

Working Capital Management
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Lecture-38
Credit Policy Changes-I

Welcome students so in the previous class we discussed something about the credit policy changes and in today's class we will learn about the credit policy changes by the firms and the impact of these changes on the overall accounts receivable and their management and then say how to manage the funds blocked in the accounts receivables because of the credit policy changes. Because credit policy which was once decided by the firm which is fixed by the firm that remains fixed for some period of time.

And looking at the changes in the market looking at the developments in the market we will have to change the or review the market policy for say credit policy over a period of time so that sales amount either can be kept safe sustained kept intact or can be increased. So, credit policy is a very important document. And we have discussed in the previous classes that as I told you and emphasized up on that this should be no flexibility upon the marketing force or up on the sales force to say I play with the credit policy.

So, the outcome other solution for that is that it should be returned credit policy and for every borrow or the buyer on credit we should work out the score so that if somebody is attaining that score of maybe crossing the score then its fine otherwise we should not extend the credit. Because it is not the question of selling on credit rather say the question of collection of the credit sales also. So, our credit sales also so sales maximization is objective of the firm but at the same time collection of the receivables is also important part.

So, we have to make sure that if receivables are safe and their collectible at the time as and when they become due then its fine otherwise there is no point selling on credit blocking the funds and losing the sales as well as the profit so that is not to be done that will requirement extra efforts of the collection department and extra expenses on the part of collection department. If their efforts are required to collect the receivables if we have sold the receivables to those people who are not say wroth of getting the credit.

Now when you are going to talk about the credit policy changes we will discuss and learn it in two parts first one is the short-term changes and second one is the long-term changes. Sometime what happens firms face is that short term problems they do not change the policy as such for the long term. But for the short term they have to make some changes which otherwise the policy remains the same cannot go to make any changes affect any changes but to deal with some short term problem some momentary problems.

We will have to change the credit policy and the problems could be like same the firm is this is facing the problem of increasing inventory, mounting inventory is not because of sales it is not a regular feature but just because of that and changes in the market or sometime when the firm passes through the cyclical trends so they may be the reason that the sales get affected and they will get corrected in the long-term but in the short-term sales have negative believe in it and we are not able to sell more in the market on the given credit period and the credit terms maybe as well as on the cash.

So, we will have to relax it for some period of time some short term changes and then we will have to see that whether it is possible to pass on the inventory on the credit sales because if you keep the inventory with you, you will have to increase the cost. So, sometime we review it and we see that will be relax the credit policy for some period of time is it worthwhile to pass on or convert that inventory into the credit seeds are we going to collect those credit sales which additional we are going to make because of relaxation of the policy.

So, if it is possible then we can relax it for the time being and then we can say pass on or convert that inventory into the credit sales. Sometime firm want to enter into new market. So, when we have to enter into a new market you have to not to sell the product on the same terms as we are selling it in the say market where we are a stabilised player. So, the new market we will have to give some relaxation to the new buyers or just to induce the people that yes they should come forward and they should buy the product of the firm the alternative which is provided by the firm.

So, we do not follow the same credit policy which we are following in the stable market and that is without affecting the interest of the existing buyer and we when we move into the new market existing buyer also understand that yes firm has to introduce some policy changes and there is no harm in that and as a new buyers to induce the new buyers to attract the new buyer some

additional credit period for some say liberty in terms of the sometime cash discount or sometime if they want to buy on the credit and they cannot buy and sustain the product and the sales for the same given level of the credit which forgiving in the stable market.

So, we will have to give the extended credit period that okay you keep the product and you try to sell it in the market try to say familiarise the people with the product and when you are able to pass on the product to the consumers and collect the price for that you pass on our part to us. Sometime these are the changes so to deal with the cyclical trends to convert the inventory mounting inventory because of the cyclical friends into the accounts receivables.

And some time to enter into the new market we will have to relax the credit policies and we have to affect the changes in the credit policies. But these are not permanent they are not long term, first we are talking about the short-term part they are not long term there only some you can see situational changes and we are falling the normal trend. So, our old customers to new buyer existing buyer or to say permanent customer they are selling it on the standard credit period and at the same discount and the same other terms and conditions.

