University of Mumbai

Program: **ALL_Institute Level Optional Course 2**

Question Bank

Curriculum Scheme: Rev2016

Examination: BE Semester VIII

Course Code: ILO 8022 and Course Name: Finance Management

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Objective Questions

1.	MM Theory in perfect market suggests that dividend payment
Option A:	Has a positive impact on the value of a firm
Option B:	Has no impact on the value of a firm
Option C:	Has negative impact on the value of a firm
Option D:	Has negligible impact on the value of a firm
2.	A low risk-taking individual will most probably invest in which of these instruments:
Option A:	Equity
Option B:	Debt
Option C:	Fixed Deposits
Option D:	Mutual Funds
3.	Purchasing equipment plus investing in modern technology indicates:
Option A:	Increased profit
Option B:	Growth & Diversification
Option C:	Happy Shareholders
Option D:	Capital financing
4.	Mukesh has two options to choose: 1. investment which would give him a returns of 15% with 15% standard deviation. 2. investment which would give him a returns of 13% with 25% standard deviation. He has chosen the second option. What type of risk profile does he represent?
Option A:	Risk - Averse
Option B:	Risk - Premium
Option C:	Risk - Neutral
Option D:	Risk - Seeking
5.	The amount spent for capital expenditures will be reported in which section of the statement of cash flows?
Option A:	Cash Provided/used In Financing Activities
Option B:	Cash Provided/used In Investing Activities
Option C:	Cash Provided/used In Operating Activities
Option D:	Supplemental Information
6.	Project finance is
Option A:	Balance Sheet financing
Option B:	Difficult financing
Option C:	Off-Balance Sheet financing
Option D:	Mezzanine financing

7.	To estimate the optimal level of current assets comprises a tradeoff w.r.t costs that that fall with current assets and costs that rise with current assets. The former are referred to as _____ and the latter as _____ respectively. Justify.
Option A:	Shortage Costs and Ordering Costs
Option B:	Carrying Costs and Shortage Costs
Option C:	Ordering Costs and Shortage Costs
Option D:	Shortage Costs and Carrying Costs
8.	Which of these is an example of internal source of finance:
Option A:	Sale of surplus assets
Option B:	Government Grants
Option C:	Leasing
Option D:	Mortgage
9.	Axis Bank, PNB, SBI, ICICI are:
Option A:	Foreign Banks
Option B:	Public Sector Banks
Option C:	Commercial Banks
Option D:	Private Sector Banks
10.	The preparation of pricing, budgeting, goal setting, distribution channel and other objectives can be worked upon majorly with the help of:
Option A:	Sales and Promotion
Option B:	Financial Reporting System
Option C:	Investment Decisions
Option D:	Profit Margin
11.	Which of the following are NOT functions of a financial system?
Option A:	The operation of a payments system.
Option B:	Providing the means of portfolio adjustment.
Option C:	Helping to reduce unemployment.
Option D:	Channelling funds between lenders and borrowers.
12.	Financial intermediation is the process that the financial intermediaries connect _____ and _____ by transferring funds from one side to another.
Option A:	Banks and account holders
Option B:	Borrowers and lenders
Option C:	Borrowers and securities firms
Option D:	Investors and lenders
13.	_____is the chance that governing bodies will make unfavorable changes in tax laws, driving down the after-tax returns and market values of certain investments.
Option A:	Tax Risk
Option B:	liquidity risk
Option C:	event risk
Option D:	business risk
14.	The current value of future cash flows discounted at the appropriate discount rate over some length of time period is called ____

Option A:	future value
Option B:	present value
Option C:	discount value
Option D:	Tax value
15.	Corporate finance is the division of____ that deals with financing, capital structuring, and investment decisions.
Option A:	a) finance
Option B:	b) corporate
Option C:	c) Accounts
Option D:	d) outsourcing
16.	____is the ratio between Quick Current Assets and Current Liabilities. They should be at least equal to 1
Option A:	current ratio
Option B:	profit ratio
Option C:	quick ratio
Option D:	immediate ratio
17.	Three Major Decisions in Corporate Finance does not include following,
Option A:	Investment decision
Option B:	Financing decision
Option C:	Strategy Decision
Option D:	Dividend decision
18.	The internal Rate of Return (IRR) criterion for project acceptance, under theoretically infinite funds is: accept all projects which have
Option A:	a) IRR equal to the cost of capital
Option B:	b) IRR greater than the cost of capital
Option C:	c) IRR less than the cost of capital
Option D:	d) IRR equal to the Net profit
19.	. _____ of a company refers to the composition or make-up of its capitalisation and it includes all long-term capital resources viz : loans, reserves, shares and books
Option A:	Capital structure
Option B:	capital budgeting
Option C:	Working capital
Option D:	Profitability
20.	Modigliani and Miller argue that the dividend decision _____.
Option A:	is irrelevant as the value of the firm is based on the earning power of its assets
Option B:	is relevant as the value of the firm is not based just on the earning power of its assets
Option C:	is irrelevant as dividends represent cash leaving the firm to shareholders, who own the firm anyway
Option D:	is relevant as cash outflow always influences other firm decisions

Subjective Questions

1	PNG's current assets and current liabilities are ₹2,00,00,000 and ₹1,40,00,000 respectively. How much additional funds can it borrow from banks for short term, without reducing the current ratio below 1.33?
2	Distinguish between equity & debt instruments.
3	What are leverage ratios? Explain any two types of the same.
4	How and why are risk and return considered significant factors in finance management?
5	What is mezzanine financing? Explain with an example.
6	Describe in brief the Net income Approach as a Capital Structure theory.
7	Explain various Financial Instruments in detail
8	Suppose you deposit $1,000 in an account that pays 12% interest, compounded quarterly. How much will be in the account after eight years if there are no withdrawals?Explain concept of Annuity in detail
9	Explain various Techniques of inventory Management
10	List various theories of capital structure. explain any one theory
11	Define risk and return. Explain Measurement of Historical Returns and Expected Returns of a Single Security and a Two-security Portfolio
12	Explain Financial Statements—Balance Sheet, Profit and Loss Account, and Cash Flow Statement
13	Explain various decisions in corporate finance. Also explain Current ratio, Quick ratio and composite ratio
14	What are financial institutions? Explain various types in detail
15	Julie Miller is evaluating a new project for her firm, Basket Wonders (BW). She has determined that the after-tax cash flows for the project will be $10,000; $12,000; $15,000; $10,000; and $7,000, respectively, for each of the Years 1 through 5. The initial cash outlay will be $40,000. Calculate payback period. also comment on strength and weakness of payback period
16	Differentiate between ordinary annuity and annuity due with examples.
17	Explain any 5 types of money market instruments in brief.
18	Describe the relation between Capital Structure and Corporate Value.
19	What are the factors affecting an Entity's Working Capital Needs?
20	Briefly explain the types of financial services
21	How does one manage the receivables under working capital management?
22	ABBC Company is considering an investment Project A with the expected cash flows as shown below: Year — Project A (₹) 0 — (1,000) 1 — (1,200) 2 — (600) 3 — (250) 4 — 2,000 5 — 4,000 What is the NPV if the interest rate is 8%. What is the IRR of the Project? Should the company invest in the project?

23	The shares of Armstrong company has the following anticipated returns with associated probabilities: ***Return (%)*** –20 –10 10 15 20 25 30 ***Probability*** 0.05 0.10 0.20 0.25 0.20 0.15 0.05 *Calculate the expected rate of return and risk measures in terms of variance & standard deviation.*
24	Explain with suitable example the concept & importance of Economic Order Quantity.

FINANCIAL MANAGEMENT

Q1. PNG's current assets and current liabilities are ₹2,00,00,000 and ₹1,40,00,000 respectively. How much additional funds can it borrow from banks for short term, without reducing the current ratio below 1.33?

