

**Money and Banking**  
**Prof. Dr. Surajit Sinha**  
**Department of Humanities and Social Sciences**  
**Indian Institute of Technology, Kanpur**

**Lecture - 29**

I did talk about open market operations, is it not? But a few things I have been in my notes, which I forgot to tell you. There are two kinds of government securities that are around in the Indian economy. One kind of government security are treasury bills, money market instruments, 91 day bill, 182 day, 365 day bill, you know this kind of a thing, 364. This, these are within 1 year period maturity. These are real money market instruments, but there are some other money other government bills, which are called government dated securities. You find that in Professor Holly's book, there is a description of government dated securities. These are the long term securities. These are like government bonds. These are like government bonds.

Now, when open market operations are carried out by the reserve bank of India, the open market operations are done with the economy. It can be banks, non banks, and public, whoever holds securities. I think they are primarily with respect to government dated securities. Now, the typical money market instruments, which are treasury bills, is it these open market operations are primarily with respect to government dated securities? If that is true, then you can imagine that it is a gain between two parties, the RBI and the banks and whoever holds that. So, it is a cash flow. It can be interpreted as managing monetary policy because monetary policy would say now, reduce the money supply in the economy. How would you do that?

You go for sale of government dated securities. So, reserve bank has to have a stock file of government dated securities. So, when it wants, it can go for a sale of securities, squeeze out liquidity from the system. On the other hand, RBI decides now, increase liquidity in the system on a permanent basis, not very short term. So, it can go for a purchase of government securities. Now, there is a criticism that open market operation, which are in monetary theory known as traditional monetary policy instruments in India high, but they have been used to manage the government debt and not so much as a monetary policy instruments.

So, when reserve bank has typically gone for sale of government dated securities, it is because government needs the money, is not RBI wants to conduct the monetary policy. Government needs the money. RBI has no choice. Being the central, being the banker to the government, it will say sell government dated securities. We need to date. We need to check the data as to find out what kind of sell and purchase have gone through in the last may be 4 years or so 5 years.

So, monetary policy instruments means RBI as the central bank thinks now, monetary supply need to be reduced; now, monetary need to be increased. It will go for open market operations. But, there is a criticism that open market operations in India have not been used as monetary policy instruments rather they have been carried out to finance government expenditure. So, open market operations are typically managing government debts, which government is borrowing from the economy. I forgot to mention that. So, this long term securities take all kinds of data available.

I have seen data is available, the yield curve yield to maturity in a long term curve. In that polynomial, the denominator  $1 + I + I^2$ , you can get  $I$  value.  $I$  value would change from time to time as a maturity of the bond changes. It was initially 10 year new bond. Then, it became 8 years old or 2 years old and 3 years old. So, remaining 7 years, remaining only 6 years, the secondary market opens for this bond. The buying and selling goes on. The yield keeps on varying changing. The price of the bonds keeps on changing. So, you get the yield curves for government dated securities and all sources of data you can get.

I have some data, which we need to study later, when I would get the data for this topic. I would note here which is very interesting that this is about 3, 4 years back, no above 6 years back. 6 years back, if I look at the open market operation data, you would see that open market purchase have been done from the market. So, open market purchase, open market purchase of securities means you are pumping in money injecting funds. You are purchasing securities from you and me. Central bank is purchasing, and then is giving you cash. So, pumping in cash into the system has been mostly with the market an open market sale of securities when government is borrowing money through their bonds and etcetera.

RBI is doing that open market sale of securities to you and he and banks and nonbanks

and companies have been primarily with respect to state governments. Open market sale has been primarily with respect to state governments. Open market purchase of securities has been from the market. So, they may, they mean something what I am trying to say. This is very specific meaning, there significance there. So, we will do check the data later.

Finally, I came to the last point of traditional functions, exchange control authority. Central bank of a country has the most important responsibility with respect to the exchange rate of any country. So, whenever it requires an intervention like the market is determine price, demand curves or supply curve shifting back and forth and there is a price jumping up and down call, that exchange rate is happening. If that price jump up and down is too volatile, too unstable, too much of something, which we dislike, not liked, like too higher price, we do not like that.

For instance, take of goods, and then interventions are required. All interventions are happening, intervention happening through the demand and the supply curve. Artificially, you inject something. So, you inject for an exchange into the system. So, the supply curve will shift and bring the price down. So, who does that? This controlling from outside a free market by artificially injecting supply or artificially creating a demand when it is too low, none of them is good for a country. In fact, you should learn matrix economic. You will see none of them are good for a loan.

