

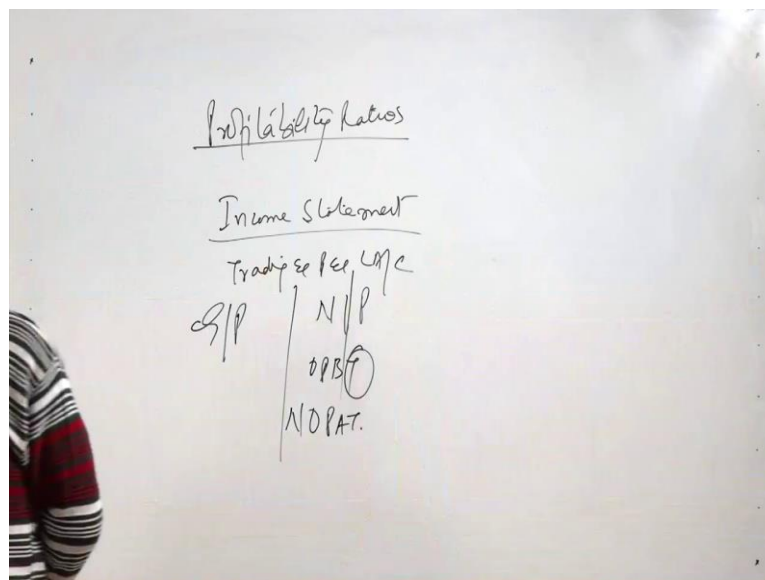
Financial Statements Analysis and Reporting
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Lecture – 45
Probability Ratios-Grasim Industries Part-I

Welcome students. So, we are in the process of ratio analysis and a trying to know about the overall financial performance of Grasim industries. So, far we have discussed 4 categories of the ratios, 4 sets of the ratios and there be trying to know the return on investment then the solvency then the; say liquidity and then the efficiency that is a turn over ratios or the resource efficiency ratios. We try to know where we try to know that with what efficiency the form is using its a resources that is the say from the liability side if we looked at that was the net worth turnover ratio and then from the asset side if you look at then it is the fix asset turn over ratios and then we try to know the turnover of the debtors and the inventory.

So, these all are the turnover ratios we are talking about and we are discussing. So, now, the next set of the ratios will be talking about is that is the profitability ratios.

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Next set of the ratios will be talking about is the profitability ratios; profitability ratios and if we talk about the profitability ratios, generally see that when you see that when you calculate the profits we use a income statement that is called as income statement

and in the income statement we have a 2 parts that is trading account and P and L account; trading account and P and L account. Trading account is giving us the gross profit trading account is giving us the gross profit and P and L account is giving us the net profit gross profit and net profit.

So, when you calculate the gross profit, this profit is having the further concerns where we add more indirect incomes into the gross profit and then we subtract some indirect expenses and finally, we arrived at the profits that is a operating profit before tax OPBT and then when you subtract the tax from this then we get the operating profit after tax or you can call it as NOPAT that is a net operating profit after tax. So, we are got all this profits here from the say profit and loss account.

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GRASIM INDUSTRIES LIMITED Profit and Loss Account for the year ended AS ON 31 st March 2007			
	Schedule	Current Year	Previous Year
INCOME			
Gross Sales		9,607.97	7,638.41
Less: Excise Duty		1,004.38	985.80
Net Sales		8,603.59	6,652.61
Interest and Dividend Income	13	113.27	67.53
Other Income	14	168.49	152.41
Increase/(Decrease) in stocks	15	(16.44)	(43.48)
		8,868.91	6,829.07
EXPENDITURE			
Raw materials consumed	16	2,219.32	1,822.69
Manufacturing Expenses	17	1,744.33	1,580.34
Purchases of Finished and Other Products		321.16	240.15
Payments to and Provisions for Employees	18	459.40	407.64
Selling, Distribution, Administration and Other Expenses	19	1,505.69	1,181.33
Interest	20	111.84	103.38
Depreciation and Amortisation		317.91	291.64
		6,679.65	5,627.17

If you look at the profit and loss account of the Grasim industries, when we were talking about the profit and loss account of this firm, we have seen the profit and loss account of this firm is here and we have calculated the gross profit first and then the net profit.