Sol^{n} : Given : current assets = ₹2,00,00,000

current liabilities = ₹1,40,00,000 (SHORT TERM FUND)

current ratio can't go below 1.33

We need to find additional funds to borrow from bank. (i.e how much more we can increase the current liabilities without disturbing the current ratio of 1.33)

Current Ratio = (current assets / current liabilities)

= 20000000 / 14000000

= 1.428

So, we have a chance to increase the current Liabilities (Short term fund)

Current Ratio = (current assets / current liabilities)

1.33 = (20000000 / current liabilities)

Current Liabilities at 1.33 ratio = ₹ 15038000

Additional funds = (Current Liabilities at 1.33 ratio - Current Liabilities at 1.428 ratio)

= 15038000 - 14000000

Additional funds = ₹ 5038000

₹ 5038000 of additional funds can be borrowed from banks for short term

FINANCIAL MANAGEMENT

Q2. Distinguish between equity & debt instruments.

EQUITY	DEBT
Equity instruments (stock or share) allows the investor to buy an ownership stake in the company. Equity refers to the Net Worth of the company. It is the source of permanent capital.	Money raised by the company in the form of borrowed capital is known as Debt. A debt instrument is an electronic obligation or any paper that permits an issuing party to raise funds by assuring it to pay back a lender by the terms and conditions of a contract.
Equity investments offer an ownership position in the company. Owning a stock makes the investor an owner of the organization. The percentage of ownership depends on the number of shares owned as compared with the total number of shares issued by the corporation. Also, the number of fund shares is its own funds.	Debt instruments, whatever they may call, are corporate borrowing. Instead of procuring a straight commercial bank loan, the organization "borrows" from a variety of investors. This is why debt instruments, such as bonds, come with a stated interest rate, as a loan would.
Unlike debt instruments, equity instruments cede ownership, and some control, of a business to investors who provide private capital to a business. Stocks are equity instruments.	It represents that the company owes money to another person or entity. They are less volatile than common stocks, with fewer highs and lows than the stock market.
Equity holders incur greater risk than debt holders because equity holders do not enjoy priority in a bankruptcy proceeding. However, equity holders earn greater returns if the business succeeds.	Debt investments tend to be less risky than equity investments but usually offer a lower but more consistent return. Anything that obliges a borrower to make payments based on a contractual arrangement is a debt instrument. Debt instruments can be secured or unsecured.
Equity instruments are the types of investment in Shares and Stocks.	Debt instruments are the types of investment in Term loans, Debentures, Bonds, etc.
Equity instruments are the types of investment in the long term, so that high risk.	Debt instruments are the types of investment in the comparatively short term, so that low and less risk.

Q3. What are leverage ratios ? Explain any two types of the same.

A leverage ratio is any one of several financial measurements that look at how much capital comes in the form of debt (loans) or assesses the ability of a company to meet its financial obligations.

A leverage ratio is any kind of financial ratio that indicates the level of debt incurred by a business entity against several other accounts in its balance sheet, income statement, or cash flow statement. These ratios provide an indication of how the company's assets and business operations are financed (using debt or equity). Below is an illustration of two common leverage ratios: debt/equity and debt/capital.

The leverage ratio category is important because companies rely on a mixture of equity and debt to finance their operations, and knowing the amount of debt held by a company is useful in evaluating whether it can pay off its debts as they come due.

Too much debt can be dangerous for a company and its investors. However, if a company's operations can generate a higher rate of return than the interest rate on its loans, then the debt may help to fuel growth. Uncontrolled debt levels can lead to credit downgrades or worse. On the other hand, too few debts can also raise questions. A reluctance or inability to borrow may be a sign that operating margins are tight.

There are several different ratios that may be categorized as a leverage ratio, but the main factors considered are debt, equity, assets, and interest expenses. Several common leverage ratios are discussed below :

1. **Debt-to-Equity Ratio** = Total Debt / Total Equity
2. **Asset-to-Equity Ratio** = Total Assets / Total Equity
3. **Debt-to-Assets Ratio** = Total Debt / Total Assets
4. **Debt-to-Capital Ratio** = Today Debt / (Total Debt + Total Equity)

Debt-to-Equity Ratio

For example, United Parcel Service's long-term debt for the quarter ending December 2019 was $21.8 billion. United Parcel Service's total stockholders' equity for the ending December 2019 was $3.3 billion. The company's D/E for the quarter was 8.62. That is considered high.

A high debt/equity ratio generally indicates that a company has been aggressive in financing its growth with debt. This can result in volatile earnings as a result of the additional interest expense. If the company's interest expense grows too high, it may increase the company's chances of a default or bankruptcy.

Typically, a D/E ratio greater than 2.0 indicates a risky scenario for an investor

Asset-to-Equity Ratio

For example, assume that Macy's (NYSE: M) has assets valued at $19.85 billion and stockholder equity of $4.32 billion. The equity multiplier would be:

$19.85 billion ÷ $ 4.32 billion = 4.59

Although debt is not specifically referenced in the formula, it is an underlying factor given that total assets includes debt.

Remember that *Total Assets = Total Debt + Total shareholders' Equity*. The company's high ratio of 4.59 means that assets are mostly funded with debt than equity. From the equity multiplier calculation, Macy's assets are financed with $15.53 billion in liabilities.

Q4. How and why are risk and return considered significant factors in finance management ?

Risk

Risk is the potential of loss (an undesirable outcome, however not necessarily so) resulting from a given action, activity and/or inaction. While some of these risks may seem trivial and other make a significant difference of actual outcome. To understand the term 'risk' in a better way, let consider some view point of renowned authors given below:
Risk means uncertainty about future loss or, in other words, the inability to predict the occurrence or size of a loss.

1. Risk refers to chance of loss, or uncertainty of occurrence of returns.
2. Risk is a possibility of an adverse deviation of expected income or output.
3. Risk is always uncertain, if it is certain than it can be treated as expense against revenue.
4. Risk is measured with the help of a statistical technique probability.
5. Risk creates both problems and opportunities for business.

Return

A return, also known as a financial return, in its simplest terms, is the money made or lost on an investment over some period of time.

A return can be expressed nominally as the change in dollar value of an investment over time. A return can also be expressed as a percentage derived from the ratio of profit to investment. Returns can also be presented as net results (after fees, taxes, and inflation) or gross returns that do not account for anything but the price change.

Return is the motivating force and the principal reward in the investment. An appreciation in the investment can also be considered as capital gain on investment. A rate of return on investment provides a basis of comparison among given alternative

investment opportunities. There are two types of returns are, commonly, discussed under investment management, first, realised return and second, expected return. The realized return is the actual outcome on investment, on the other hand expected return is the probable return on investment over future period. The expected return is calculated for both purposes i.e., annual return, as well as capital growth in investment over a given future period.

Investors use the risk-return tradeoff as one of the essential components of each investment decision, as well as to assess their portfolios as a whole. At the portfolio level, the risk-return tradeoff can include assessments of the concentration or the diversity of holdings and whether the mix presents too much risk or a lower-than-desired potential for returns.

Q5. What is mezzanine financing? Explain with an example.

Mezzanine financing is a hybrid of debt and equity financing that gives the lender the right to convert the debt to an equity interest in the company in case of default, generally, after venture capital companies and other senior lenders are paid. In terms of risk, it exists between senior debt and equity.

Mezzanine debt has embedded equity instruments. often known as warrants, attached which increase the value of the subordinated debt and allow greater flexibility when dealing with bondholders. Mezzanine financing is frequently associated with acquisitions and buyouts, for which it may be used to prioritize new owners ahead of existing owners in case of bankruptcy.