After low exchange, rate is not good; that means, 40 rupees per dollar is not good. A very high rate price raise now, 50 to 53 rupees per dollar is also not good. Somewhere in between a moderate exchange is good. Now, this is something which matrix economic teaches you. Simple reason is a very high exchanger value. Now, with the Indian currency is very cheap because 52 rupees would mean that it will facilitate, may be exports depends how much, what kind of goods you export of course. But, it is definitely very damaging for imports because it is very costly, a dollar.

So, the import will goes up in terms of Indian rupee. So, it is very costly. So, it is not good. Similarly, a very low value of  $e$  that is an appreciated value of  $e$ , it is called a appreciate value of  $e$ . It is not good either because every dollar fetches very little Indian rupees. So, Indian goods are very costly in terms of dollar. So, an export it does has the export, but importers are very happy. So, in one hand, exporters not happy; importers are.

On the other hand, importers are not happy; exporters are. So, therefore, a high value or a low value; the question is what is the critical value?

So, usually what countries do? They set a band against an exchange rate; within which a value fluctuation is good beyond that either above or below is very bad use. So, you require intervention. Who does the intervention? RBI or the central bank does the intervention. Earlier, we used to have fixed exchange systems, where  $e$  was kept fixed. So, any fluctuation is not possible.

RBI was controlling the entire exchange market. Now, we have a more flexible exchange system where like a free market demand and supply shifts the change. But, RBI keeps a watch on that. So, exchange interventions are of course, one of the important tasks in addition to keeping exchange reserves, which you know they have to the main, deserves and deserve exchange. The central bank although private dealers are allowed. In India, also private are allowed; other than public sector banks and central bank. But, also another thing they are doing as the exchange control authority is that when they do acquire a lot of dollar. Is it good the dollar to set their idle?

Here comes the second round of activities. Is it good for a country or a central bank that when they earn dollar let that sit in a vault? No. So, they have to look for appropriate investment policies. As the central bank of a country looking for investment policies is very interesting. So, where do they go and invest dollar? Of course, it is in the international market. So, there you go. Central bank of country is acting like a company, a business company, a finance business company trying to make money on dollar. They go hunting for suitable investments in the foreign market. So, this kind of a thing that goes on investing dollar etcetera they go. What is China doing?

China is investing US treasury bills, the dollar it earns. US is benefiting. US is allowing it because US does not have an enough dollar. Dollar is a key currency in it circling all the world. So, China has a very interesting investment. Europe recently asked for Chinese investment in European central banking recently, very recently they asked that. So, go and buy things. So, central banks start operating like a commercial entity. They look for investment. They have been used in the foreign market. They go and give money to the World Bank also. Sometimes, the money is returned with interest.

They contribute also to World Bank IMF they have. Government of India has created

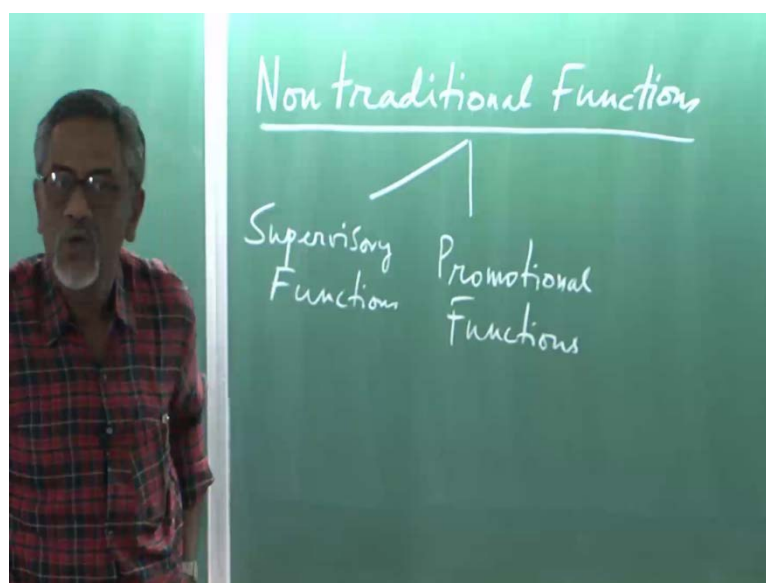
some bonds, which under called market stabilization scheme; they have created for the special bonds to mop of excess liquidity. This is because what is happening with the exchange rate is the when the exchange rate is coming, exchanger go and sits in the exchange rate dealers. The famous dealer is RBI itself and private dealers are whatever. But, the country gets flooded with Indian currency because exchanged dollar, we have to exchange the dollar to rupee. So, the country gets continuous the injected by liquidity.