But sometimes even to the existing buyer then be relax it we communicated to them very clearly that this is as a special case we are giving the extended credit for say 60 days to 75 or 90 days. But do not take it as a regular feature and we would normally for the next consignment you ask your order for you will have to have the same terms and conditions. So, short term changes are there and we can say take the help of these changes and we can pass on that inventory to the market or to the channels of distribution or to the customers on their relaxed terms but on a temporary basis and its communicated to the buyers also to the standard customers also that this change is a short time change not a permanent change.

So, you have to be very careful about that and next time we will not be giving you the same credit terms. So, we have to resort to the old credit terms so if there is a short term policy change then how the firm has to evaluated it. See when we are going to relax the policy it means objective in the mind is that we are going to increase the sales. So, we have to again take the help of the incremental analysis.

There is how much additional investment we are going to make in the accounts receivables or when we are going to change relax the credit policy how much additional investment we are

going to make here and how much additional profit will be available. And if there is additional profit then you must be clear that there is additional cost also. So, we have to make an incremental analysis that how much incremental profit we are going to have how much incremental cost we are going to have because of the increase the sales.

And whether the profit is acceptable or not acceptable or says we are going to end up the situation where the profit is certainly going to be there and even part of the profit is converted into the bad debts also or part of the sales is not recoverable and part of the profit because profit is a credit profit is not a cash profit for part of the profitable is not recoverable still not have the profit be earning on the incremental sales because of relaxing the credit policy then that profit is acceptable to us.

So, incremental change will have to incur incremental profit analysis we have incremental sales we have to find out in incremental profit we have to find out and incremental cost we have to find out then we have to make the analysis whether it is worthwhile effecting these short term changes or we should continue with the existing policy. So, let us make a analysis and try to learn that how to evaluate the short-term changes and how to take a decision that if some short and changes are required to be done by the firm.

Then how to go about it so is there any model available is there any method available is there any say formula available to find out that how to evaluate those incremental sales because of relax policy and how much is going to incremental cost and profit. Yes there is a model there is a formula we can use that model and we can try to evaluate whether we are going to end up at a profitable state by relaxing the credit policy and selling phone in the market or we are going to have same profit or sometime the loss.

So, if you are going to have very negligible profit even then and if you are going to have lost even then we are not going to relax the policy what is the profit is expected to be there after all these calculations then yes we have to think about it seriously because otherwise also keeping the inventory as inventory will create the problems right. So, we can think about that profit should be there and profit should be substantial.

Is not a nominal profit when is not in a good qualities minimum profit this should be profit figure should be the profit and there should be the substantial profit then only we are going to take the

decision in favour of the in favour of the short-term credit policy changes. So, let us learn that how to evaluate the short-term changes in the credit policy.

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Credit Policy Changes – Short-term

Beta Ltd. which is facing problem of slow moving inventories gathers information from its market intelligence that it can make additional sales of Rs 375 crore if it relaxes the credit period upto 90 days from the present no credit sales level. Fraction of new sales expected to be bad-debt is 2 per cent. Cost of goods sold (variable including collection expenses) is 80 per cent of selling price. Opportunity cost of capital is 20 per cent. Advise the company whether it should relax its credit policy or not?

We have a small problem here we have worked out here and we will try to find it out that how to find the solution about it. Say for example we have a problem here that Beta Limited is facing problem of the slow moving inventory gathers information's from its market intelligence that it can make additional sales of rupees 375 crores if it relaxes the credit policy up to 90 days from the present no credit sales level.

This is peculiar case company is presently selling on cash entirely on cash but they sales are lesser and here they are facing the problem of slow moving inventory when the inventory is moving at a slower pace in the market they have conducted a survey and they found out as a report outcome of the report is that they sell further in the market for 375 crores if they relax the policy or maybe they start selling on the credit relaxing here means that 0 credit to some credit.

So, their policy is not at all no credit they are selling for the no credit sales level to some level. So, fraction of new sales entry to be bad debt is 2% out all this 375 crores 2% will be better that is known to us that is also as per the say calculations of the survey we have done. Cost of goods sold only variable cost because here we talk about cost of goods sold variable including collection expenses is 80% of selling price. In this kind of situation only be considered the variable cost changes are only very short term.