Mezzanine financing bridges the gap between debt and equity financing and is one of the highest-risk forms of debt. It is senior to pure equity but subordinate to pure debt. However, this means that it also offers some of the highest returns to investors in debt when compared to other debt types, as it often receives rates between 12% and 20% per year, and sometimes as high as 30%. Mezzanine financing can be considered as very expensive debt or cheaper equity, because mezzanine financing carries a higher interest rate than the senior debt that companies would otherwise obtain through their banks but is substantially less expensive than equity in terms of the overall cost of capital. It is also less diluting of the company's share value. In the end, mezzanine financing permits a business to more more capital and increase its returns on equity.

Companies will turn to mezzanine financing in order to fund specific growth projects or to help with acquisitions having short- to medium-term time horizons. Often, these loans will be funded by the company's long-term investors and existing funders of the company's capital. In that case of preferred equity, there is, in effect, no obligation to repay the money acquired through equity financing. Since there are no mandatory payments to be made, the company has more liquid capital available to it for investing in the business. Even a mezzanine loan requires only interest payments prior to maturity and thus also leaves more free capital in the hands of the business owner.

In a **mezzanine financing** example, Bank XYZ provides Company ABC, a maker of surgical devices, with $15 million in a mezzanine loan financing. The funding replaced a higher interest $10 million credit line with more favorable terms. Company ABC gained more working capital to help bring additional products to the market and paid off a higher interest debt. Bank XYZ will collect 10% a year in interest payments and will be able to convert the debt to an equity stake if the company defaults. Bank XYZ was also able to prohibit Company ABC's borrowing of additional funds and to impose certain financial ratio standards upon it.

In a **preferred equity** example, company 123 issues Series B 10% Preferred Stock with a par value of $25 and liquidation value of $500. The stock will pay periodic dividends when funds are available until the defined maturity is reached. The relatively high liquidation value is a takeover defense making it unprofitable to acquire the stock for such purposes.

Q6. Describe in brief the Net income Approach as a Capital Structure theory.

The Net Income Approach suggests that the value of the firm can be increased by decreasing the overall cost of capital (WACC) through a higher debt proportion. There are various theories that propagate the 'ideal' capital mix/capital structure for a firm. Capital structure is the proportion of debt and equity in which a corporate finances it's business. The capital structure of a company/firm plays a very important role in determining the value of a firm.

A corporate can finance its business mainly by 2 means, i.e., debts and equity. However, the proportion of each of these could vary from business to business. A company can choose to have a structure with 50% each of debt and equity or more of one and less of another. Capital structure is also referred to as financial leverage, which strictly means the proportion of debt or borrowed funds in the financing mix of a company.

Durand presented the Net Income Approach. The theory suggests increasing the firm's value by decreasing the overall cost of capital which is measured in terms of the Weighted Average Cost of Capital. This can be done by having a higher proportion of debt, which is a cheaper finance source than equity finance.

Weighted Average Cost of Capital (WACC) is the weighted average costs of equity and debts, where the weights are the amount of capital raised from each source.

$$WACC = \frac{\text{Required Rate of Return x Amount of Equity + Cost of debt x Amount of Debt}}{\text{Total Amount of Capital (Debt + Equity)}}$$

According to Net Income Approach, a change in the financial leverage of a firm will lead to a corresponding change in the Weighted Average Cost of Capital (WACC) and the company's value. The Net Income Approach suggests that with the increase in leverage (proportion of debt), the WACC decreases, and the firm's value increases. On the other hand, if there is a decrease in the leverage, the

WACC increases, thereby decreasing the firm's value.

For example, vis-à-vis the equity-debt mix of 50:50, if the equity-debt mix changes to 20: 80, it would positively impact the value of the business and increase the value per share.

Q7. Explain various Financial Instruments in detail .

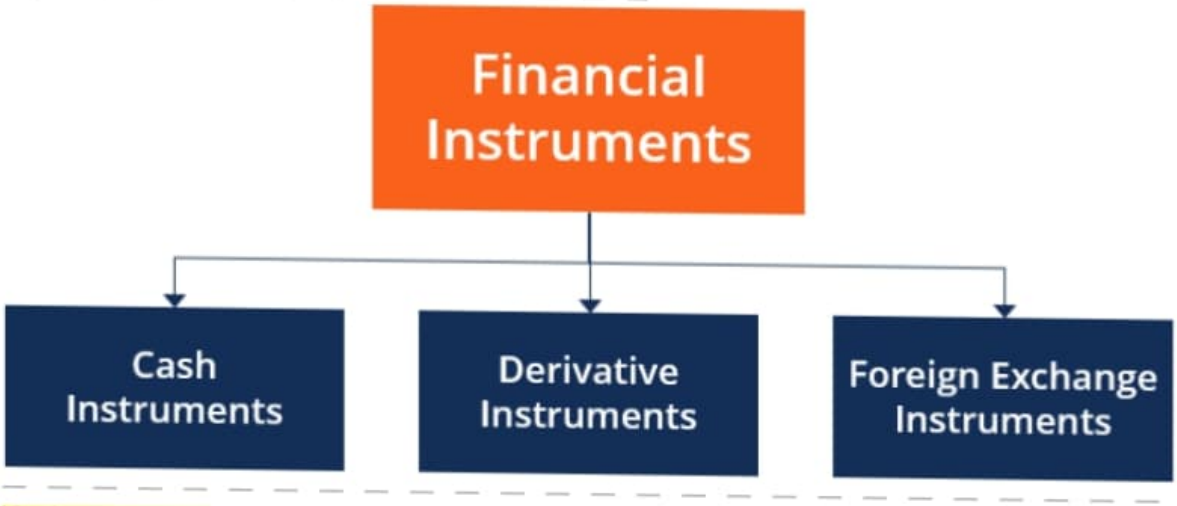
Financial instruments are contracts for monetary assets that can be purchased, traded, created, modified, or settled for. In terms of contracts, there is a contractual obligation between involved parties during a financial instrument transaction.

For example, if a company were to pay cash for a bond, another party is obligated to deliver a financial instrument for the transaction to be fully completed. One company is obligated to provide cash, while the other is obligated to provide the bond.

Basic examples of financial instruments are cheques, bonds, securities.

There are typically three types of financial instruments: cash instruments, derivative instruments, and foreign exchange instruments.

Types of Financial Instruments



1. Cash Instruments

Cash instruments are financial instruments with values directly influenced by the condition of the markets. Within cash instruments, there are two types; securities and deposits, and loans.

Securities: A security is a financial instrument that has monetary value and is traded on the stock market. When purchased or traded, a security represents ownership of a part of a publicly-traded company on the stock exchange.

Deposits and Loans: Both deposits and loans are considered cash instruments because they represent monetary assets that have some sort of contractual agreement between parties.

2. *Derivative Instruments*

Derivative instruments are financial instruments that have values determined from underlying assets, such as resources, currency, bonds, stocks, and stock indexes.

The five most common examples of derivatives instruments are synthetic agreements, forwards, futures, options, and swaps. This is discussed in more detail below.

Synthetic Agreement for Foreign Exchange (SAFE): A SAFE occurs in the over-the-counter (OTC) market and is an agreement that guarantees a specified exchange rate during an agreed period of time.

Forward: A forward is a contract between two parties that involves customizable derivatives in which the exchange occurs at the end of the contract at a specific price.

Future: A future is a derivative transaction that provides the exchange of derivatives on a determined future date at a predetermined exchange rate.

Options: An option is an agreement between two parties in which the seller grants the buyer the right to purchase or sell a certain number of derivatives at a predetermined price for a specific period of time.

Interest Rate Swap: An interest rate swap is a derivative agreement between two parties that involves the swapping of interest rates where each party agrees to pay other interest rates on their loans in different currencies.

