Retail Management
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Lecture-44
Retail Operations: Financial Aspects

Hello everybody, welcome to this NPTEL swayam course on retail management, this is professor Swagato Chatterjee from VGSOM IIT-Kharagpur who is taking this course for you. This is week 8; lecture 44 and we will be discussing about retail operations the financial aspects of that. So, in this video and in the next video we will talk about what are the financial decision makings, overall broad financial decision making that is required to run this retail business.

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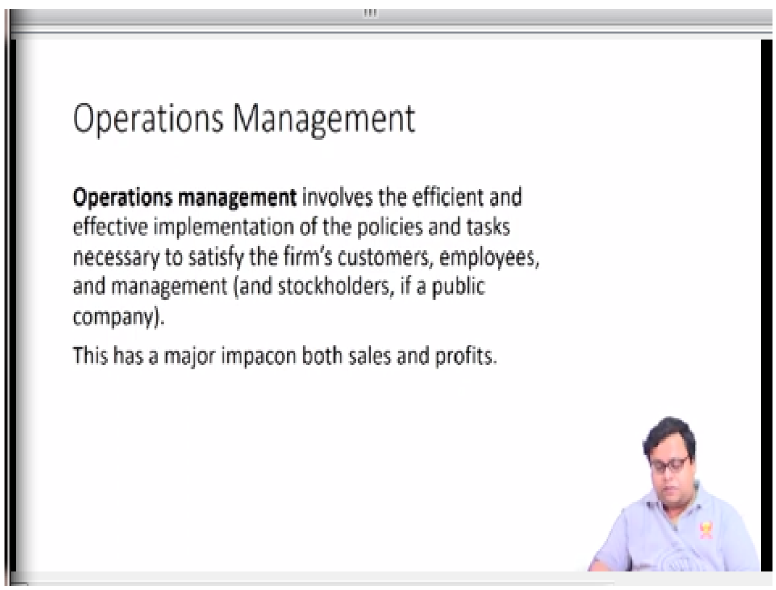

So, when we talk about operations management, operations management involves the efficient and effective implementation of the policies and tasks necessary to satisfy the firm's customers, employees and management and stakeholders in a public company. So, one of the various things that you want to make sure that your stakeholders or your shareholders get or your employees get, you see your employees you have to give salary and benefits to them.

Your customers, you have to continue serving them, your management, you have to give some amount of money to them. So, that you can do all of these things, one of the major factor which actually will allow you to do all this stuff is called sales and profits. So, sales and profits are something that is very important and we will be discussing that how the financial management can be done in keeping this sales and particular profit in focus.

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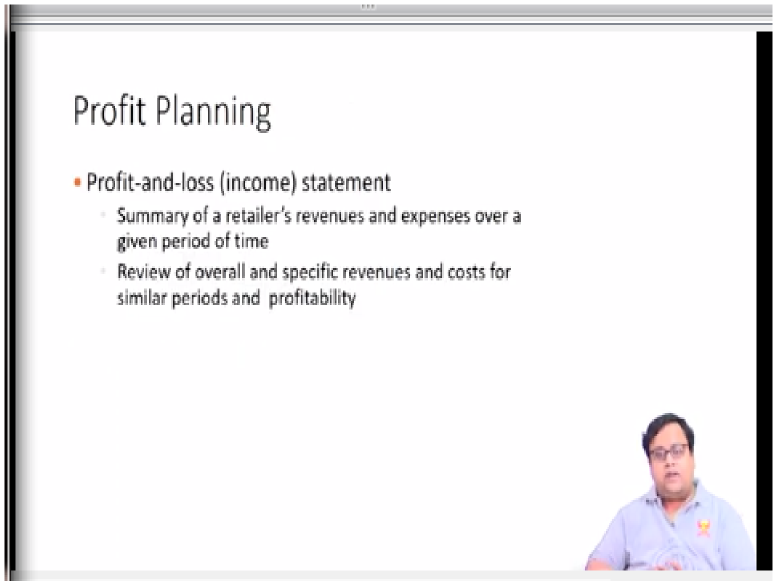

So, while we discuss that there is something called profit planning? So, you have to plan that how much money you will make in which year and how the money making business will slowly grow at the end of the day, so that you can cater to the customers, you can cater to the management and you can cater to the employees. So, one of the way to do that is to have an idea about profit and loss statement that is the first basic idea that you should have.