In the short term fixed cost do not change only variable cost changes so we will have to consider that cost and opportunity cost of the capital is 20%. So, whether you invest in the accounts receivables or you invest anywhere else the opportunity cost is 20%. So, if you have surplus funds it is increased to 375 if you invest in account receivables then what is the return available and invest these funds elsewhere then 20% funds is available.

Here also a minimum 20% fund is available so that opportunity cost becomes 0. Otherwise the companies relax its credit policy or not. Now you see if you are very peculiar case that from 0 credit to means it is clearly did not here that from if company relaxes the credit policy up to 90 days from the present credit sales level. It is a peculiar case companies selling not at all on credit entire sales are on the cash and now they are thinking of that every inventory are not moving to the market quickly so we will have to think of no selling it on credit right.

Now let us evaluate this situation and try to find out that how we can evaluate the situation is any model available for that yes there is a model available for evaluating the short term credit policy changes and that model is very simple because he is taking into account only the factorial part what are the important factors involved important factors are say how much incremental profit we are going to have and we are relaxing the credit policy and selling more for 375 crores.

How much additional sales we are going to make how much additional cost we are going to have how much additional bad debts we are going to have and had how much additional collection cause we are going to have all these factors have to be taken into account factored into a model and finally we will have to find out that What is the value of additional or incremental profits that is the important consideration here.

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Credit Policy Changes. (S.T.)

$$p = s(1-v) - \left[\frac{sv + ivc}{365} s \right]$$

p = incremental profit
 s = additional sales exp. due C.P. change
 v = variable cost of sales in % terms
 b = exp. bad losses as % of additional sales
 i = opportunity cost of capital
 c = Credit period.

So, we will see here that how to deal with this kind of situation, so in the credit policy changes so credit policy changes this is I am calling it a short term right, not the long time changes so how to evaluate that. For evaluating the credit policy changes in the short time changes in the credit policy these are the credit policy changes short term we very have a clear cut model available with us is small $p = s$ into $1 - v - \left[\frac{sv + ivc}{365} s \right]$ we are taking the number of days in year 365 we can some time take 360 also.

So, this is a model available here that is $p = s$ into $1 - v - \left[\frac{sv + ivc}{365} s \right]$ this is the s is this is a smallest s not the capital S and we can take it as like that the smallest s this is smallest. So, this is a model with the help of this model we can evaluate the credit policy changes and the incremental sales they are going to have because of relaxing the credit policy. Here if you talk about this p is the incremental profit because of the relaxing the credit policy.

In our problem which we are seen here is we are going to have incremental profit if we selling more for 375 crore this is p is the incremental profit small s is what, small s is the additional sales expected due to credit policy changes due do credit policy changes this is small s what is v this is the variable cost this is the variable cost of sales variable cost of sales in percentage terms not absolute only percentage terms this v then what is b , b for Bombay b is expected bad debt losses.

Expected by that losses as expected by the process as % of as % of additional sales right it is b for Bombay and what is i now here we have i is the opportunity cost of capital opportunity cost opportunity cost of capital opportunity cost of capital in percentage terms in percentage terms

this i and what is c and here we have some term called small c it is the credit period this is the credit period right. So, these are the terms so, this is a model means I think we have factored everything in the model which is going to be as a consequence of the increase the sales.

So, we factored everything here you can say that we have the how much incremental profit we are going to have this is p . So, because this the major concern here that if you have the incremental profit. Then we go for the additional sales a relaxing the credit policy if there is no incremental profit then we will not relax the sales or we may not possible relax policy and why should we go for the additional sales.

Yes if there is any incremental profit fine so how to evaluate that that take it as s into $1 - v$, s is he additional sales expected you to credit policy changes, v is the variable cost of sales in percentage terms as I told you earlier that we consider only the variable cost because changes are only short term not long terms. So, if the long-term changes there I think we may consider the fixed cost also but if the short-term changes we are going to make then only the variable cost has to be considered A and B is the expected bad debt losses.

Because when we are going to sell on credit certainly the bad debt are bound to be there even sometime what happens when you relax the credit policy even the existing buyers who are buying say for example in this case if we are selling 100% on cash it means if the product is like that then the buyers of the channel distribution channels of distribution are ready to buy from them on cash and sell it in the market.