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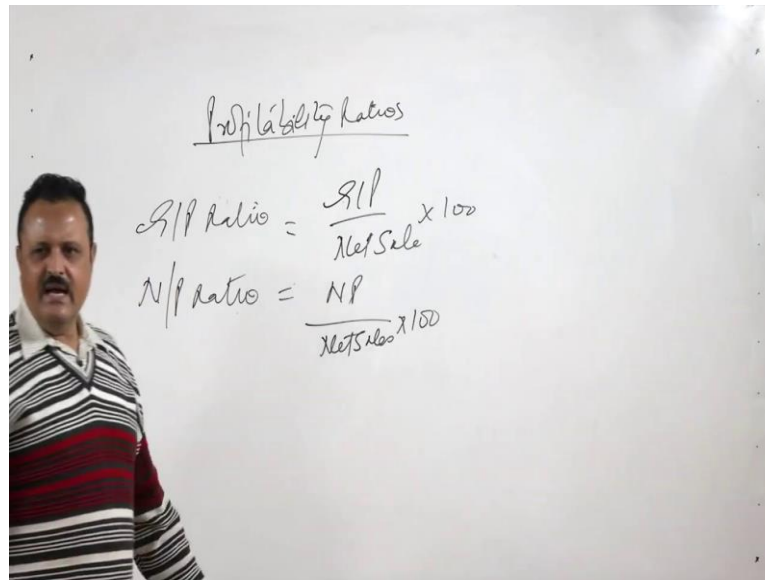
Profit before Tax & Exceptional Items		2,189.26	1,201.90
Surplus on pre-payment of sales tax loan			4.13
Write back of provision for diminution		37.10	-----
Profit before Tax		2,226.36	1,206.03
Provision for Current Tax		(692.38)	(369.82)
Deferred Tax		1.83	27.00
Profit after Tax		1,535.81	863.21
Debenture Redemption Reserve No Longer Required		38.56	8.62
Investment Allowance Reserve No Longer Required		0.05	0.25
Balance brought forward from Previous year		878.37	815.35
Profit available for Appropriation		2,452.79	1,687.43
Appropriations:			
Interim Dividend		252.10	-
Proposed Dividend			183.15
Corporate Dividend Tax		35.36	25.71
General Reserve		1,200.00	600.00
Balance carried to Balance Sheet		965.33	878.37
		2,452.79	1,687.43
Basic and diluted earnings per share (In Rs.)		167.50	94.14

So, here total profit we are talking here is that is the profit before tax a was something like we have taken here the raw material then we have taken this is a total incomes part where we have taken the gross sales than the net sales than the indirect incomes indirect incomes are like in trust and dividend income other incomes and then the decrease in the stock and then finally, we have taken all expenses which are raw material, manufacturing expenses, purchases of the finished products, payment for employees, selling a distribution administrative expenses, financial of the interest cost and then the depreciation or amortization and finally, we have calculated the profit before tax and the exceptional items. So, we have calculated here that is 2189.26 and then we have taken the exceptional items which are once in vial these incomes are once in vial they are not regular incomes. So, we do not sometimes count these for some analysis and then we have calculated the PBT that is the profit before tax that is the profit before tax is here and then we have made the provision for tax and then we have calculate NOPAT that is a profit after tax.

So, if you talk about the gross profit we did not calculate any gross profits in here in this balance sheet or in this income statement we do not have any gross profit and similarly if you talk about the net profit yes it is there, if you say that net profit is the net profit here it is that is the net profit after tech profit after tax yes its one point; 1535.81 for this year and 863.21 for the this year is the net profit.

So, if you see the old literature that is the old books on the financial management or say financial analysis you will find that profitability ratios generally include the 2 broad ratios profitability ratios.

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Generally include the 2 ratios and these 2 ratios are one is the GP ratios; gross profit ratio, this is GP ratio, gross profit ratio and then this is the NP ratio, this is the net profit ratio gross profit and the net profit ratio are the 2 ratios the profitability for the analysis of the profitability of the firm. So, because by the analysis required if you look at the profit here we are getting that the firm is got a profit of 1535.81 [FL] this year and 863 point this year these; it is a figure in isolation this is not a relative value we have to compare then what is a level of our profit as compare to the sales.