3. *Foreign Exchange Instruments*

Foreign exchange instruments are financial instruments that are represented on the foreign market and primarily consist of currency agreements and derivatives.

In terms of currency agreements, they can be broken into three categories.

Spot: A currency agreement in which the actual exchange of currency is no later than the second working day after the original date of the agreement. It is termed “spot” because the currency exchange is done “on the spot” (limited timeframe).

Outright Forwards: A currency agreement in which the actual exchange of currency is done “forwardly” and before the actual date of the agreed requirement. It is beneficial in cases of fluctuating exchange rates that change often.

Currency Swap: A currency swap refers to the act of simultaneously buying and selling currencies with different specified value dates.

FINANCIAL MANAGEMENT

Asset Classes of Financial Instruments

Beyond the types of financial instruments listed above, financial instruments can also be categorized into two asset classes. The two asset classes of financial instruments are debt-based financial instruments and equity-based financial instruments.

1. Debt-Based Financial Instruments

Debt-based financial instruments are categorized as mechanisms that an entity can use to increase the amount of capital in a business. Examples include bonds, debentures, mortgages, U.S. treasuries, credit cards, and line of credits (LOC).

They are a critical part of the business environment because they enable corporations to increase profitability through growth in capital.

2. Equity-Based Financial Instruments

Equity-based financial instruments are categorized as mechanisms that serve as legal ownership of an entity. Examples include common stock, convertible debentures, preferred stock, and transferable subscription rights.

They help businesses grow capital over a longer period of time compared to debt-based but benefit in the fact that the owner is not responsible for paying back any sort of debt.

A business that owns an equity-based financial instrument can choose to either invest further in the instrument or sell it whenever they deem necessary.

Q8. Suppose you deposit $1,000 in an account that pays 12% interest, compounded quarterly. How much will be in the account after eight years if there are no withdrawals? Explain concept of Annuity in detail.

Sol^n : Given : initial principal Balance (P) = $ 1000
Interest Rate (r) = 0.12 (12 %)
number of times interest applied per time period (n) = 4 (Quarterly i.e 3 months, interest is applied 4 times in a year)
number of time periods elapsed (t) = 8 years

To Find : Final Amount (A)

Formula for Compund Interest is :

$$A = P(1 + \frac{r}{n})^{nt}$$

A = final amount

P = initial principal balance

r = interest rate

n = number of times interest applied per time period

t = number of time periods elapsed

$$A = 1000\left(1 + \frac{0.12}{4}\right)^{4 \text{ X } 8}$$

$$A = 1{,}000.00(1 + 0.12/4)^{(4)(8)}$$

$$A = 1{,}000.00(1 + 0.03)^{(32)}$$

$$A = \$2{,}575.08$$

Summary:
The total amount accrued, principal plus interest, with compound interest on a principal of $1,000.00 at a rate of 12% per year compounded 4 times per year over 8 years is $2,575.08.

Refer Q6. For Annuity in detail

FINANCIAL MANAGEMENT

Q9. Explain various Techniques of inventory Management .

Inventory management is how you track and control your business' inventory as it is bought, manufactured, stored, and used. It governs the entire flow of goods — from purchasing right through to sale — ensuring that you always have the right quantities of the right item in the right location at the right time.

Inventory is the goods that your company handles with the intention of selling. It might be raw materials that you buy and turn into something entirely new, or it might be a bulk product that you break down into its constituent parts and sell separately. It could even be something completely intangible: software, for instance.

Types of inventory

There are lots of different types of inentory, and which ones you'll deal with depends on the goods you sell. Here's an overview of some of the types you're more likely to encounter:

- **Finished goods/for-sale goods:** The products you sell to your customers
- **Raw materials:** The inventory you use to make your finished goods
- **Work-in-progress:** Essentially, unfinished goods — inventory that is part-way through the manufacturing process
- **MRO goods:** MRO stands for maintenance, repair and operating. This is the inventory you use to support the manufacturing process
- **Safety stock:** The additional inventory you keep in store to deal with supplier shortages or surges in demand

Every venture that handles inventory will need some way of handling stock. Let's take a look at how that works in principle.

At a basic level, inventory management works by tracking products, components and ingredients across suppliers, stock on hand, production and sales to ensure that stock is used as efficiently and effectively as possible. It can go as deep as you need it to: for example, by examining the difference between dependent and independent demand, or forecasting sales to plan ahead. But at the end of the day, it all goes back to your stock.

Inventory management process: 5 key stages

The inventory management process involves tracking and controlling stock as it moves from your suppliers to your warehouse to your customers. There are five main stages to follow:

1. **Purchasing**: This can mean buying raw materials to turn into products, or buying products to sell on with no assembly required
2. **Production**: Making your finished product from its constituent parts. Not every company will get involved in manufacturing — wholesalers, for instance, might skip this step entirely
3. **Holding stock**: Storing your raw materials before they're manufactured (if required), and your finished goods before they're sold
4. **Sales**: Getting your stock into customers' hands, and taking payment
5. **Reporting**: Businesses need to know how much it is selling, and how much money it makes on each sale

Q10. List various theories of capital structure. explain any one theory

Refer Q6.

Q11. Define risk and return. Explain Measurement of Historical Returns and Expected Returns of a Single Security and a Two-security Portfolio

Refer Q4. & below

Historical Returns :

The historical return of a financial asset, such as a bond, stock, security, index, or fund, is its past rate of return and performance. The historical returns of a financial asset are usually recorded from the beginning of a year (i.e., January 1st) to the end of the year (i.e., December 31st) to determine the annual return of a particular year. A compilation of past annual returns is needed to depict historical returns over many years. By obtaining the historical returns data, analysts and investors can compute the average historical returns of a financial asset.
The historical data is commonly used in financial analysis to project future returns or determine what variables may impact future returns and the extent to which the variables may influence returns. Concerning standard deviations, historical returns can be used to predict future data points.

Calculating Historical Returns

The computation for historical returns is relatively simple, provided that all information on past annual performance is available.

The data below provides the historical performance of the S&P 500 index. The data used is for educational purposes only and does not depict real-time historical data.

- December 31, 2016: 2,105
- December 31, 2017: 2,540

To begin calculating the historical returns, the difference between the most recent price and the past price needs to be computed and then divided by the past price multiplied by 100 to get the result as a percentage. The calculation can be done iteratively to cater for longer time periods – e.g., 5 years or more.

Hence, the historical return for the S&P 500 based on the data provided above is calculated as:

Historical Return(s) = [(2,540 – 2,105) / 2,105] x 100 = 0.20665 x 100

Historical Return(s) = 20.7%

EXPECTED RETURNS

As a well-informed investor, you naturally want to know the expected return of your portfolio—its anticipated performance and the overall profit or loss it's racking up. Expected return is just that: expected. It is not guaranteed, as it is based on historical returns and used to generate expectations, but it is not a prediction.

The expected return of a portfolio will depend on the expected returns of the individual securities within the portfolio on a weighted-average basis. A well-diversified portfolio will therefore need to take into account the expected returns of several assets.

To calculate the expected return of a portfolio, the investor needs to know the expected return of each of the securities in their portfolio as well as the overall weight of each security in the portfolio. That means the investor needs to add up the weighted averages of each security's anticipated rates of return (RoR).

Formula for Expected Return

Let's say your portfolio contains three securities. The equation for its expected return is as follows:

$$Ep = w_1E_1 + w_2E_2 + w_3E_3$$

where: w_n refers to the portfolio weight of each asset and E_n its expected return.

Calculating Expected Return for a Single Investment

Let us take an investment A, which has a 20% probability of giving a 15% return on investment, a 50% probability of generating a 10% return, and a 30% probability of resulting in a 5% loss. This is an example of calculating a discrete probability distribution for potential returns.