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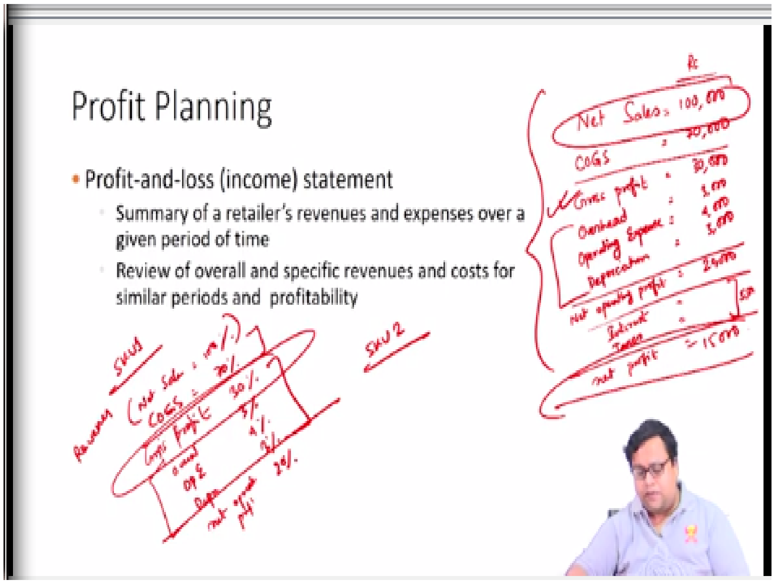

So, there is something called balance sheet and there is something called profit and loss statement. So, we have to be very clear what these two things are. Profit and loss statement is the summary of a retailer's revenue and expenses over a given period of time and you can review of ,so overall and specific revenues and cost for similar periods and profitability. So, you can use profit and loss statement to make sure that which particular product is more productive which particular product is more I would say giving you more profit at the end of the day?

And in a particular time period that you choose and then you can also find out that how I can improve my product positioning, my marketing, these, that, so that the profit of that particular product can be increased. To do that you have to first understand this what is this income statement is or profit and loss statement is? So, now from a financial accounting background this will be easy to understand.

But in a retail context also somebody should know that how these things can be calculated. So, we calculate this let us say net sales, so we start with net sales and then out of this net sales let us say net sales is let us say 1 million, 1 lakh dollars let us say these are all your rupees let us point it out. And then you are saying that what is your cost of goods sold? What is the cost of the product that you are making?

So, let us say that is 70,000 rupees, so this is the cost in which you have bought the product. Then basically gross profit is 30,000, this is the gross profit that you are making. Now let us say you have to rent the place, so there are certain overhead costs, there is certain kind of employee. So, what is we will include the cost which is the rent that you are spending or let us say overhead will also include the salary that you are giving.

So, any kind of operating expense will be that salary and etcetera, so overhead will be irrespective of the having the business you have to pay this amount. Operating expense is to run the business how much amount you have to pay? So and then there is let us say certain amount of depreciation, so these amounts are let us say sum of the amount. So, let us say this is overhead is 3,000 and this is 4,000 and this is 3,000 rupees.

So, ultimately you get your profit after, so I would say net operating profit is something is let us say 20,000. Now comes your taxes, your interests, so some of the interest that you have to pay, you have to pay taxes and so on. So, let us say by that you also spend another in total another 5000 rupees. So, then comes your net profit which is basically 15,000 rupees, so you have to do this calculation first.

