess intervention sometimes creates the problem in the functional part. And because of the functional part gets affected, the profitability may gets affected. Inadequate

diversification of the loans, sometimes the loans are concentrated to a particular segment, particular industry or particular entities, then what happens if there is something goes wrong with that particular industry or for that particular type of loan, then the recovery of the loan is relatively difficult.

That is why the loans should be diversified or different type of loans what the banks give, they should always keep eye on that, that really the loans should be given in such a way that if there is something wrong with a particular industry or a particular segment, then they can extract this particular revenue or the loss or they can compensate that loss from another segment by maximizing their or recovering that loan whatever they have given. So, that is why the diversification of the loans are very much required.

It should be diversified across the industry, across different type of loans, across the different maturity. So, all these things has to be taken care, if this is not taken care, then there is a possibility of the failure. Then we have, these are the major reasons through which because of that the banks fail in the system.

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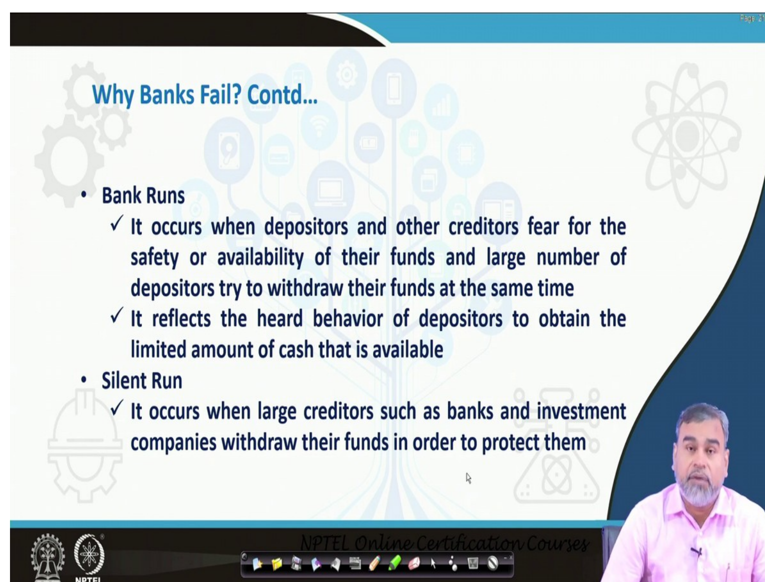

There are some other reasons, there is another factor called bank runs. This is a very interesting factor. Basically, this is a behavioral factor, when bank runs occur, when the depositors and other creditors fear for the safety or availability of their funds and large number of depositors try to withdraw their funds at the same time. Why? It may be because of the rumor or it may be because of some small event which have occurred in the bank and

everybody has apprehension that now my money is gone, I have to withdraw the money as soon as possible.

So, now, though there is a liquidity crunch, there is a cash crunch in the bank and it is very difficult for the banks to run. So, what it reflects? It reflects the hard behavior of depositors, basically hard behavior means, it is some kind of bias what we can say or we can say that, it is some kind of psychological fear among these mind of the investors or mind of the depositors and creditors, because of some external factors.

Because of some other additional issues, they want to get back their money as soon as possible and once they will run into the bank to get back their money, then there is a possibility that the smooth functioning of the bank may not be possible because of that the bank may fail. So, if the banks face this kind of problem, the probability of failure also increases.

Another one is silent run. It is related to this. When the silent run occurs, it occurs when the large creditors such as banks and investment companies withdraw their funds in order to protect that. It may not be available. It is not known to the other customers or other depositors, but any large creditor, banks and investment and all these things, they withdraw their funds. It does not happen to the common depositors or the creditors, but bank itself or any investment companies, they want to withdraw their funds because of certain reasons, then there is also a possibility of the failure in the market by the commercial banks. So, these are the possible reasons because of which the banks may fail.