The probabilities of each potential return outcome are derived from studying historical data on previous returns of the investment asset being evaluated. The probabilities stated, in this case, might be derived from studying the performance of the asset over the previous 10 years. Assume that it generated a 15% return on investment during two of those 10 years, a 10% return for five of the 10 years, and suffered a 5% loss for three of the 10 years.

The expected return on investment A would then be calculated as follows:

Expected Return of A = 0.2(15%) + 0.5(10%) + 0.3(-5%)

(That is, a 20%, or .2, probability times a 15%, or .15, return; plus a 50%, or .5, probability times a 10%, or .1, return; plus a 30%, or .3, probability of a return of negative 5%, or -.5)

= 3% + 5% − 1.5% = 6.5%

Therefore, the probable long-term average return for Investment A is 6.5%.

Q12. Explain Financial Statements—Balance Sheet, Profit and Loss Account, and Cash Flow Statement

Financial statements are written records that convey the business activities and the financial performance of a company. Financial statements are often audited by government agencies, accountants, firms, etc. to ensure accuracy and for tax, financing, or investing purposes. Financial statements include the

- Balance sheet
- Income statement
- Cash flow statement

• The Balance Sheet

One of the financial statements is the balance sheet. It shows an entity's assets, liabilities, and stockholders' equity as of the report date.

Assets

- Cash and cash equivalents are liquid assets, which may include Treasury bills and certificates of deposit.
- Accounts receivables are the amount of money owed to the company by its customers for the sale of its product and service.
- Inventory

Liabilities

- Debt including long-term debt
- Wages payable
- Dividends payable

Shareholders' Equity

- Shareholders' equity is a company's total assets minus its total liabilities. Shareholders' equity represents the amount of money that would be returned to shareholders if all of the assets were liquidated and all of the company's debt was paid off.
- Retained earnings are part of shareholders' equity and are the amount of net earnings that were not paid to shareholders as dividends.

In this report, the total of all assets must match the combined total of all liabilities and equity. The asset information on the balance sheet is subdivided into current and long-term assets. Similarly, the liability information is subdivided into current and long-term liabilities. This stratification is useful for determining the liquidity of a business. Ideally, the total of all current liabilities should exceed the total of all current liabilities, which implies that a business has sufficient assets to pay off its current obligations. The balance sheet is also used to compare debt levels to the amount of equity invested in the business, to see if its leverage level is appropriate.

The Income Statement

Unlike the balance sheet, the income statement covers a range of time, which is a year for annual financial statements and a quarter for quarterly financial statements. The income statement provides an overview of revenues, expenses, net income, and earnings per share.

Revenue

Operating revenue is the revenue earned by selling a company's products or services. The operating revenue for an auto manufacturer would be realized through the production and sale of autos. Operating revenue is generated from the core business activities of a company.

Non-operating revenue is the income earned from non-core business activities. These revenues fall outside the primary function of the business. Some non-operating revenue examples include:

- Interest earned on cash in the bank
- Rental income from a property
- Income from strategic partnerships like royalty payment receipts
- Income from an advertisement display located on the company's property

Other income is the revenue earned from other activities. Other income could include gains from the sale of long-term assets such as land, vehicles, or a subsidiary.

Expenses

Primary expenses are incurred during the process of earning revenue from the primary activity of the business. Expenses include the cost of goods sold (COGS), selling, general and administrative expenses (SG&A), depreciation or amortization, and research and development (R&D).

Typical expenses include employee wages, sales commissions, and utilities such as electricity and transportation.

Expenses that are linked to secondary activities include interest paid on loans or debt. Losses from the sale of an asset are also recorded as expenses.

Another financial statement is the income statement. It shows the results of an entity's operations and financial activities for the reporting period. It usually contains the results for either the past month or the past year, and may include several periods for comparison purposes. Its general structure is to begin with all revenues generated, from which the cost of goods sold is subtracted, and then all selling, general, and administrative expenses. The result is either a profit or loss, which is net of income taxes.

• The Statement of Cash Flows

The cash flow statement (CFS) measures how well a company generates cash to pay its debt obligations, fund its operating expenses, and fund investments. The cash flow statement complements the balance sheet and income statement.

The CFS allows investors to understand how a company's operations are running, where its money is coming from, and how money is being spent. The CFS also provides insight as to whether a company is on a solid financial footing.

The final financial statement is the statement of cash flows. It shows changes in an entity's cash flows during the reporting period. These cash flows are divided into cash flows from operating activities, investing activities, and financing activities. The bulk of all cash flows are generally listed in the operating activities section, which state the cash inflows and outflows related to the basic operations of the business, such as from changes in receivables, inventory, and payables balances. The investing activities section contains cash flows from the purchase or sale of investment instruments, assets, or other businesses. The financing activities section contains cash flows related to the acquisition or paydown of debt, dividend issuances, stock sales, and so forth.

Q13. Explain various decisions in corporate finance. Also explain Current ratio, Quick ratio and composite ratio

Corporate finance is the subfield of finance that deals with how corporations address funding sources, capital structuring, accounting, and investment decisions.

Corporate finance is often concerned with maximizing shareholder value through long- and short-term financial planning and the implementation of various strategies. Corporate finance activities range from capital investment to tax considerations.

Corporate finance departments are charged with governing and overseeing their firms' financial activities and capital investment decisions. Such decisions include whether to pursue a proposed investment and whether to pay for the investment with equity, debt, or both. They also include whether shareholders should receive dividends, and if so, at what dividend yield. Additionally, the finance department manages current assets, current liabilities, and inventory control.

Types of Financial Decisions – That Every Company is Required to Take: Investment Decision, Financing Decision and Dividend Decision

Investment Decision:

A financial decision which is concerned with how the firm's funds are invested in different assets is known as investment decision. Investment decision can be long-term or short-term.

A long term investment decision is called capital budgeting decisions which involve huge amounts of long term investments and are irreversible except at a huge cost. Short-term investment decisions are called working capital decisions, which affect day to day working of a business. It includes the decisions about the levels of cash, inventory and receivables.

A bad capital budgeting decision normally has the capacity to severely damage the financial fortune of a business.

A bad working capital decision affects the liquidity and profitability of a business.

Financing Decision:

A financial decision which is concerned with the amount of finance to be raised from various long term sources of funds like, equity shares, preference shares, debentures, bank loans etc. Is called financing decision. In other words, it is a decision on the 'capital structure' of the company.

Capital Structure Owner's Fund + Borrowed Fund

Dividend Decision:

A financial decision which is concerned with deciding how much of the profit earned by the company should be distributed among shareholders (dividend) and how much should be retained for the future contingencies (retained earnings) is called dividend decision.

Dividend refers to that part of the profit which is distributed to shareholders. The decision regarding dividend should be taken keeping in view the overall objective of maximizing shareholder s wealth.

Q14. What are financial institutions? Explain various types in detail.

A financial institution (FI) is a company engaged in the business of dealing with financial and monetary transactions such as deposits, loans, investments, and currency exchange. Financial institutions encompass a broad range of business operations within the financial services sector including banks, trust companies, insurance companies, brokerage firms, and investment dealers.

Virtually everyone living in a developed economy has an ongoing or at least periodic need for the services of financial institutions.

FINANCIAL MANAGEMENT

Financial institutions serve most people in some way, as financial operations are a critical part of any economy, with individuals and companies relying on financial institutions for transactions and investing.

Types of Financial Institutions

Financial institutions offer a wide range of products and services for individual and commercial clients. The specific services offered vary widely between different types of financial institutions.

Commercial Banks

A commercial bank is a type of financial institution that accepts deposits, offers checking account services, makes business, personal, and mortgage loans, and offers basic financial products like certificates of deposit (CDs) and savings accounts to individuals and small businesses. A commercial bank is where most people do their banking, as opposed to an investment bank.