Then you can also think that ok, then my net sales if it is 100% then my cost of goods sold is 70% and gross profit is that is why 30% and then overhead is basically 3% of my sales and overhead operating expenditure is also 4% of the sales and depreciation is basically 3% of the sale. So, net operating profit was getting which is 20% of the sale, so why that is important? Because now I know that this is my revenue and these are my costs, how I costs and revenue whether that ratio remains same over time?

If you do something if you change if you try to grow big whether the cost to the revenue ratios are keeping in sync or not? So, that analysis is very important when you are going ahead, so this is what the profit planning will do. Now you can do it at a what all level, you can do it for SKU level also, let us say this is SKU 1, you can calculate it something for SKU 2. Sometimes getting this overheads, operating expenditure and etcetera, this we can divide it equally.

However, the gross profit part can be basically calculated separately for each SKU, so which might not be possible for the operating expenditure or overheads or depreciation, each SKU level calculation might be difficult. But at least the contribution of these individual things on the gross profit you can easily calculate, so for that this profit and loss statement is required.

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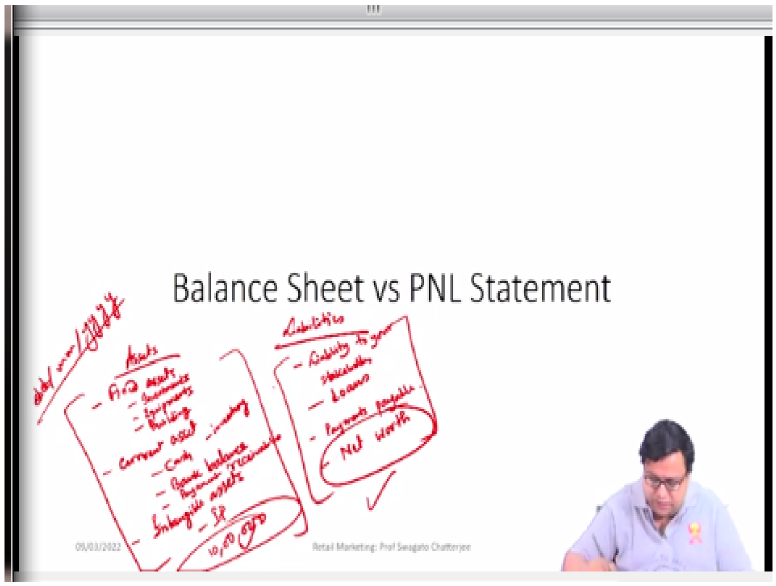

Then there is balance sheet, what is balance sheet? Balance sheet is basically a view of the financial status of the organization on a particular day. So, generally we take 31st march which is the last day of the financial year but you can get a balance sheet for any day of the particular financial year. So, what is the current situation of this particular organization financial situation that is what balance it says?

Now balance sheet says 2 things majorly, one is assets another liabilities. So, what are the assets? There are some fixed assets and there are some current assets, current assets will include let us say your cash in hand or bank balance which a liquid which can monetize very quickly. On the other hand fixed assets are let us say your investments in certain other places or your equipments or your buildings etcetera, etcetera.

Then there will be certain intangible assets also, if you want you can have, this is intangible assets which are like let us say your IP. Payment receivables which are current are also part of current assets. Means, these are the amount that you will receive from your client, payment receivables are also part of. Then liabilities who are you liable to? There are certain long-term and short-term liability, for example let us say amount payable is a liability.

Similarly you have certain liability to your stakeholders, certain loans on certain let us say liabilities can be. So, after that whatever you get is your net worth, what is the worth of the business? So, all these things should match, so this asset side and liability side should match. So, basically your net worth is all your assets minus all your physically visible liabilities, so those things should match in a balance sheet that is how the balance gets created and this is in a particular date.

So, dd/mm/yyyy, in a particular dates this particular view you are getting. So, balancing will give you what is the current condition and profit and loss will give you in a particular period which are multiple days in it how the business has gone through?