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Example A: Credit Risk

Asset (Million)		Liabilities (Million)	
Loans	102	Deposits	90
Interest Rate	8%	Interest Rate	6%
Loan loss reserve	-2	Stockholder's equity:	10
Net loans	100	Total	100

Net Income: 8.16 - 5.4 = INR 2.76
Return on Assets: 2.76/100 = 2.76%
Equity/total Assets = 10/100 = 10%
(Bank is well capitalised)

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But let us see one example, if there is a credit risk, then how the bank is going towards the instability? If you see this, you see there is a simple balance sheet of a commercial bank. You have loans which is the only asset here. Here we have the deposits and you have the equity which is the liability side. Against a loan the interest rate is 8 percent and whenever they have given the loan the reserves they have kept 2, 2 million. And now, the interest rate is 8 percent against the loan and 6 percent is interest rate against the deposits and the stockholders equities 10 million.

If you see the net income what basically we get? The loans whatever you have given with 8 percent interest, we get an income of 8.16 and against a deposit, we have paid 5.4 million the interest payments and finally, this net income we got 2.76 million. So, your net income upon the total asset that is your 90 plus 10, that is 102-2 = 100, that is 2.76/100= 2.76%.

Then what is the capital ratio? Already I told you the capital ratio is basically measures the stability of the commercial bank. Then the capital ratio has become 10/100 = 10%. And as per our understanding, as per our Basel norm, if the capital ratio is more than 8 percent the bank is stable. So, we have ten percent, the bank, probability of failure of this bank is not there in this particular scenario.

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Example B: Credit Risk

Bank raises additional INR 10 million in deposits and invests in two loans of INR 5 million each. No additional loan losses required

Asset (Million)		Liabilities (Million)	
Loans	102	Deposits	100
Interest Rate	8%	Interest Rate	6%
Loan	5	Stockholder's equity:	10
Loan	5		
Loan reserve	-2		
Net loans	110	Total	110

Net Income: 8.96 - 6 = INR 2.96

Return on Assets: 2.96/110 = 2.69%

Equity/total Assets = 10/110 = 9.09%

(Bank is adequately capitalised)

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Let us see, we can change this scenario, let bank register additional 10 million rupees in deposits and invest in two loans, two different loans, 5 million each that means the loan has been given to two different entities, 5 million each. And they have not kept any loan loss

reserves for that, you assume. They feel that these two loans are risk-free. They will get back that loan at 100 percent rate.

So, previously the loan was 102 and interest rate was 8 percent same, loan has been added 5 million, loan reserves is same that 2 million. Then now, the net loans are or the total net asset has become 110. Now, because the loan is the only asset here, we have 110, then liabilities if you see, then it was 90, now it has 10 million has increased in the deposit that is hundred interest rate same, stockholders equity same it also became 110.

Now, if you calculate, if you find that your return on asset become 2.69, their equity upon total assets become 9.09. Here also still it is more than 8 percent, so the bank is adequately capitalized that is the conclusion what we can make from here. But let us assume that out of these two loans, the probability of default whatever it was there before, but now one particular loan is lost, there is a loss that means the bank could not get back that 5 million dollar to whom they have given it. One loan totally got gone into the loss.

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Example C: Credit Risk

One of INR 5 million loan goes into default

Asset (Million)		Liabilities (Million)	
Loans	102	Deposits	100
Interest Rate	8%	Interest Rate	6%
Loan	5	Stockholder's equity:	7
Loan default	-5		
Loan reserve	2		
Net loans	107	Total	110

Default loan of INR 5MM exceeds loan loss reserve by INR 3MM, which is deducted from shareholder's equity

Net Income: 8.56 - 6 = INR 2.56

Return on Assets: 2.56/107 = 2.39%

Equity/total Assets = 7/107 = 6.54%

(Bank not adequately capitalised (<8%))

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So, in this case if you observe now, how the balance sheet looks like, the net loans become, the net loans become 107 and here also, sorry there is a mistake here, it will be 107, 100 plus 7 it will be 107. So, what is happening? Why it has become 107 because you see now they have lost this 5 million. If they have lost 5 million but only they have the reserve of two. They have used it or still they have a scarcity of the 3. If they have a scarcity of the 3 then where they will get it already we have discussed that they will get it from the bank capital and capital was 10.

Now, from there they have taken the three and 10 minus three is equal to seven, right? Now, from the capital they have taken the 3 million dollar. So, the asset become 107, liabilities also I do not take it 110, it 107 and a liability also become 107, then what basically you have observed? Your net income become 2.56, return on asset 2.391 but equity which has become 7 and total asset is 107, then your capital ratio has become 6.54 percent. So, now what has happened? This 6.54 percent is less than 8 percent.

