

Week 7 - Financial Plan and Budget

High Risk High Return?

Risk refers to the set of unique consequences for a given decision. In finance world, risk refers to the financial instruments fluctuation in money and capital market.

Share prices fluctuate because investors are uncertain about the future, especially about future earnings. So, if you see a company whose share price fluctuates widely, you can bet that its future earnings are relatively unpredictable.

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Each instrument poses its own distinctive risk. An asset's risk consists of:

1] Unsystematic (Diversifiable) risk

The risk is only unique to a particular company which is caused by such events as lawsuit, strikes, successful and unsuccessful marketing programs, and winning or losing a major contract.

Because these events are random, one portfolio containing 40 or more shares in a number of different industries or countries is

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able to eliminate this risk - bad events in one company or industry will be offset by good events in another.

A “degree of leverage” concept is introduced to show how operational leverage (gearing) and financial leverage (gearing) interact with each other. The relationship between these two concepts of leverage is depicted below.

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➤ Degree of operating leverage (**DOL**)

The degree of operating leverage (**DOL**) is to measure business risk associated with the ability of sales generation of the company to cover fixed costs.

If no fixed costs were used, the DOL would be 1, so a 100% increase in sales would produce exactly a 100% increase in EBIT.

It concludes that the greater the DOL (or fixed costs), the more sensitive EBIT will be to changes in sales.

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➤ Degree of financial leverage (**DFL**)

The degree of financial leverage (**DFL**) is to measure financial risk associated with the ability of EBIT to cover fixed interest expenses.



If no debts were used, the DFL would be 1, so a 100% increase in EBIT would produce exactly a 100% increase in EPS.

The greater the DFL, the more sensitive EPS will be to changes in EBIT.

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- Operating leverage affects EBIT and is a first-stage leverage, while financial leverage affects EAIT and is the second-stage leverage. Financial leverage takes over where operating leverage leaves off, further magnifying the effects on EPS changes in the level of sales.

When *operating leverage* decreases, *financial leverage* increases.

When *operating leverage* increases, *financial leverage* decreases.

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Implication

In order to ensure long term survival and monitoring risk of a business, a company needs to ensure the control of fixed cost perhaps by replacing the expenditure by variable costs, while at the same time, also ensuring the company's gearing is at acceptable level.

$$\text{DTL (Degree of total leverage)} = \text{DOL} \times \text{DFL}$$

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2] Systematic (Market) risk

The risk systematically affects most companies' operation such as war, inflation, recessions, and high interest rate. Diversification here would not help. You can see share prices in most of the countries plummeted overnight after 911 in US.

There is a strong link between risk and return: higher the level of risk taken, the greater the return on the financial instruments.