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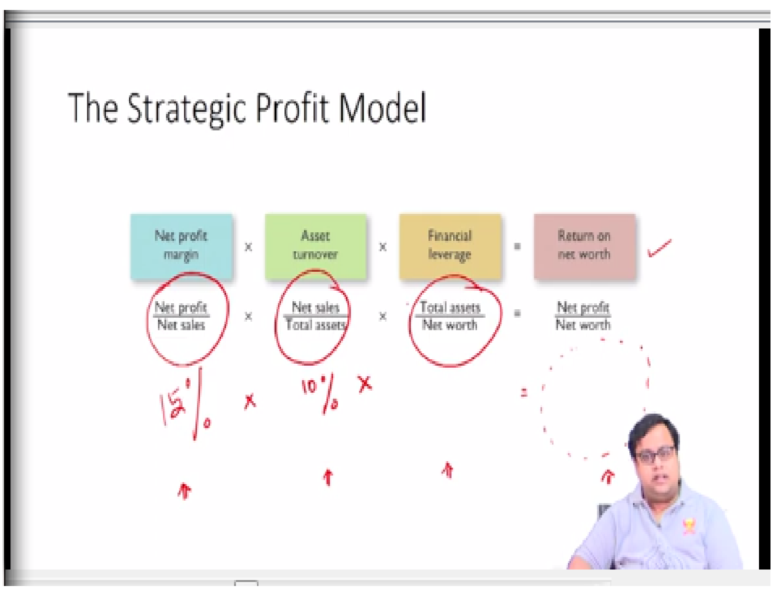

Now why this is important because there are certain matrices that we measure using these values. What is called net profit margin which is net profit divided by the net sales, so how much profit you got? This net profit divided by net sales which is in our example it is 15%, so that was my net profit margin. Multiplied by asset turnover, asset turnover is basically net sales by total assets.

So, let us say your total assets which you are getting is lesser 10 lakhs and your net sales was 1 lakh, so this into basically 10% is your net sales. Then total assets divided by net worth, what is your financial leverage? Means how much more asset than you have then your worth, that is your financial leverage. You will see that total assets divided by net worth, total asset will always be higher than the net worth that you have, so that will be the financial leverage.

That is equal to basically your profit on network, so are you making more profit than your net worth or are you making less profit than your net worth? So, that is which is something that we want to improve as much as possible. So, as we increase this or as we increase this and as we increase this, this will also increase and there has to be. But sometimes it becomes problematic that you see you cannot increase these particular net sales by total assets by reducing your total assets.

Because the moment you reduce in total assets your financial leverage also reduces. So, you have to increase each of these things by changing by increasing the numerator not by reducing the denominator. So, you cannot get higher margin by reducing sales because the moment your net sales goes down, your asset turnover also goes down. So, you can only improve this by trying to improve the numerator of these observations of these 3 different measures. But what is profit margin, what is asset turnover, what is financial leverage and what is return on net worth is some of the major factors which in the retail is considers.

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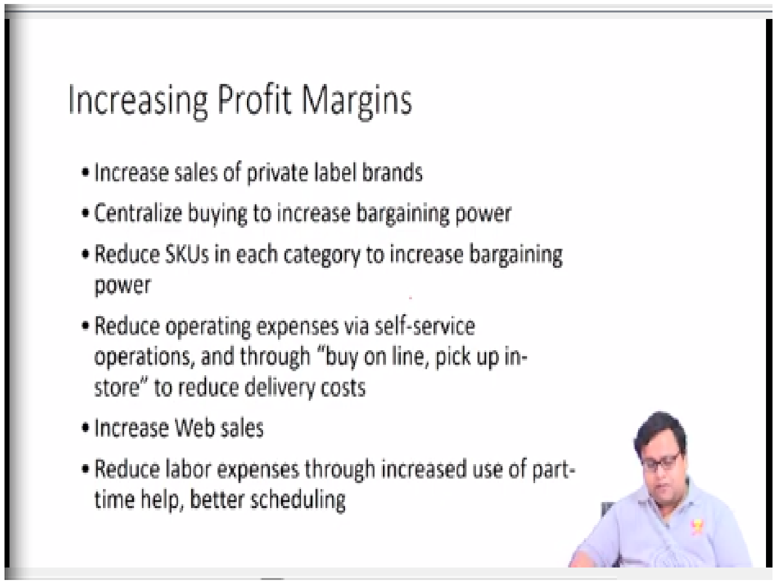