So, recently government of India is floated because of this and RBI. They have involved RBI. But, RBI said, look, we are going to help. This is called market stabilization scheme MSS. You will get an RBI balance sheet. The data market stabilization scheme is essentially what they are doing. Government of India is selling bonds to mop up that liquidity. When they are selling bonds like open market operations, sale of bonds, the liquidity goes to government of India. Government of India is happy financing it.

But, it creates a physical problem because tomorrow you will have to return the money with interest. RBI has told very categorically, I know government of India, told government of India; we would help you to sell those bonds market stabilization scheme bonds. But, the physical responsibility will be on you, not us about returning the money and paying the interest. It is nice to have money today if you do not have. But if you borrowing it, you have to keep in mind, you are creating a public debt or debt private debt, whatever. In case government, it is government debt public debt. So, you have to return the money tomorrow.

So, in connection with exchange control authority, RBI from time to time protects in flow of dollar or out flow of dollar a reports that to the government. The government gets ready with market stabilizing scheme bonds to mop up the excess liquidity if it is coming in. This moral is sums up. This moral is sums up the traditional functions of our central bank. These kinds of functions more or less are similar across the world across the countries. Now, I come to the nontraditional functions, which are not typical of other countries like the federalism banks in the United States or bank of England in England or bank of Canada in Canada. So, bank of Italy in Italy; it is not.

(Refer Slide Time: 15:11)



So, let me take up today having gone through the traditional functions, the nontraditional functions. Nontraditional functions. I see here two kinds of nontraditional functions I mentioned. Then, I will come to 3. I mentioned three nontraditional functions. First, supervisory functions, this may be there in other countries. Some of that may be there. It is not exactly nontraditional, but the government of India, central bank of India does a lot more, which is good.

In some sense, it may not be very effective. But, it does the essentially two institutions within RBI, which are involved with supervisory functions like you are writing a page. If you say some supervising or I am working in a shuffler of a company and there is a supervisor supervising the work, but it is done properly, the way it should be done. So, you understand supervisory functions, what kind of activities involved here essentially.

In India, what happens if the RBI has a departmental supervision? Like there is a banking department, issue department, I told you RBI has various departments like IIT Kanpur. I mention that such some point. So, they have a they have, they have RBI has departmental supervision. There is also board of financial supervision. There is a board consisting of members. So, they have a departmental supervision and board of financial supervision who does the following things. Some of is, some of that may be common across countries. Some of that may not be common across countries.

For instance, you want to open a bank. Tomorrow you become rich like Narayan

Moorthy has so much money, he wants to open a bank. He invites share capital forcing, non capital share, capital bank or companies, corporate companies essentially. Remember, they have share capital that is how it starts they were paid of capital in the constitution. So, can he open the bank well? It requires also some regulations. So, license has to be given. I want to open a company license has to be obtained. Recession has to be done. So, in case of banks, RBI is the licensing authority. This is a supervisory function comes under supervisory functions.

It has to specify the paid of capital the bank should have that is the share capital. How much it can have? How much reserves it should have should maintain various kinds of company related issues. Then, we talk of a CRR that is every commercial bank particular schedule. Commercial bank should keep CRR money. But, a bank may be cheating on RBI. It does not show the deposits, does not keep the CRR money that need to make sure whether the CRR is maintained. RBI itself does that. There is no other authority. There is a departmental of supervision over which essentially does it, now periodically. They also inspect working of banks just not in India.

There is a state bank in Canada. I remember a branch. So, they would inspect Indian banks abroad and those Indian banks with in India of course. How they working and every guidance or some signs in the form of permission; if not a license, permission. A bank wants to open more branches. Can it open it? It will seek permission from RBI. Then, a bank should have experts or rather they require expertise among its person. To make sure that the person is properly trained or not, RBI will have to make sure that the cashier has the right skills to manage the cash.