Banks and similar business entities, such as thrifts or credit unions, offer the most commonly recognized and frequently used financial services: checking and savings accounts, home mortgages, and other types of loans for retail and commercial customers. Banks also act as payment agents via credit cards, wire transfers, and currency exchange.

Financial institutions can operate at several scales from local community credit unions to international investment banks.

Investment Banks

Investment banks specialize in providing services designed to facilitate business operations, such as capital expenditure financing and equity offerings, including initial public offerings (IPOs). They also commonly offer brokerage services for investors, act as market makers for trading exchanges, and manage mergers, acquisitions, and other corporate restructurings.

Insurance Companies

Among the most familiar non-bank financial institutions are insurance companies. Providing insurance, whether for individuals or corporations, is one of the oldest financial services. Protection of assets and protection against financial risk, secured through insurance products, is an essential service that facilitates individual and corporate investments that fuel economic growth.

Brokerage Firms

Investment companies and brokerages, such as mutual fund and exchange-traded fund (ETF) provider Fidelity Investments, specialize in providing investment services that include wealth management and financial advisory services. They also provide access to investment products that may range from stocks and bonds all the way to lesser-known alternative investments, such as hedge funds and private equity investments.

FINANCIAL MANAGEMENT

Q15. Julie Miller is evaluating a new project for her firm, Basket Wonders (BW). She has determined that the after-tax cash flows for the project will be $10,000; $12,000; $15,000; $10,000; and $7,000, respectively, for each of the Years 1 through 5. The initial cash outlay will be $40,000.

Calculate payback period. also comment on strength and weakness of payback period

PAYBACK PERIOD : The payback period is the time you need to recover the cost of your investment. In simple terms, it is time an investment takes to reach the break-even point. It would help if you retrieved the investment costs of a project as soon as possible to make a profit. The payback period shows you the time taken to recover the cost of the project.

Payback Period = Initial investment / Cash flow per year

Payback period = Years before full recovery + Unrecovered cost at the start of the year / Cash flow during the year

Initial Investment = $ 40000

It is recovered till 4^{th} Year

You have year 3 which is the last year before the investment turns positive. with a cumulative cost of $10,000 + $12,000 + $15,000 = $ 37000

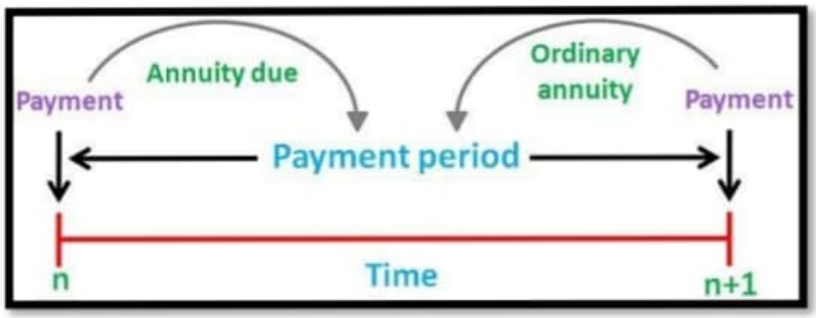
For our case :

Payback period = Years before full recovery (3^{rd}) + { Unrecovered cost at the start of the year (initial invest - Cumulative cost) / Cash flow during the year (4^{th}) }

Payback period = 3 + { (40000 – 37000) / 10000 }

Payback period = 3.3 Years

Q16. Differentiate between ordinary annuity and annuity due with examples.



An annuity is described as a stream of fixed cash flows, i.e. payments or receipts, that occurs periodically, over time. For example, payment of housing loan, life insurance premium, rent, etc. There can be two types of annuities, i.e. ordinary annuity and annuity due. **Ordinary annuity** means an annuity which is related to the period preceding its date, whereas **annuity due** is the annuity related to the period following its date.

Most of the people use an annuity as a retirement tool (pension) that guarantees steady income in the coming years. An equal amount should be paid or received as an annuity and the time lag between payments occurring consecutively should be same.

There is a difference between ordinary annuity and annuity due which lies in the timing of the two annuities.

BASIS FOR COMPARISON	ORDINARY ANNUITY	ANNUITY DUE
Meaning	Ordinary annuity is one in which the inflow or outflow of cash fall due for payment at the end of each period.	Annuity due is described as the series of cash flows occurring at the beginning of each period.
Payment	Belongs to the period preceding its date.	Belongs to the period following its date.
Appropriate for	Payments	Receipts
Example	Housing loan, payment of mortgage, coupon bearing bonds, etc.	Rental lease payments, life insurance premium, etc.

Q17. Explain any 5 types of money market instruments in brief.

The money market refers to trading in very short-term debt investments. At the wholesale level, it involves large-volume trades between institutions and traders. At the retail level, it includes money market mutual funds bought by individual investors and money market accounts opened by bank customers.

In all of these cases, the money market is characterized by a high degree of safety and relatively low rates of return.

As the name suggests, Money Market Instruments are simply the instruments or tools which can help one operate in the money market. These instruments serve a dual purpose of not only allowing borrowers meet their short-term requirements but also provide easy liquidity to lenders. Some of the common money market instruments include Banker's Acceptance, Treasury Bills, Repurchase Agreements, Certificate of Deposits and Commercial Papers.

Money market instruments allow governments, financial organizations and businesses to finance their short-term cash requirements. Some of the notable characteristics of money market instruments are as follows.

- **Liquidity** – Money market instruments are highly liquid because they are fixed-income securities which carry short maturity periods of a year or less.
- **Safety** – Issuers of money market instruments have strong credit ratings, which automatically means that the money instruments issued by them will also be safe.
- **Discount Pricing** – Another important characteristic feature of money market instruments is that they are issued at a discount on their face value.

Treasury Bills (T-Bills)

Issued by the Central Government, Treasury Bills are known to be one of the safest money market instruments available. However, treasury bills carry zero risk. I.e. are zero risk instruments. Therefore, the returns one gets on them are not attractive. Treasury bills come with different maturity periods like 3-month, 6-month and 1 year and are circulated by primary and secondary markets. Treasury bills are issued by the Central government at a lesser price than their face value. The interest earned by the buyer will be the difference of the maturity value of the instrument and the buying price of the bill, which is decided with the help of bidding done via auctions. Currently, there are 3 types of treasury bills issued by the Government of India via auctions, which are 91-day, 182-day and 364-day treasury bills.

Certificate of Deposits (CDs)

A Certificate of Deposit or CD, functions as a deposit receipt for money which is deposited with a financial organization or bank. However, a Certificate of Deposit is different from a Fixed Deposit Receipt in two aspects. The first aspect of difference is that a CD is only issued for a larger sum of money. Secondly, a Certificate of Deposit is freely negotiable. First announced in 1989 by RBI, Certificate of Deposits have become a preferred investment choice for organizations in terms of short-term surplus investment as

they carry low risk while providing interest rates which are higher than those provided by Treasury bills and term deposits. Certificate of Deposits are also relatively liquid, which is an added advantage, especially for issuing banks. Like treasury bills, CDs are also issued at a discounted price and their tenor ranges between a span of 7 days up to 1 year. However, banks issue Certificates of Deposits for durations ranging from 3 months, 6 months and 12 months. They can be issued to individuals (except minors), trusts, companies, corporations, associations, funds, non-resident Indians, etc.

Commercial Papers (CPs)

Commercial Papers are can be compared to an unsecured short-term promissory note which is issued by highly rated companies with the purpose of raising capital to meet requirements directly from the market. CPs usually feature a fixed maturity period which can range anywhere from 1 day up to 270 days. Highly popular in countries like Japan, UK, USA, Australia and many others, Commercial Papers promise higher returns as compared to treasury bills and are automatically not as secure in comparison. Commercial papers are actively traded in secondary market.