So, how to increase profit margin? Increase sales on private label brands, that is a very common strategy. Centralize buying to increase bargaining power because I can reduce the cost of goods sold as you said, so that 70,000 cost of goods sold. I can do a centralized buying to increase my bargaining power. I can reduce SKUs in each category to increase bargaining power; I can reduce operating expenses like this. We have written here 4000 rupees or so. So, I can reduce the operating expense via self-service operations, through buy online pick up in-store to reduce delivery costs.

I can increase web sales because web sales if I can increase then the asset will be not required, so I do not have to create lot of hard assets, I can have soft assets, I can have current account balances. And reduce labour expenses I do not have to take loan probably if I do lots of web sales. And reduce labour expenses through increased use of part-time help or better scheduling. So, if you do not have liabilities you can reduce your liabilities or if you can reduce your long-term costs that will be better for your profit margin.

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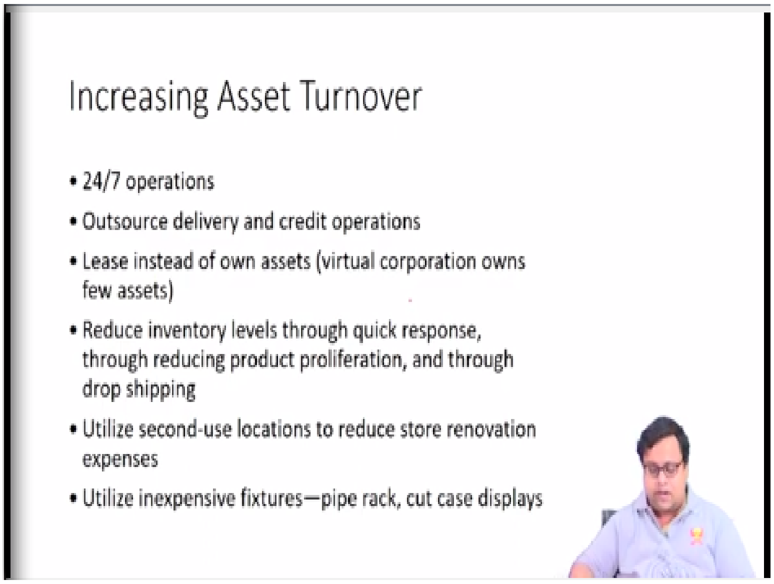

How do you increase asset turnover? The second one what is asset turnover? If you remember means net turnover net sales divided by total assets that is asset's turnover. So, to increase the asset turnover you have to either improve the sales or make your asset more efficient. So, how can I make my assets more efficient? I can have 24 into 7 operations; I can outsource delivery and credit operations, so that my asset does not get disturbed.

Lease instead of own assets, so instead of owning my own assets I can put that in lease and all the lease amount goes to operating expense. So, instead of making my asset size heavy I will increase my operating expense size and will not show that in the balance sheet. So, lease instead of own assets which is virtual corporation owns few assets that is why. Reduce inventory levels through quick response through reducing product proliferation and through drop shipping.

So, I can either make sure that I will reduce the chances of having expired products or I can very quickly reorder or I will do drop shipping, I will rather ask somebody else to drop it, so I will not keep my inventory a, b. Utilize second use locations to reduce store renovation expenses, so instead of in renovating the particular store I can use the second use locations, not the top much locations.

And utilize inexpensive fixtures like pipe rack or cut case displays, so what the fixtures that are displayed that are there inside the store I can reduce the cost there because nobody watches like the fixtures exactly as long as they are standing I can cut the cost there. So, these are some of the strategies that the retailer takes.