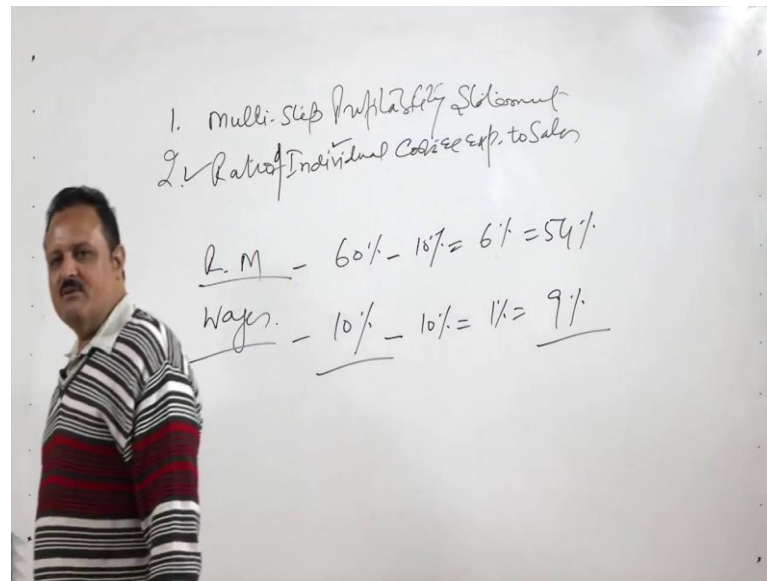
So, we have to take some common denominator and we have to compare many items say your profits, then your exceptional incomes then your cost and everything against that denominator if the denominator is common and then numerator is changing then you will be able to find it out the relative position that 1535.81 is how much as compare to the total sales. It may be possible that the sales are going up to the profit is declining, profit is declining now the profit component is go to static for the profit component is very low it means what is the purpose of selling. So, much in the market then the profitability is not there or sufficient profits are not available.

So, when you talk about the this analysis this part earlier we were talking about the GP ratio we are calculating and the NP ratio we are calculating and for calculating the GP ratio we simply calculate it as gross profit divided by net sales cross and multiplied by hundreds it comes in the percentage and here you calculate the net profit that is a profit after tax divided by net sales and then it is multiplied by 100. So, we are calculating only 2 ratios and we are saving our profitability; profitability analysis over, but just not the case this bear the profitability analysis is not done if you are go for the detailed analysis of the profitability of the firm then we have to prepare the modified income statement.

Then we have to prepare the say new income statement from this data by taking the data from your traditional income statement we have to create the new income statement and that include new income statement will be one having the analyzed income statement. So, I will prepare new income statement in front of you or for you and then on the one side we will be talking about the items on the other side will be talking the ratios and when we have the total items and ratios with us you would be able to understand the whole profitability scenario of the firm that how good or bad the firm is performing and where the improvement is expected or the improvement is required.

So, if firm has to make the efforts then these those efforts should be in those area should be identified where the effort should be put maximum efforts should be put by the firm. So, that the gain is also maximum the gain is means by putting minimum efforts, we are able to have the maximum gain or the maximum benefits. So, in that case, we will have to prepare now the modified income statement and for mod preparing the modifies income statement we will be using asset in format which is given here and you call it as modified income statement also is also called as the multi step income statement. We call it as the multi step income statement also and if you prepare the multi step income statement here.

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Then we will be talking about that this is 2 important things for the profitability analysis if we do one thing is we create the multi step profit statement, multi step profitability multi step profitability statement and then second is the ratios of the individual cost and expenses to sales ratios of individual, ratios of individual cost and expenses cost and expenses to sales. These 2 important things are required to be done as for as the profitability analysis is concerned. One thing is multi step creation of the multi step profitability statement and then it is not only looking at the profits, but is that distinct profit that one thing we are doing that and that easily can we seen here that we have the gross profit also or can calculate the gross profit for this information and then you have the net profit both the profits are available with us.

So, we can easily do it, but how the profit can be improved is there any scope we should try to find that also if there is any scope to improve the profitability then yes we should go for this and that scope is identified with the help of ratios, that is ratios of individual cost and expenses to sales. Because we get to know where is the maximum cost and individual items which are causing maximum cost for the firm because in today scenario I would like to discuss with you that in the firm has to increase the profitability, what is the way? You have 2 ways to increase the profitability of the firm one way is that you increase the selling price and second is to decrease the cost.

Now, you see if you are talking about the scenario pre liberalization when the computation was not there in market only few firms were performing and operating in the market whatever the garbage they were producing that was easily sealable in the market because India has a big market huge market. And if you do not have the alternative in that case you cannot miss afford to not to by the item you have to buy whatever is available in the market whatever the quality the firm is providing and whatever the price the firm is charging.

Now, in that situation that was a different situation if you say that by increasing the selling price if you can increase the profitability that was possible because only there is 1 or 2 suppliers and both the suppliers if you increase the cost in the market you are having no alternative you have to a pay for it, but today scenario then the supply side has improved in big way. You have multiple suppliers supplying one product, one kind of the product and if one supplier increases the price or other one seller he is the market increases the price people will shift to the other because there are one number of factors one is supply side has improved in a big way then the supply side has improved in the Indian market it means the competition has improved in the market and when the competition has improved in the market we have the multiple suppliers of the very good quality products in the market and category competitive price.