Repurchase Agreements (Repo)

Repurchase Agreements, also known as Reverse Repo or simply as Repo, loans of a short duration which are agreed upon by buyers and sellers for the purpose of selling and repurchasing. These transactions can only be carried out between RBI approved parties Repo / Reverse Repo transactions can be done only between the parties approved by RBI. Transactions are only permitted between securities approved by the RBI like treasury bills, central or state government securities, corporate bonds and PSU bonds.

Banker's Acceptance (BA)

Banker's Acceptance or BA is basically a document promising future payment which is guaranteed by a commercial bank. Similar to a treasury bill, Banker’s Acceptance is often used in money market funds and specifies the details of the repayment like the amount to be repaid, date of repayment and the details of the individual to which the repayment is due. Banker’s Acceptance features maturity periods ranging between 30 days up to 180 days.

Q18. Describe the relation between Capital Structure and Corporate Value.

Capital structure is the particular combination of debt and equity used by a company to finance its overall operations and growth.

Equity capital arises from ownership shares in a company and claims to its future cash flows and profits. Debt comes in the form of bond issues or loans, while equity may come in the form of common stock, preferred stock, or retained earnings. Short-term debt is also considered to be part of the capital structure.

Both debt and equity can be found on the balance sheet. Company assets, also listed on the balance sheet, are purchased with debt or equity. Capital structure can be a mixture of a company's long-term debt, short-term debt, common stock, and preferred stock. A company's proportion of short-term debt versus long-term debt is considered when analyzing its capital structure.

Capital structure is the particular combination of debt and equity used by a company to finance its overall operations and growth.

Capital Structure means arranging capital from various sources, in order, to meet the need for long-term funds for the business. Capital structure refers to the proportion of equity vs. debt financing that a firm utilizes to carry out its operations and grow.

Equity capital arises from ownership shares in a company and claims to its future cash flows and profits. Debt comes in the form of bond issues or loans, while equity may come in the form of common stock, preferred stock, or retained earnings. Short-term debt is also considered to be part of the capital structure.

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When analysts refer to capital structure, they are most likely referring to a firm's debt-to-equity (D/E) ratio, which provides insight into how risky a company's borrowing practices are. Usually, a company that is heavily financed by debt has a more aggressive capital structure and therefore poses a greater risk to investors. This risk, however, may be the primary source of the firm's growth.

Debt is one of the two main ways a company can raise money in the capital markets. Companies benefit from debt because of its tax advantages; interest payments made as a result of borrowing funds may be tax-deductible. Debt also allows a company or business to retain ownership, unlike equity. Additionally, in times of low-interest rates, debt is abundant and easy to access.

Equity allows outside investors to take partial ownership of the company. Equity is more expensive than debt, especially when interest rates are low. However, unlike debt, equity

does not need to be paid back. This is a benefit to the company in the case of declining earnings. On the other hand, equity represents a claim by the owner on the future earnings of the company.

Companies that use more debt than equity to finance their assets and fund operating activities have a high leverage ratio and an aggressive capital structure. A company that pays for assets with more equity than debt has a low leverage ratio and a conservative capital structure. That said, a high leverage ratio and an aggressive capital structure can also lead to higher growth rates, whereas a conservative capital structure can lead to lower growth rates.

Q19. What are the factors affecting an Entity's Working Capital Needs?

Main factors affecting the working capital are as follows:

(1) Nature of Business:

The requirement of working capital depends on the nature of business. The nature of business is usually of two types: Manufacturing Business and Trading Business. In the case of manufacturing business it takes a lot of time in converting raw material into finished goods. Therefore, capital remains invested for a long time in raw material, semi-finished goods and the stocking of the finished goods.

Consequently, more working capital is required. On the contrary, in case of trading business the goods are sold immediately after purchasing or sometimes the sale is affected even before the purchase itself. Therefore, very little working capital is required. Moreover, in case of service businesses, the working capital is almost nil since there is nothing in stock.

(2) Scale of Operations:

There is a direct link between the working capital and the scale of operations. In other words, more working capital is required in case of big organisations while less working capital is needed in case of small organisations.

(3) Business Cycle:

The need for the working capital is affected by various stages of the business cycle. During the boom period, the demand of a product increases and sales also increase. Therefore, more working capital is needed. On the contrary, during the period of depression, the demand declines and it affects both the production and sales of goods. Therefore, in such a situation less working capital is required.

(4) Seasonal Factors:

Some goods are demanded throughout the year while others have seasonal demand. Goods which have uniform demand the whole year their production and sale are continuous. Consequently, such enterprises need little working capital.

On the other hand, some goods have seasonal demand but the same are produced almost the whole year so that their supply is available readily when demanded.

Such enterprises have to maintain large stocks of raw material and finished products and so they need large amount of working capital for this purpose. Woolen mills are a good example of it.

(5) Production Cycle:

Production cycle means the time involved in converting raw material into finished product. The longer this period, the more will be the time for which the capital remains blocked in raw material and semi-manufactured products.

Thus, more working capital will be needed. On the contrary, where period of production cycle is little, less working capital will be needed.

(6) Credit Allowed:

Those enterprises which sell goods on cash payment basis need little working capital but those who provide credit facilities to the customers need more working capital.

(7) Credit Availed:

If raw material and other inputs are easily available on credit, less working capital is needed. On the contrary, if these things are not available on credit then to make cash payment quickly large amount of working capital will be needed.

(8) Operating Efficiency:

Operating efficiency means efficiently completing the various business operations. Operating efficiency of every organisation happens to be different.

Some such examples are: (i) converting raw material into finished goods at the earliest, (ii) selling the finished goods quickly, and (iii) quickly getting payments from the debtors. A company which has a better operating efficiency has to invest less in stock and the debtors.

Therefore, it requires less working capital, while the case is different in respect of companies with less operating efficiency.

(9) Availability of Raw Material:

Availability of raw material also influences the amount of working capital. If the enterprise makes use of such raw material which is available easily throughout the year, then less working capital will be required, because there will be no need to stock it in large quantity.

On the contrary, if the enterprise makes use of such raw material which is available only in some particular months of the year whereas for continuous production it is needed all the year round, then large quantity of it will be stocked. Under the circumstances, more working capital will be required.

(10) Growth Prospects:

Growth means the development of the scale of business operations (production, sales, etc.). The organisations which have sufficient possibilities of growth require more working capital, while the case is different in respect of companies with less growth prospects.

(11) Level of Competition:

High level of competition increases the need for more working capital. In order to face competition, more stock is required for quick delivery and credit facility for a long period has to be made available.

(12) Inflation:

Inflation means rise in prices. In such a situation more capital is required than before in order to maintain the previous scale of production and sales. Therefore, with the increasing rate of inflation, there is a corresponding increase in the working capital.

Q20. Briefly explain the types of financial services

India's diverse and comprehensive financial services industry is growing rapidly, owing to demand drivers (higher disposable incomes, customized financial solutions, etc.) and supply drivers (new service providers in existing markets, new financial solutions and products, etc.). The Indian financial services industry comprises several key subsegments. These include, but are not limited to- mutual funds, pension funds, insurance companies, stock-brokers, wealth managers, financial advisory companies, and commercial banks- ranging from small domestic players to large multinational companies. The services are provided to a diverse client base- including individuals, private businesses and public organizations.

10 Types of Financial Services:

1. Banking
2. Professional Advisory
3. Wealth Management
4. Mutual Funds
5. Insurance

6. Stock Market
7. Treasury/Debt Instruments
8. Tax/Audit Consulting
9. Capital Restructuring
10. Portfolio Management

These financial services are explained below:

1. Banking

The banking industry is the backbone of India's financial services industry. The country has several public sector (27), private sector (21), foreign (49), regional rural (56) and urban/rural cooperative (95,000+) banks. The financial services offered in this segment include:

- Individual Banking (checking accounts, savings accounts, debit/credit cards, etc.)
- Business Banking (merchant services, checking accounts and savings accounts for businesses, treasury services, etc.)
- Loans (business loans, personal loans, home loans, automobile loans, working-capital loans, etc.)