If it is less than 8 percent, now, what we can conclude? The bank is at risk, the stability of the bank is gone down and now the bank is not adequately capitalized, so there is a possibility of the failure. So, this is a small example what we are trying to explain that how the credit risk, if there is a probability, there is a default of any type of loan, then how it is really affecting this balance sheet in such a way that the stability of the banks get affected. This is the basic objective of this example.

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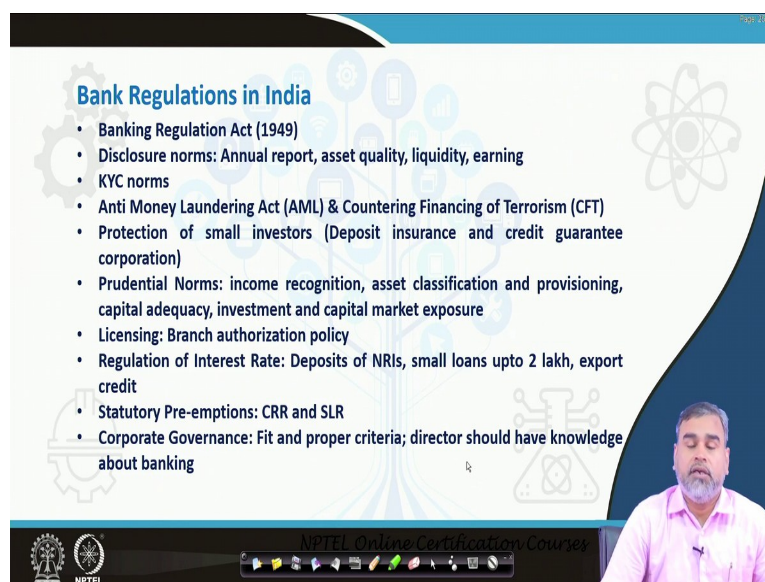

So, then we can come to the bank regulations in India, there are many regulations in the Indian banking sector have been carried out. The first and foremost the World Regulation Act 1949 has been implemented on that basis, the whole commerce and banking operation works in India. Nowadays, the banks are required according to RBI's regulatory norms, they have to disclose all the information related to annual report. Their asset quality means NPAs and all, liquidity positions, earnings positions, etcetera, in the periodical basis or daily basis.

Period time to time the KYC norms has to be fulfilled, it should have proper information about all the stakeholders and as well as all the depositors and lenders who are the clients of

the bank. We have a strict regulation in terms of any Anti Money Laundering Act and the Countering the Financing of Terrorism Act against which we have to ensure that whenever we talk about the deposit in the money, on what purpose the money is deposited, particularly, there is a huge deposit or huge lending is taking place.

The bank has to take cautious move for that. Many kinds of regulations have been made to protect the small investors or small savers. We have a credit guarantee corporation, we have deposit insurance although it is not that prominent, but still we want to protect the small savers of the small investors in the system. Then we have the prudential norms. According to RBI, periodically we have to recognize the income, we have to classify the assets, how much is a standard?

How much is a substandard? How much is the loss all kinds of thing? The provisioning of capital adequacy, how much is the capital adequacy ratio? How much is the capital market exposure that means, how much money or how much percentage the money can be invested in the stock market? That has to be also mentioned from the beginning already, guidelines proper guidelines has been given to the commercial banks.

Licensing, now licensing is a big tax for the Reserve Bank of India. This is done through the branch authorization policy through that the licensing has been made. And for that, there is very stringent criteria that the condition has to be fulfilled for providing the branch authorization, for the licensing. Then sometimes although mostly the interest rates are regulated in India, market rate remain, but some of the interest rates are still not regulated. The RBI has control over this like deposits, rates for NRI's.

The small loan rates up to 2 lakhs rupees on the concessional rate the loans are given. Export credit financing, if somebody wants to do the export business for them the loan rates are relatively lesser. For that also there is a proper guideline for that. So, for that Reserve Bank of India plays a very significant role, time to time they also change the SLR and CRR rate for the, we can say that as a safeguard CRR, is taken as a safeguard and SLR is also a kind of safeguard to maintain the liquidity. And, by the way also made the policies or the regulatory norms has been taken care.