So, now for example, you talk about the electronics industry, I was talking to you in the past discussion also that if you have a buy a color TV till miss before liberalization or may be till even 98, 99, 2000, were having the companies in the market which was the Indian companies selling the 2 brand names Onida and Videocon. Onida and Videocon had a half of the market share with them half of the Indian market was with them because and you see if you look at the quality of the product and the price they were charging at that time today you get a quality before how much you get a quality been normally you get the quality we will for you should talk about the LED TVs then there are around say 25-30,000.

But even the TV is available for 10,000, also color TVs also available for the 10,000 rupees also at that time long back we talk about the 15 years back or somewhere 16-18 years back, these company were selling the products for 25-30 rupees. The product which is available for ten thousand today after 15 or 16 year inflation has gone up not gone down prices have gone up cost have gone up, but still the product is available for

the 10,000 and these company were selling the same product in the market for 25 to 30,000 rupees 16 year back.

But today there is the computation in the market we have multinational company's operating in the market. So, your Onida is also gone your Videocon also gone now we have the best payers Samsung, LG, Sony, there are the who are the best manufacture quality is in the market Panasonic they are in the market and they are selling the product. So, when they are selling the product in the market it means when the supply side is improved if the Samsung increases the price you will shift to LG, if the LG increases the price you will shift to Sony and if sonny increases the price you will shift Panasonic. So, numbers of players are there in the market and apart from that there the number of you can call it as the local products local TVs in the market.

So, when supply side as improved you cannot afford to increase the price one more important factor in this market is that Indian economy Indian market is highly prices sensitive Indian market is highly price sensitive. Here the level of the income of the people is not very high majority of the people have limited income and when prices of certain things go up your quite sensitive to the price and we do not go for the products been sold it very high price we sometime can expect the quality which is are the expectable level not very good excellent quality, but the price should be under controlled. If the price is under controlled qualities at the even expectable level we compromise with that we do not go for the very high priced product there are the people going for the say premium product, but percentage of those people or the number of those people in the total economy is not very high.

So, India being a price sensitive economy and selling the products at normal price qualities also normal we expect the product, but if you on the name of the quality if you jack up the price and take it up to the see sky level people are not going to expect it. So, remember one because of the increased computations increase supplies strengthening of the supplies side and second thing is Indian economy being highly price sensitive price as is the important factor because the people have limited income here you cannot jack up the price you see when we talk about the quality part I would like to share a story with you that is of Nirma, but in the success of the Nirma product in the market.

What is the success of the Nirma product in the market? Long back if you that product was launched in the market are 1982 and in 1982, this person Karsan Bhai who is the honor of Nirma India limited, he was a chemist in the Karnataka soaps and detergents limited, you say Karnataka government under taking its a government under taking manufacturing soaps detergent perfumes oils different kind of the products he was a chemist in that company and he knew how to manufacture the washing powder. At that time there was only means largely the market was controlled by the say Hindustan labor limited at that times Hindustan lever limited; HLL which is now Hindustan Unilever today and there washing power was available under the 2 brand names; one brand name was surf which is even today available which is a premium product everybody does not buy surf and second was for the say people who cannot afford surf for them there was the second product that is sunlight 2 products are there in the market.

So, but was the sunlight though they called it as it is or the masses low level income people middle and lower income level people, but the price of the sunlight was also so high that most of the people could not afford that. So, some people could afford surf some people could afford sunlight, but majority of the people even could not afford the sunlight. So, we were our mothers and our grandmothers were using the caustic soda for washing, the cloths caustic soda which is not at all processed and that was effecting the quality of miss life of the cloth also and then the hands were also getting affected or it have lot of side effect when you are using the caustic soda.

So, now at that time Karsan Bhai, 1980-82 he realized that it is not very difficult to manufacture a good quality washing power and because he was a chemists. So, he try to manufacture this product at his place at his house and he was successful. He came out of the product he used at his own place it gave very good results then he distributed to his neighbors in the his say place when he was staying, he distributed free of cost is neighbor and neighbor say it is a very good product, its wonderful results very good then he say expanded horizon he gave to his relatives friends and in some other areas some other localities some other places and the result was also (Refer Time: 18:25) very good very say interesting.