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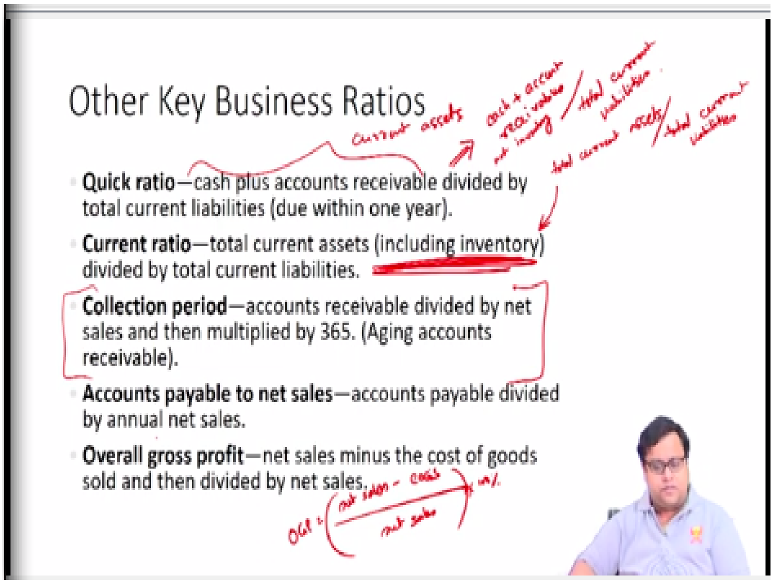

Now what are the other key business ratios in this context? One is quick ratio, quick ratio is basically cash plus account receivable which is basically current assets, these are current assets divided by the total current liabilities. So, current assets by current liabilities, total current assets divided by total current liability, so it gives me an idea that whether now I can do the business or not? Now do I have more money in my hand to run the business or not?

If my total current liabilities which is due within 1 year is higher than my time characteristics. That means if my quick ratio is lower than 1 I have to ensure that I should get as much cash flow as possible. Cash flow is as much cash as much liquid money I should collect from outside, I am short of liquid money, so that is what a quick ratio is, which gives me an idea that whether you have money to do business or not?

Current ratio, total current assets by the total current liability, so that is the current ratio. Quick ratio will not include the, so it is not the total current asset cash plus account receivables means this will not consider any kind of short-term liabilities basically. So, cash plus current account receivables divided by, so this current asset will not include inventory, this is basically the key point, so not inventory.

Inventory means the product that we have already made, so this first will not make an total current liabilities. So, quick ratio will not include inventory I forgot and this current ratio will also include inventory. So, here I should have mentioned that inventory is also a part of your current asset because this is something that you can sell it off very quickly at a lower price if required. Then comes collection period, what is correction period?

It is accounts receivable divided by the net sales and then multiplied by 365, means what percentage of your sales will be got? So, you will get in 365 days as simple as that. So, if I know that ok 80% of this is I will receive in 365 days, then 80% into 365 that is the expected duration by which I will get all my money. So, aging accounts receivable how old is my average account receivable that is something that can be found out by this collection period.

So, what is the average age of my particular? So, by this you can also get an idea that what is the cash flow that you are going to get. Then accounts payable to net sales, so how much your current sales that is coming up will take care of your accounts payable. So, can your revenue overcome the liabilities that you have, the current liabilities that you have? So, this is very important even at the early stage of the retailing.

So, unless your sales is higher than the accounts payable, accounts payable is in the short-term I am saying, unless your sales is higher than that then you are not making, your business is absolutely going for a lot, there is no hope for the business. So, accounts payable to net sales has to be positive, it should be as much positive in the initial stage and later stage you can be lesser in size.

Overall gross profit is what? Net sales - the cost of goods sold and then divided by the net sale that is the overall gross profit. So, I told you this is the gross profit if you remember, this is the gross profit. So, if I want to put that in percentage I will write it like this that overall gross profit is net sales minus cost of goods sold divided by net sales that is in the percentage term is basically the overall gross profit, what percentage of that is overall cost profit.

$$OGP = \left(\frac{\text{Net sales} - \text{Cost Of Goods Sold}}{\text{Net sales}}\right) \times 100\%$$

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Here in this particular balance sheet sorry in this finance statement we got the overall gross profit to be 30% of the total net sales, so that is what we found. Now these are also some of the important financial ratios which become important in the context of retail. So, quick ratio is important to know that how I will continue the business whether I have money to continue the business in a very short-term.