In terms of corporate governance where mostly in the context of commercial banks they are following the fit and proper criteria. What does it mean? It means that whenever we are appointing any director for the commercial banks board, the director would have the proper

knowledge about the banking and you cannot appoint somebody who does not have this kind of idea in terms of the banking activities.

So, these are some of the regulatory regulations which are made in India for the better functioning of the commercial banks. Although there are many, but still we have just summarized certain kind of thing to get the idea that how the commercial banks in India are regulated.

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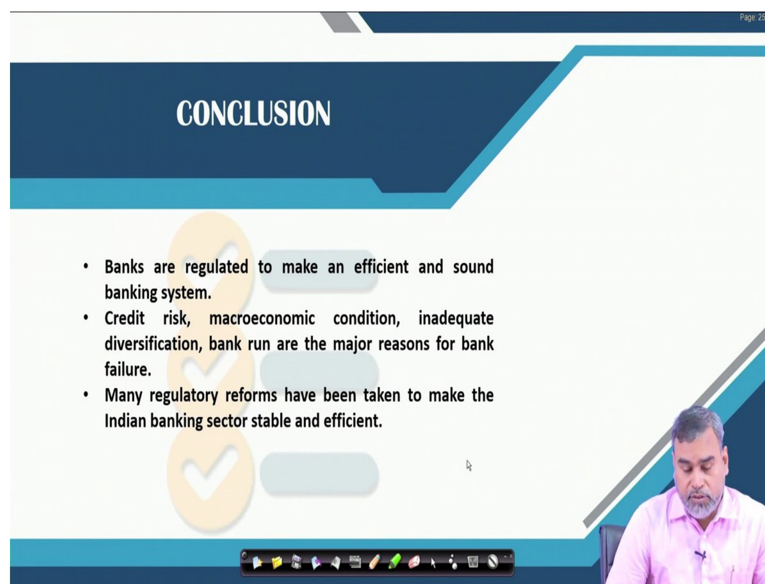

So coming back to your conclusion, if you see these are the three things what we discussed in this particular session. The banks are regulated to make an efficient and sound banking system that is where the regulations required. Credit risk, macroeconomic condition, inadequate diversification, bank run these are the major factors or major reason for the bank failure. And many regulatory reforms over the period have been taken to make this Indian banking sector stable and efficient. So, these are the major findings or major discussion whatever we have made today.

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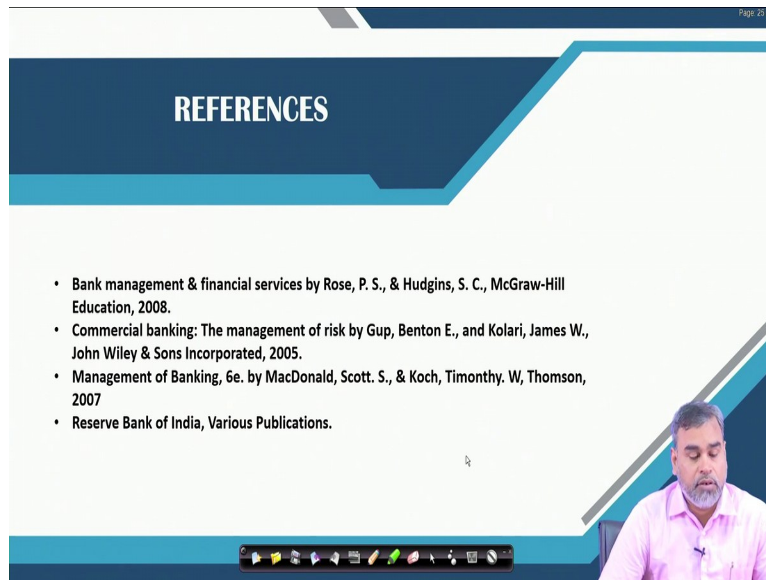

So, these are the references you can go through for better understanding of these issues or a detail idea about the regulations of the commercial banks in India. Thank you.