Then he was encouraged then why should tries start the commercial production of this product and he started producing the product at the commercial level at the lower level initially and he gave the brand name Nirma and then product was accepted by the people

in this country in a big way, it was a huge success for Nirma and it was a best product means it was means best kind of a product considered by the majority of the people who had the very low income level and finally, today you know that where the Nirma is and after that Nirma we have huge number of means large number of the washing powders in the market which are called as the say normal quality and the normal price washing powders they are not Surf, they are not RIN, they are not any premium quality products, but those products which can be used for masses.

So, the purpose of my whole story was that what was the secret of success of Nirma secret of success when Nirma was that Karsan Bhai when he constructed manufactured the product he used those inputs into that which help him to keep the cost of the product very very low cost of the product very very low, at that time in 1982 surf was selling somewhere for 40-45 rupees per kg sunlight was selling for 20-25 rupees per kg and he sold 1 kg of Nirma at 10 rupees per kg, 1 kg of Nirma at 10 rupees per kg. So, it means you see huge difference as capable to the sunlight even which actual said that it is for masses low quality and the low price product even against that when the Nirma came to the market and the cost per kg was 10 rupees people expected it and there was a say huge success for the product.

So, means the whole story the moral of the story is that in today scenario because of these factors supply side computation and then your price sensitivity of the Indian economy Indian people here if you have to increase the profitability of your product you cannot increase you cannot afford to increase the selling price you will have to reduce the cost. And when you have to reduce the cost we should we should be guided along with the distinct profitability that is what is our gross profit, what is our net profit along with the adjusting extent of the profitability we should be guided that what is the say cost composition of our product.

What is the cost of raw material, what is the cost of labor, what are the other expenses, what are the indirect cost components like your salaries of employees selling and distribution expenses, administrative expenses, all these expenses if we are coming to know then it is going to serve to an purpose. One is this guiding this analysis is guiding us what is the profitability level of the other firm or any firm in which we are interested in may be as a shareholder potential shareholder lender buyer supplier anything we would come to know that what is the cost composition. And second thing is we will be

guided by means first thing we will be knowing that what is the profitability position and second thing the firm will be guided management of the firm will be guided that we have to increase the profitability we cannot afford to increase the selling price normally we have to reduce the cost and you can reduce the cost only at those components where the cost is high.

So, we have to identify those elements also which are giving us causing of the high cost of production and this statement helps you to analyze the cost part also. Profit as well as the cost analysis and then this is the 2 things we are preparing the multi step profitability statement and then we are second task we are doing with the help of this statement is the ratio of the individual cost and expenses to the sales. You have now raw material this is the individual cost then we have the say workers. So, wages and salaries is the other component now you see and then you call it as the other expenses administrative expenses than selling and distribution expenses advertising expenses.

Now, for example, if the material cost is sixty percent and the labor cost is ten percent now if you want to reduce the cost we will have to make the affords and we would like to make the affords at that particular component where the affords we put in are going to give us the best results we will like to put the affords there. So, if you put your affords in reducing the cost of material and even if you are able if you are succeeding to lose the cost of material by 10 percent then your cost of material will be reduced by 6 percent and this will be 54 percent cost come will come down to 54 percent.

But in this case if you lose make the same level of affords and the cost is reduced by 1 percent it means the cost will come down by 1 percent and labor cost will come down to 9 percent. So, where we would like to make the efforts; we would like to make efforts at that place or that particular component of the cost which is going to give us the best results. So, this statement is guiding us similarly you can get to know the other components of the cost also and when you know the total cost components you are going to get to know that what is the total cost, what are the different factors which are constituting the cost and I should prioritize my efforts, I will put my efforts at that particular item where with the same level of the efforts I am going to get the maximum biggest or the highest successes.

So, in these 2 components we talk about if you put your efforts by identifying the new sources of raw material or by arranging or having entering in to new arrangements of buying of the raw material at the say different prices or something like that you can easily make out that yes, raw material cost can be reduced and if you reduce the costs even by 10 percent our cost will come down to 54 percent. Straight way, you can keep the same selling price and your profit will be increased by 6 percent. So, this statement is guiding us in cost reduction also and this statement is helping us to know the profitability at the different levels and then we are trying to make out that what is the level of the profitability and how the profitability can be increased.

So, we will be learning how to prepare the multi step profits statement and say identifying the different costs components and their respective percentages, ratios to the selling price of the sales and that with the help of that we will be knowing what is the adjusting level of profit how the profit can be increased and the cost can be reduced and that we will do by preparing the multi step profitability statement in my next class.

Thank you very much.