The personal manager is properly skilled to handle personal banking, your and my banking. The manager of a bank should have the skills to decide all the loans etcetera, which he does. So, there are various kinds of skills to manage a bank, to run a bank for which training is often organized. Training centers are open. Training is important by the central bank. So, the central bank in India has a lot of things to do; not just had opened a branch, but also manpower planning training etc. What is manpower planning? A bank, what kind of people it should hire. Then, a famous thing, which I do not know how much RBI, has been effective?

I wish to do sometimes. I have not done that because I have not come across too much of

problem. Suppose, there is an irregularity. This today is the big thing about corruption going on in India. Suppose, there is an irregularity I had money in my account. It has disappeared. Where has it gone? Who do you complaint to? You can file an FIR if you wish with the police station, but essentially the central bank of our country, RBI has office where you can and go complaint what has happened. They are supposed to do the policing job if something happens with the bank. Tomorrow, you have to file irregularities complaints with the RBI.

RBI has cell to deal with like a visioning cell. It will look in to the matter. I have been told RBI functions very well. So, you can do that. Then, a famous thing I would bank is, bank is what bank deals with public money. So, if a bank mismanages public money because it gives too much of loan, too much of a bad loan, which are not returned, which become what you call nonperforming assets; if all those things happen it with a private bank with a, with a, with a bank either a public sector bank or any bank under its provision central banks supervision, then the question is it giving out the right kind of loans? Then, banks also can invest. Are they investing the right kind of securities, right kind of area?

For instance, banks cannot invest in share market. For simple reason, share markets are risky investments speculative investment. You may get return may not get return. You may lose money. So, banks are completely forbidden from investing in share markets. But, banks can invest in the paid of capital of another bank. They do that often. That is also risky because the bank may not run, but that often they do. This is because probably RBI gives a guide line. Please help out state tells the state bank of India; please help out another bank, which is under our scheme by providing some share capital.

So, you buy some shares may be 10 percent of the shares because SBI is flush with funds. But, it cannot ask for all commercial banks to do that because all them are may not be doing well. But, in general, a bank may be helping a bank can buying a pair of capital some shares. But, bank cannot go freely like you and me or a company cannot go freely and invest in the stock market because that is speculative investment captive marketiveness open ended that is dangerous. So, RBI makes sure that the banks follow these bonds supervisory work policing job essentially.

Unannounced visit, check the accounts what kind of investments they doing? Usually,



they have prior information that somebody is doing something wrong. Then, when it does some routine jobs or routine jobs? So, RBI knows this bank functions properly. The bank also knows we are in the good books of RBI. They tell each other tomorrow, there is a formality, I am sending somebody to fill out some forms will help in, I know you are doing. I have been got your all financial statements accounts etcetera. We have checked them. But, some information has come, over some bank.

In India, banks corruptions have been with severe bosses also, just not the manager at the branch level, head office level. Harsha Mehta's case 1990s was at the severe level, it happened. They are colluded because public money they dealing with. Everything goes wrong. Major thing goes wrong. The people would lose their money because they have their accounts there. They do not know. They are sleeping very well at night thinking. So, who is going to help them? It is a pretty risky business means this banking business.

An enormous amount of responsibility is associated with it. Enormous is much more than having a company because the company you are obligated only through the share holders and your employees. That is it. But, in banks it is 100 and lakhs of depositors who we do not know even personally. They come once in a while, withdraw some cash. You see them. You even do not know them. Then, you have 20 branches or 50 branches. Only the branch people would know some of them locally. So, it is quite an important task. It has supervisory function. It lies out in professor holly's book. You will find them the supervisory functions.

Then, you know the selection process of the bosses like in at IIT Kanpur, we said the deans or the directors or the deputy directors or whatever the top administrator bosses, RBI is all is in brought then the selection of the chairman or CEO, whatever, not the manager at the branch level. That is done internally. But, the head office, RBI is involved. RBI sends its people on the selection board is compulsory probably while law. So, you have your people whom you invite as experts in the interview panel. In addition, RBI people also sit there. It is a must. The one I was trying to encourage at look into, which we do not have much information is that the money markets are just not banks in India. The money market also has non banks.

Now, what is happening with the non banks? They are dealing with a lot of public money often. Isn't it this chit funds, finance companies, ICICI, IDBI, they have this bonds, flexi

bonds; mutual funds. Where is the money, public money? What is RBI regulation on them? So, this is something we need to check. I do not have much information. But, I know RBI is very much worried, very concerned about regulation of the nonbanks. This is because since Liberalization policy is where floated in the early 1990s, the nonbanks have expanded enormously in the monetary sector.