Current ratio is whether I have money to continue the business in this current period. Collection period is basically giving you an idea that by which time you will get your money is back from the people who should give you the money. Accounts payable to net sales is account payable divided by the annual net sales.

So, whether currently whatever your net sales are doing is and overcome the current liabilities that you have which is short-term liabilities and gross profit is net sales minus the cost of goods sold divided by the net sales which is overall profitability, sometimes even is in the SKU level we can get it from the overall gross profit. So, in the next particular video we will be discussing about budgeting and costing. So, this is another part of this financial analysis or financial control which is called budgeting.

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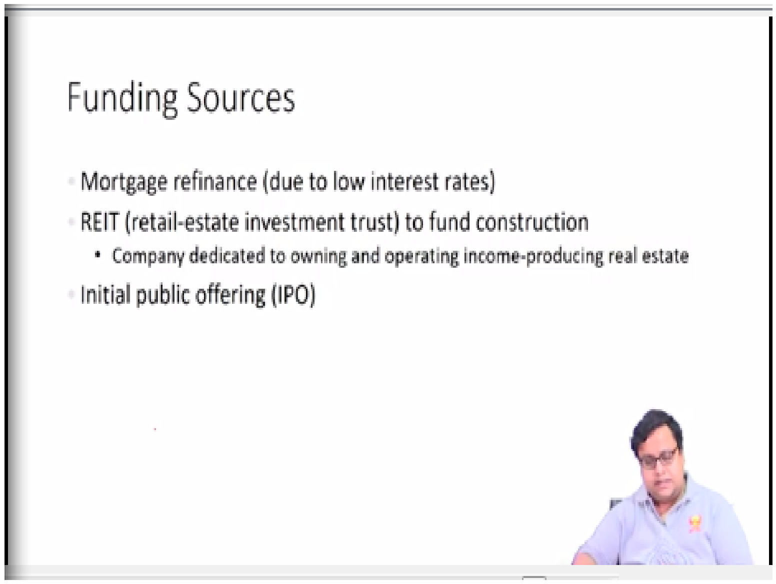

So, why the budgeting and costing comes in? So, one source of money can be your business, I told you that there are quick ratio, current ratio etcetera, and which gives you an idea that whether you have cash to do business or not? Now if you do not have the cash or if you have to get cash from outside what are the funding sources? One is you can go for mortgage refinance, what is that?

Due to low interest rate you can probably go for you can keep certain things at mortgage and then you can get the money, you can do business, you can earn money and then you can pay back the mortgage. So, mortgage is generally something that you keep and you give to the loan, loan provider it can be a bank, it can be an investment banker, you can probably give that the fixed asset to the mortgage company, so that you get certain money out of it.

It can be retail estate investment trust to fund construction, so there are certain trusts. So, company dedicated to owning and operating income producing real estate is called retail estate investment trust. So, these people invest on your retail sector basically the construction business, construction part of your retail and then they take certain share of your profit or of your sales at certain point of time.

But initially they invest on creation of your facilities, so that is also one source. And you can also go for initial public offering, so IPO is a very common way to generate but nowadays people actually go for IPO only when they have shown certain result, they have shown that ok I have the primary level of results, I have the primary level of sales and profits and user bases, now I want to grow big will you invest on it?

So, that is another way of getting the money in your pocket to do business. But whichever way you choose you have to make sure that you should also have an idea that how I will be doing this business, how I will be actually running the business. Because getting a lot of money is nowadays the market is going in a boom, people are interested to invest but there are certain factors which sometimes make it difficult for the people to invest.