But if the company relax is a credit policy and apart from the cash sales if company start selling on the credit also that even those customers who were buying on cash and who are very, very disciplined and careful while dealing with the company they will also become relaxed because now the company's policy is there company has started giving the credit. So, we will also become little relaxed and as a result of that relaxation both the sides one side will be gaining another side will be paying the price company will be paying the price.

And the customer will be gaining so as a result of that situation you will have the bad debts also. And everywhere we have found it in the business history that when you sell on the credit all the sales are not collected that part of the sales are remain uncollectible. In case of the banks also we

see that when the loans are given 100% to the loans are not recovered back part of the loan become the bad and bank said to be at the burnt to bear the losses.

So, here we are going to have the additional expected bad debt losses as percent of the additional sales then i is the opportunity cost whether to invest the funds in the accounts receivables or to invest the forces elsewhere that is our choice. and opportunity cost is 20% investing in the account receivables opportunity cost is 20% we have to recover that cost also means minimum return available should be 20% or more because otherwise that returns is also available elsewhere.

So, I to make investment here and take the additional risk and c is excited period how much credit period now we are going to give. If you are already selling on the credit maybe for 60 days and now we have to make that credit period 90 days then also we will have to take that take that as additional credit period. As a result of relaxation and in this case the problem we saw that it is from 0 credits to now we have to start giving the credit.

So, how many credit days or the credit period how many days of the credit we are going to give you will have to factor that also. So, we have factor profit also sales also cost also bad debt also opportunity cost also and the credit period also. So, in our situation let us see that how this model works out and how the situation works out for us and what is the case. So, we are studying here that how many sales 350 crores it relaxes a credit policy then the credit period is up to 90 days.

So, we have to take the 90 days and bad debt news new say this but that is 2% and cost of goods sold variable cost is just 80% of the selling price and opportunity cost 20% all the I think information is available with us. So, we can easily evaluate this situation with the help of a model and here we have to see.

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$$\begin{aligned}
 f &= 375(1 - 0.80) - \left[375 \times 0.02 + 0.02 \times 0.80 \times 90 \frac{375}{365} \right] \\
 f &= 75 - (7.5 + 14.80) \\
 p &= \text{Rs. } 52.70 \text{ crore.} \quad \checkmark \\
 & \quad \sigma = 0.5\% \\
 &= \text{Rs. } 52.70 + 0.005 \times 375 \times 0.80 \\
 P &= \underline{\underline{\text{Rs. } 54.20 \text{ Crore.}}}
 \end{aligned}$$

So, we will have to find out the p right small p of for calculating that how much is the first thing was s is 375 is the additional sales, we are going to make into 1-v, v is the variable cost and that is how much 80% this cost is 80% so this is v and then minus here we have next item s again 375 and what is a b, b is the bad debt loss. So, bad that lost his here we are expecting is 2% plus additional items what that is opportunity cost and the variable cost.

So, what is opportunity cost? Opportunity cost is 20.20 into the variable cost is how much 80% into then is the credit c is a credit period is going to be 90 days and again to be multiplied by 375 and divided by 365 right. We have put all the values in this model, so if you solve this situation is this model that is again let us check it again no item should be left 375 into 1 - 0.80 that is a variable cost minus we getting everything from the 375 sales so and then that is 375 into 0.02 that is a bad debt loss + 20 % is the opportunity cost of 80 % and then because investment is only 80 % not 100%.

And then is the 90 is the credit period we are taking here the 90 is a credit period divided by 375 and 90 is a credit period multiplied by 375 / 365. If you solve this so what will happen here your p will be equal to 75 minus if you solve this it will work out a 75 into say 75 - 7.5 + 14.80 if you solve this I am going to the next step directly so this is p = 75 - 7.5 + 14.80 and that will be something like rupees final if you calculate This will work out as 52.70 crore this is the p that is the incremental profit this is the incremental profit this is p incremental profit.

So, we are going to have the incremental profit of 52.70 crores if we relax the credit policy by 90 days from 0 and making the additional sales of 375 crores. Now here one factor have forgotten to

factorise just see when we are converting the inventory into the credit sales why we have taken this decision of short term policy change because the company was following the for facing the problem of the slow moving inventory.