Huge amount of nonbanks are there. The business has exploded. So, many nonbanks advertise on TV these days; so many. Earlier, in newspapers, we used to see only a few nonbanks advertise may be LIC, may be UTI once in a while; nobody else. Newspaper state bank advertisement, when they are hiring, I remember state bank is to publish a big add in the newspaper. That is where people used to get information, state bank is hiring or some other bank is hiring not really, not on a regular basis. But, these days TV culture, they had ads all the time you know from these companies.

So, that has, that is a very important issue, I am not going to touch about much. How much are they controlling the nonbanks? That is a research issue. In fact, that is a very investigative issue. One needs to investigate how much they have expanded. Then, how much RBI is controlling them? Then, I come to the promotional functions. This is typical of RBI. It is not typical of other country. This is more of nontraditional functions. If you think supervisory function, what we have is the very core of nontraditional functions that RBI performs, which other central banks do not other promotional functions. Now, the promotional functions; as you understand from the word promote means you are promoting something.

You are trying to encourage and develop something. It is true it is connected with developmental activities. Now, here comes very important part of Indian banking that we were taught as a student and it used to be very boring because page after page of detailed promotional activities, we were supposed to learn when we were students, college students. But, I will tell you a little about what it is all about. The promotional functions have essential developmental functions. That means, the country is development particularly being a third one country or developing country. Development requires non typical or typical banking activities.

Banks are profit maximizing organizations remember like a micro theory for maximizes profit, but if bank are always for maximize profit attitude if they have, then they will not

find developmental activities or promotional activities very encouraging because they cannot maximize profit there. Suppose, I say RBI takes up a job because government of India has a objective to help marginal farmers of Uttar Pradesh because there is a draught not doing well, help the marginal farmers of Uttar Pradesh. Their crop has failed. Help with with extra money next season during the sowing season extra money for fertilizers seeds etcetera water another capital requirements.

Banks would say the whole group of farmers saying eastern Uttar Pradesh or western Uttar Pradesh, the crop has failed. Now, you are asking me to lend them. How will they return the money because they are already living on borrowed money locally from private money lenders, from friends, relatives? Because crop has failed, how are they eating? Where they getting the income to eat now? During the next harvest season or sowing season, you are asking me to lend them. That money if they earn, even if it is successful, if they earn anything, will go into repaying the debt. How would they repay my debt?

So, forget about earning profit, I am a land up with a case of a huge amount of nonperforming assets, where the money would never be returned to me. Here comes the concept. So, now, RBI typically India, which is unlike other central banks, the central banks; they were had a headache like that that is the government's headaches. So, special institutions they can create who headache it is.

But, in India RBI has been typically asked to carry out such developmental activities, where it would instruct commercial banks to do certain things, come out with money and help them out. Take this money and give it to the farmers because they are in touch with the farmers ground. So, even it fails, it is not your money which is failing not returned. Nabard, the whole creation of Nabard was what? Nabard was the department. It is called the department of agriculture and something in RBI until the 60's and 70's.

Then, it was made autonomous and came to be known as Nabard. Nabard whole business was to get money from RBI. This was done as loans to various category of borrowers, marginal farmers, small farmers, rural artisans, semi urban area manufacturers, various kinds of agricultural and rural credit where often loans were defaulted. Nabard is a separate organization. There was for RBI that is the promotional activity, they used to carry out a lot through Nabard. But, through a department; those days, it was a

department.

Later, it became Nabard. Like the department of mechanical engineering one day becomes autonomous and sits outside IIT Kanpur somewhere and is called center for something. The entire mechanical engineering stuff is moved here. Here, it is expanding. It gets help from IIT from time to time otherwise it has no connection with IIT. So, therefore, the promotional activities are essentially development activity, which is are nonprofit activities, not necessary you make profit. You can make profit, but not guaranteed at all.

The chance is, high chance is that you do not make profit. Now, how to do that? So, there RBI has come up with rules sometimes for commercial banks where commercial banks suffered a lot also in India. They would say extend banking facilities to small towns and rural areas. Banks would say my goodness small town's rural areas, but RBI would say no no no, to develop banking activities, you have to open branches in small towns and rural areas compulsorily. Then, those indigenous banks who are around like Gujarat shafts Sun Multan's and Chettiyad's in Tamil Nadu bring them within the main system.