For example the investors might start thinking what is the future? If there is a war going on somewhere or if there is a huge pandemic going on somewhere, then any kind of calamities that are going on, it can be natural, it can be human created calamities. This can create a little bit of problem in the mind of investors. And investors not only large but the small investors also becomes a little bit scared.

And those ups and downs are always there in the share market which impacts the business cash in hand, the availability of cash in hand heavily. Because you see that if investors all of a sudden are not very much they are not hopeful anymore, keep taking the money and put them in the bank then it creates a problem for the business. Because they do not have money for them because this investors and etcetera is taking away money and putting that in their savings account or any other account or any fixed deposit kind of account.

So, that creates problem for businesses, so they should always know that how I can also leverage the money that I have got to create certain situations where I will be making more profit and that is why more hopes for the investors to get a lot of benefit out of it and they will invest on it. So, this is something that becomes very important in the context of retail that how to manage the investors.

Often people try to show these ratios that I have discussed are bitter; sometimes they try to reduce the number of assets that are there in the customer base. So, that they can show that see how much is my asset turnover. Or they probably will sometimes say give discounts to the accounts receivables. They say that ok, see this much is your account payable to me but if you pay within a month then I will give you 10% discount, 20% discount. So, that the money comes very quickly, even if it is a little bit of discounted price the money comes quickly and they get certain kind of benefit out of it in the businesses.

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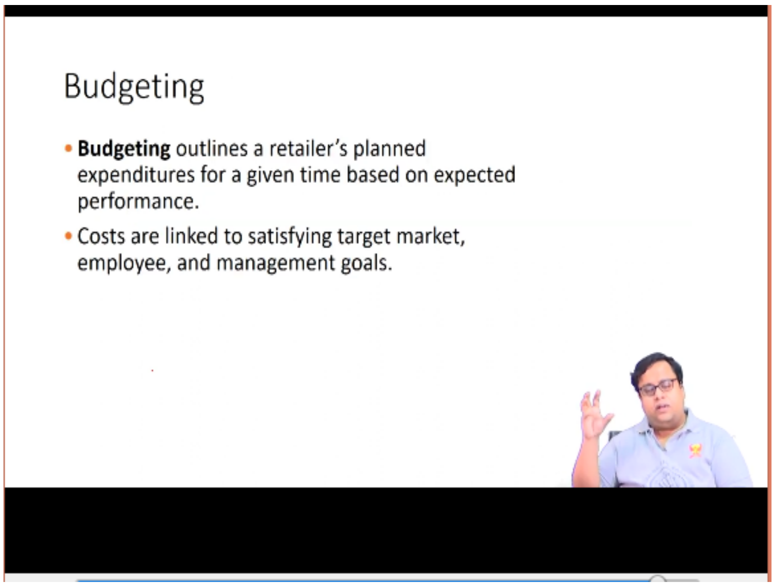

So, one way of handling all the business is called budgeting, what is budgeting? Budgeting outlines a retailer's planned expenditure for a given time based on expected performance. So, budgeting is basically a planning of expenditure, how I have this much of finance available with me, how I will spend it in different context? So, that I can achieve the goals that I have. Costs are linked to satisfying target market, employee and management goals.

So, one is which market to target? In sync with that you have to do budgeting. You have to also know what is your employee goal. What they are looking for, what kind of benefits they are asking for or what kind of basic necessities I have to fulfill for my employees. So, that they are more interested to work, they are more motivated to work and contribute towards the well-being of the customers, well-being of the company, well-being of the stakeholders.

So, you have to keep your employees happy and that is a very important part of the budget. How I will actually allocate funds in different part? And even you talk about employees budgeting, you have to also think that it is not only salary, there are benefits, there are training programs, skill development programs, psychological aspects you have to spend money, you have to spend money on insurances or securities.

So, all these things are in together create the employee benefit programs. And then you can also do it for management goals, you should have your own strong management goals in mind when you are doing budgeting. So, what we will do is we will stop here this particular class because it will get elongated otherwise. And in the next class we will discuss in details about budgeting as we come back, thank you very much, I will see you in the next video.