

Financial Accounting
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Lecture – 72
6.3 Tutorial – Liquidity Ratios

This is a tutorial on Liquidity Ratios. We are going to look at a set of financial statements and comment on the short-term financial position.

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6.3.1 Tutorial – Liquidity Ratios

Assets	2020	2019	Liabilities	2020	2019
Non current assets			Equity		
Plant and Equipment	4800	4700	Shareholder Capital	6500	5500
Investments	1000	800	Reserve and Surplus	2000	1500
Furniture	1200	150	Preference Capital	1500	430
			Non current liabilities		
			Debentures	2000	1300
			Bank loan	120	100
Current assets ✓			Current liabilities ✓		
Cash & Bank	2000	2300	Creditors	300	200
Marketable investments	1000	50	Bills payable	450	400
Prepaid expenses	-950	-300	Short term loans	30	20
Stock	-500	-400	Bank overdraft	50	50
Debtors	500	800			
	12950	9500		12950	9500

C A
5950
3850
CL
350
670

L A
4500
3150


A C A
4000
2350




On the screen you see a balance sheet where you have assets and liabilities. We need to comment on the liquidity position of the business or the short-term financial position of the business. We know that we are interested in the current liabilities of the business and current assets for the business. Luckily for us, you have been clearly given the current liabilities and current asset items in the format which is prescribed. All you need to do is calculate the numbers and comment on the financial position of the business.

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6.3.1 Tutorial – Liquidity Ratios




Particulars	2020	2019
Incomes		
Sales	23000	20000
Cash	13000	12000
Credit	10000	8000
Expenses		
COGS (Purchase are 60% of COGS, all on credit)	15000	12000
Employee welfare expenses	600	400
Depreciation	120	100
Other expenses (80% operating expenses)	400	400
EBIT	6880	7100
Interest	150	50
EBT	6730	7050
Taxes	2692	2820
PAT	4038	4230
Preference Dividend	100	50
Net income available to equity	3938	4180
Equity Dividend	2000	1800
Retained earnings	1938	2380
No of shares	1000	800
MV per share	50.78	40.71



We also have an income statement that goes along with it; if you need any information, we can pick it from there as well.


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6.3.1 Assessing liquidity position



$$1. \text{ Current Ratio} = \frac{CA}{CL} = \frac{\text{Cash \& Bank} + \text{Mkt Sec} + \text{Debtors} + \text{Stock} + \text{prepaid exp}}{\text{Creditor} + \text{Bank OD} + \text{ST loan} + \text{Bills Payable}}$$

	2020	2019
CA	5950	3850
CL	830	670
CR	7.16	5.74



Let us start with the current ratio. We know the current ratio can be calculated by dividing the current assets by the current liabilities. We need to figure out what are the various current assets for this company. For that we go to the balance sheet and see that we have cash and bank balance, marketable investments, prepaid expenses, stock and debtors: there are five items given in the balance sheet under the current assets. The other thing is that we have 2 years'

worth of data. We will calculate the ratio, the indicator for both the years, so that we can also comment on whether the current ratio has gone up in these 2 years or gone down. So, we can do a year-on-year comparison as well. Sum of cash and bank, plus marketable securities, debtors, stock and prepaid expenses make current assets. On the other hand, under the current liabilities we have are creditors, bills payable, short-term loan, and bank overdraft. This is the detailed expression of the calculation. So, we have to now add these two numbers and we have to do that for 2 years; we have 2020 and we have 2019. So, let us look at year 1. So, here the total, this total will come out to be 5950 for 2020 and for 2019 the total will come out to be 3850. The current liabilities total will come out to be 830 for 2020 and will come out to be 670 for 2019. These are the 4 numbers that we are interested in and we are going to match this number with this number; 5950 divided by 830. So, 5950 divided by 830 and for the second year, we have 3850 divided by 670. Let me just double check. Assuming that I have done the calculations right; we have to just divide these numbers to figure out the current ratio, and I have my calculator with me. So, I have to do 5950 divided by 830, which gives me 7.16 and the next ratio for the previous year we have 3850 divided by 670, which gives me a ratio of 5.74. There you go. Now we have the current ratios for the 2 years 2020 and 2019 and clearly the trend is upwards; it has improved. Let me just verify, yes. So, this is 2020, this is 2019. You have the current ratio. This means in 2019, your current assets were 5.7 times the current liabilities. In 2020, your current assets are 7.16 times the current liabilities. So, it is a good position to be in. As per the thumb rule, textbook thumb rule, 2 is also good enough. So, it is far better than that; but again, you have to look at industry standards. Later on we will also look at comparable industry ratios to come to more conclusions. Right now, the objective is to learn, to calculate these numbers and we have done that.


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6.3.1 Assessing liquidity position

2. Liquid Ratio (quick ratio or acid test ratio) = $\frac{L A}{C L}$

$L A = C A - (\text{stock} + \text{prepaid Exp})$

2020	2019
$\frac{4500}{830}$	$\frac{3150}{670}$
LR = 5.4	4.7



Let us move forward, let us figure out the next ratio which is liquid ratio. For liquid ratio we will have to use the liquid assets and divide the liquid assets by current liabilities. And we know that liquid assets are equal to current assets minus the stock and prepaid expenses. So, we have to calculate liquid assets. I will go back to the balance sheet. These were the current assets and these were the current liabilities. Let me figure out liquid assets, current liabilities remain the same. Liquid assets are going to be equal to 5950 minus the stock and prepaid expenses. We have to take out 950 and 500, which gives you 4500 as the liquid assets for 2020. Similarly for 2019, we have to take out these 2 items. Thus, 700 to be deducted, 3150 is the amount for liquid assets. So, 4500 and 3150, these are the numbers for liquid assets and we divide these by the same numbers 830 and 670 as 830 and 670 are the current liabilities. And I have my calculator again, 4500 divided by 830 gives me 5.4 and 3150 divided by 670 gives me 4.7. There you go.


These are the liquid ratios for the 2 years; this is 2020, this is 2019. Again, the trend is upward and your liquid assets are 5.4 times the current liabilities, which is again a good position to be in. But again, caveat is that you have to look at the industry ratio; you have to look at your competitors before coming to a conclusion.

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6.3.1 Assessing liquidity position

3. Absolute liquid ratio = $\frac{A LA}{CL} = \frac{\text{Cash} + \text{Bank} + \text{Mkt Sec}}{CL}$

	2020	2019
	$\frac{4000}{830}$	$\frac{2350}{670}$
∴ ALR =	4.8	3.5



The two indicators are done and now we go to the third indicator, which is the absolute liquid ratio. In order to calculate absolute liquid ratio, you need absolute liquid assets and then divide them by the current liabilities. Absolute liquid assets include 3 items; cash, bank and marketable securities; divide these by current liabilities. Let us go to the balance sheet and calculate the amount for absolute liquid assets. Absolute liquid assets are going to include cash, marketable securities, and bank, that is it. So, there are only these two items which we need to worry about. You have 4000 here and you have 2350 here. You divide them by the same numbers which are 830 and 670, this is for 2020, this is for 2019. Again, all we have to do is to divide these numbers: 4000 divided by 830, gives you 4.8, and 2350 divided by 670 gives you 3.5. So, these are the absolute liquid ratios for the 2 years. Trend again is upwards and seems like this, the company is in a good position. Even if you do not recover any other current assets, you have cash and bank balance which is 4.8 times the current liabilities: a very good position to be in.

This is how you calculate the 3 indicators. I hope you now have a firm grasp of the three indicators used to judge the financial position of a company in the short-run.

I will see you in the next video.