How to do that? I do not know. You do it. Then, they used to do a merging activity. All these public sector banks that you see, you know they were all private banks. In 1969, the most important nationalized program was carried out by Misses Indira Gandhi bank nationalization. Even though after that many of the banks were merged together, now what you call bank of Baroda. If you go back in to the history, you will find they were 2, 3 banks were merged to create Bank of Baroda. So, many times, weak branch were merged with the large ones.

Why they were merged? This is because any bank is dealing with public money. if you say I now, what you call the liquidate this bank, the entire public money would be lost, people's money. You cannot liquidate a bank like liquidating a company. So, they were often merged with the stronger ones. So, that was done then they create some insurance companies for insure the deposits of the public. Banks were given facilities of an insurance company they created called deposit insurance corporation, DIC. Deposit Insurance Corporation would typically do what? When public deposits come, I do not know banks were met to pay something.

So, the deposit insurance corporation would insure the deposits in behalf of the people.

Then, I have already told you. They had this schemes which in details they have a level that this much will your priority lending. They would issue a guide line to a commercial bank. The total lending in a year that you do, 30 percent should be priority lending guidelines lending. That means what? Suppose 100 crores they lend. 30 percent, 30 crores will be priority lending. What do you mean by that? So, what is priority lending? Well, priority lending will be in this state, these are the farmers who should get money and artisans. In that state, those are the small scale industries that should get money from you.

They should on all India bases should come up to 30 percent of your total lending. They would issue guidelines like that 30 percent priority lending. I cannot make money there. We do not care with you make money or not. That has to be there priority lending in order to ensure that they create the nationalization of banks essentially. Then, they can direct the banks to do whatever they want to do and the banks were doing all whatever they want it to. But, the net result was till mid 1990s, whenever bank balance sheets would come a newspaper business, which they ever had the culture making profit running it efficiently, neither had they had the personal.

They became kind of a employers. They would hire people and then their business policies where all under constraint etcetera restrictions were not performing well. So, they would set up such things priority etcetera. They would always have that. Banks also remember there are the main advisors. A commercial bank requires some technical personnel. Where to get them? How to train our people? They always go to RBI for help. I have seen at IIM Lucknow, when I visited once, I remember the whole team of RBI people has come. You know that why that team has come?

It has come to get themselves trained, to train finance institutions in India. They are going through a 6 weeks management course. They have these modules. IIM at Lucknow, I saw bulk of the dining tables were all booked. Then, I went near and found out RBI. Then, I asked this friend of mine, what is going on here? They come, they periodically come. They have come for training. So, these IIM people would train demonstration things. Then, they would do something for RBI on their behalf and train, probably commercial bank people to do whatever to do and use and give advises and suggestions and whatever, consultancy, may be consulting.

They have become a consulting institution for commercial banks. RBI has been famous with respect to these nonbanks that they have received and the funding they have done and refinancing the loans etcetera. RBI would directly buy the share capital and set up IDBI. ICICI is the private sector nonbank, which was created by the World Bank. But, IDBI was created by RBI and government of India directly funded. In turn RBI, IDBI has setup a Sidbi. When it could stand on its feet, it setup sidbi. Then, you have nabard, exim bank, industrially reconstruction bank of India. A whole range of non banks because of promotional activities, they are very specific jobs.

IDBI was meant to develop the heavy and the medium industries. Sidbi was meant to develop the small industries. National housing bank, industrial reconstruction bank of India is like a IRBI is like a hospital for banks, where when fostering for companies when companies do not do well it goes to the hospital for cure medicine. So, they study that company why is not doing well etcetera in industrial reconstruction bank of India. So, it has given various kinds of loans, assistance and did setup many institutions. Why are these institutions setup in the first place? This is because they had very specific role to play in the development of the Indian economy.

So, these are the promotional and development activities that RBI carries out, which is not the case if you read about the Fedistry. What federalism bank has been doing? It is doing more traditional, orthodox central banking operations. Here, it does an operation like a government institution, where government in a socialist system controls and develops things, not a private economy oriented development.

It has not created an extra institution. It has given the entire responsibility to the central bank to do it. It is very unusual. It does not happen everywhere in the world. I will show you the loans etcetera the money that RBI gives has been given in a data. I am sorry that it is not that exciting this part, but you will have to know this. So, tomorrow we will meet again.