## Capital budgeting

Finance

## ASSIGN B <br> USTER

Module 05 - Case Assignment The management at William's Pharmaceutical is considering new computers and equipment to manage inventory and to expedite online orders and product shipment. The investment will be \$100 thousand and the cost of capital is $15 \%$. The company earned $\$ 500$ thousand in sales last year and anticipates the new equipment could increase sales by 10\% annually. Based on what you have learned about capital budgeting, would this be a profitable investment over the next five years?

Years
Total Sales

Cash Flows
Disc. Fact. (15\%)
Disc. CFs
Cum. CFs

0
500, 000
$(100,000)$

1
$(100,000)$
(100, 000)

1

550, 000
50, 000
0. 869565217

43, 478
$(56,522)$

2

605, 000
55, 000
0. 756143667

41, 588
$(14,934)$
3
665,500
60,500
0. 657516232

39, 780
24, 846

4

732, 050
66,550
0. 571753246

38, 050
62, 896
5
805, 255
73, 205
0. 497176735

36, 396
99, 292

NPV
\$ 86, 340. 78

Cost of Capital
15\%

IRR
49\%

MIRR (Reinvestment Rate 20\%)
34\%

Discounted Payback Period
2. 38
years
Profitability Index

1. 99

Write a recommendation based on your understanding of capital budgeting. Include an interpretation of the following?

Since all the techniques relevant to capital budgeting are indicative of https://assignbuster.com/capital-budgeting-essay-samples/
viability of this project. It is recommended to the company that this project should be accepted along with the consideration of other qualitative factors which may arise during the life of the project. So the company should estimate the quantitative as well as the qualitative factors relevant to this particular project. However, on financial grounds, the project is advised to be opted.

What is the discounted payback period?
The discounted pay back of this project is computed as 2.38 years.
Would the investment produce a profit in five years?
Yes, definitely the project would start earning profits in the year 3 of the project's life as all the investment expenditure of the company will be recouped in year 3.

What Modified Internal Rate of Return (IRR) and Internal Rate of Return (IRR) should the company expect over the next five years?

Assuming the reinvestment rate of the project is $20 \%$, the company may earn around $34 \%$ in respect of Modified Internal Rate of Return. However, the figure for IRR is computed to around $49 \%$ which is very attractive for the company.

Is the NPV of the project worth the investment?
The NPV of the project is computed as positive $\$ 86,340$ which is very encouraging and suggests that project is absolutely worthwhile for the company in future years.

What is the profitability index of this project?
The profitability index of the project is around 1.99 which is very close to 2 , therefore, the company should not be hesitated in opting this project.

## References

Capital Budgeting. (n. d.). Web. 12 January 2012. Individual Rate of Return. (n. d.). Web. 12 January 2012. Profitability Index. (n. d.). Web. 12 January 2012.