So, they thought of has that rather than keeping the inventory with us and bearing the cost of all kind of cost that is a investment cost carrying cost handling cost of obsolesce cost all kind of the cost is better to convert that inventory into the credit sales. So, here when they are converting that inventory into the credit sales so one important factor is that their inventory carrying cost will be saved their carrying cost will be saved investment cost will be there because that amount invested in the inventory is not invested in the accounts receivable.

So, that investment cost is same but the carrying cost will be saved because their warehouse will be vacated so they are not required the warehouse space did not record the people to take care of that they are going to save the obsolesce cost anything which is related to the handling cost for carrying cost that will be saved. And if that cost is considered here then that cost will be now you can say that will for the increase the profit.

I would say not decrease the profit is good for the increase the profit. So, how you have to factors that cost there you have to factor that cost here that is we have the model actually he $p = s$ into $1 - v$ into $sv + ivc + 365 +$ this is the savings into the carrying cost and g away adding up that on the right side gsv g is the physical carrying cost this g is the physical carrying cost of inventory.

So as a proportion of the variable cost you will have to take it as that is a percentage of the cost of goods sold. So, it means g will be saved and that g will be further added into the profit here so because we have calculated the profit here so that is 52.70 crores let us assume now that in this $g =$ say 0.5% right this is g this is 0.5% we have assumed g so what will happen now g we will become that is rupees 52.70 crores $+ 0.005$ this has to be into 375 because it is gsb 375 into 0.80.

If you solve this, this profit will become something like rupees 54.20 crore this profit is rupees 54.20 crores this is not the 52.70 crore this will become 54.20 crores so p will be 54 small p will be 54.20 crores. So, this is the actual effect of this is the actual effect of changes in the credit policy and that to the short time changes. So, we have seen here that additional profit by selling it in the market for 375 crores additional profit we are going to have here is that is 54.20 crores

which is a substantial amount and we can see here that if you calculate because when we are talking about 375, 375 is not the say investment part.

Investment we are making his 80% because variable cost is going to increase so we have to take the 80% of the 375 and not say entire amount of 375 so we are investing 80% of 375 and we are getting has a return 54.20 % I guess this is a very good return and we should seriously think of the company should seriously think of relaxing the credit policy and extending the credit in the market because here we can assume that even the part of the sales although factored up to two 2% as a bad debt.

But if more than that is also bad debts they are going to have for example it is not 2% it is 3% even then I think this profit will be able to sustain those losses and finally we are going to end up a situation where buy relaxing the credit policy for the short term we can increase the profit substantially and the opportunity cost of 20% can be easily earned here. So, it is better to go for relaxing the credit policy because multifarious effects will give it to us.

The aftermath effects our many because when you are moving to the market and selling on the credit is it say helping us to expand the market right it is helping us to expand the market that is one important consideration when you are expanding the market and many side effects or you can say the by products of the additional sales is also there your market presence increases and is your market performance increases market share increases. Initially we are affecting the short term policy changes we are increasing the sales by 375 crore.

If I think of spending it on the long-term relaxing the long term basis may be it may convey message in the market that this company is ready to sell on the credit and people who wish to do the business with the company but could not do the business because the company never gives a credit or they give the credit period of the say lesser amount of time. If they are not ready to give the credit and they are giving the credit as per the customer's requirements.

So, I think in that case is going to be very useful proposition and many people may join hands with the company and they can permanently expand the market they can permanently increase their presence in the market and overall increase market share will give them the money say you can call it as by products and increase overall performance of the company in the market will increase.

By evaluating the situation and by taking the help of this model we have tried to learn that if short time changes are to be done by the company in the credit policy whether they can be done or not and if they are done then how much incremental profit is there and whether that profit is acceptable or not. Here when I talking about is the profit as I told you that this figured should be the positive means profit.

And the profit should be sufficient of substantial so we have seen in this in this case it is a substantial profit sufficient profit is there but if there is a little less amount also profit is there except that after evaluating the short term policy we will have to go for the long term policy changes and when you talk the long term policy changes some more factor have to be taken into account.

Because in the long term policy changes manufacturers there change number one is the changes in the accounts receivables so that level will also increase a investment in the accounts receivables will increase and as a result of increased credit sales and accounts receivables your other current assets will also increase, so, how to evaluate the long-term changes in the credit policy of the firm that I will discuss with you in the next class thank you very much.