The banking sector is regulated by the Reserve Bank of India (RBI), which monitors and maintains the segment's liquidity, capitalization, and financial health.

2. Professional Advisory

India has a strong presence of professional financial advisory service providers, which offer individuals and businesses a wide portfolio of services, including investment due diligence, M&A advisory, valuation, real-estate consulting, risk consulting, taxation consulting. These offerings are made by a range of providers, including individual domestic consultants to large multi-national organizations.

3. Wealth Management

Financial services offered within this segment include managing and investing customers' wealth across various financial instruments- including debt, equity, mutual funds, insurance

products, derivatives, structured products, commodities, and real estate, based on the clients' financial goals, risk profile and time horizons.

4. Mutual Funds

Mutual fund service providers offer professional investment services across funds that are composed of different asset classes, primarily debt and equity-linked assets. The buy-in for mutual fund solutions is generally lower compared to the stock market and debt products. These products are very popular in India as they generally have lower risks, tax benefits, stable returns and properties of diversification. The mutual funds segment has witnessed double-digit growth in assets under management over the last five years, owing to its popularity as a low-risk wealth multiplier.

5. Insurance

Financial services offerings in this segment are primarily offered across two categories:

- General Insurance (automotive, home, medical, fire, travel, etc.)
- Life Insurance (term-life, money-back, unit-linked, pension plans, etc.)

Insurance solutions enable individuals and organizations to safeguard against unforeseen circumstances and accidents. Payouts for these products vary across the nature of the product, time horizons, customer risk assessment, premiums, and several other key qualitative and quantitative aspects. In India, there is a strong presence of insurance providers across life insurance (24) and general insurance (39) categories. The insurance market is regulated by the Insurance Regulatory and Development Authority of India (IRDAI).

6. Stock Market

The stock market segment includes investment solutions for customers in Indian stock markets (National Stock Exchange and Bombay Stock Exchange), across various equity-linked products. The returns for customers are based on capital appreciation – growth in the value of the equity solution and/or dividends – and payouts made by companies to its investors.

7. Treasury/Debt Instruments

Services offered in this segment include investments into government and private organization bonds (debt). The issuer of the bonds (borrower) offers fixed payments (interest) and principal repayment to the investor at the end of the investment period. The types of instruments in this segment include listed bonds, non-convertible debentures, capital-gain bonds, GoI savings bonds, tax-free bonds, etc.

8. Tax/Audit Consulting

This segment includes a large portfolio of financial services within the tax and auditing domain. This services domain can be segmented based on individual and business clients. They include:

- Tax – Individual (determining tax liability, filing tax-returns, tax-savings advisory, etc.)
- Tax – Business (determining tax liability, transfer pricing analysis and structuring, GST registrations, tax compliance advisory, etc.)

In the auditing segment, service providers offer solutions including statutory audits, internal audits, service tax audits, tax audits, process/transaction audits, risk audits, stock audits, etc. These services are essential to ensure the smooth operation of business entities from a qualitative and quantitative perspective, as well as to mitigate risk. You can read more about taxation in India.

9. Capital Restructuring

These services are offered primarily to organizations and involve the restructuring of capital structure (debt and equity) to bolster profitability or respond to crises such as bankruptcy, volatile markets, liquidity crunch or hostile takeovers. The types of financial solutions in this segment typically include structured transactions, lender negotiations, accelerated M&A and capital raising.

10. Portfolio Management

This segment includes a highly specialized and customized range of solutions that enables clients to reach their financial goals through portfolio managers who analyze and optimize investments for clients across a wide range of assets (debt, equity, insurance, real estate, etc.). These services are broadly targeted at HNIs and are discretionary (investment only at the discretion of fund manager with no client intervention) and non-discretionary (decisions made with client intervention).

Q21. How does one manage the receivables under working capital management?

A sale is realized as and when the invoice is generated but usually, a time period is provided to the customers for the payment of the amount due. This practice of conducting business on credit terms give rise to Accounts Receivable (AR) in the financial statements.

This credit facility is laid down to ensure a smooth flow of the working capital into the businesses. There are complexities involved with the accounts receivable i.e its management, the process of recording in financial statements, credit period etc.

The word receivable stands for the amount of payment not received. This means the company has extended credit facility to its customers. Accounts receivable is the money that a business has a right to receive after a certain period of time when the business has sold goods or services on credit.

For example, the accounts receivable is the record of fact that a company has done some work for customer X and that customer X owes money to the company. Generally, the credit period is short ranging from a month or two to a year.

The businesses usually have invested money in selling a product or delivering a service. After selling the goods, the inventories reduces and in turn businesses need an asset to balance the financial statements. Either that assets are cash-in-hand or receivables in case of credit sales and that's why accounts receivable appear in the assets side of the balance sheet. As accounts receivables form a major part of the organization's asset, it leads to the generation of cash in-flow in the books of the organization.

The idea behind providing a credit facility to the customers is to facilitate and ease the process of the transaction and establish a strong credit relation between the parties involved. It may lead to better deals or increase the chances of improving the working capital management.

An Account receivable management process involves the following :

- Credit rating i.e the paying ability of the customers shall be reviewed before agreeing to any terms and conditions
- Continuously monitoring any risk of non-payment or delay in receiving the payments
- Customer relations should be maintained and thus to reduce the bad debts
- Addressing the complaints of the customers
- After receiving the payments, the balances in the particular account receivable should be reduced
- Preventing any bad debts of the receivables outstanding during a particular period.

Q24. Explain with suitable example the concept & importance of Economic Order Quantity.

What Is Economic Order Quantity (EOQ)?

Economic order quantity (EOQ) is the ideal order quantity a company should purchase to minimize inventory costs such as holding costs, shortage costs, and order costs. This production-scheduling model was developed in 1913 by Ford W. Harris and has been refined over time. The formula assumes that demand, ordering, and holding costs all remain constant.

Key Takeaways

- The economic order quantity (EOQ) is a company's optimal order quantity for minimizing its total costs related to ordering, receiving, and holding inventory.
- The EOQ formula is best applied in situations where demand, ordering, and holding costs remain constant over time.
- One of the important limitations of the economic order quantity is that it assumes the demand for the company's products is constant over time.

Economic Order Quantity (EOQ)

Formula for Calculating Economic Order Quantity (EOQ)

The formula for EOQ is:

$$Q = \sqrt{\frac{2DS}{H}}$$

where:

Q = EOQ units

D = Demand in units (typically on an annual basis)

S = Order cost (per purchase order)

H = Holding costs (per unit, per year)

Importance of Economic Order Quantity

The goal of the EOQ formula is to identify the optimal number of product units to order. If achieved, a company can minimize its costs for buying, delivering, and storing units. The EOQ formula can be modified to determine different production levels or order intervals, and corporations with large supply chains and high variable costs use an algorithm in their computer software to determine EOQ.

EOQ is an important cash flow tool. The formula can help a company control the amount of cash tied up in the inventory balance. For many companies, inventory is its largest asset other than its human resources, and these businesses must carry sufficient inventory to meet the needs of customers. If EOQ can help minimize the level of inventory, the cash savings can be used for some other business purpose or investment.

The EOQ formula determines a company's inventory reorder point. When inventory falls to a certain level, the EOQ formula, if applied to business processes, triggers the need to place an order for more units. By determining a reorder point, the business avoids running out of inventory and can continue to fill customer orders. If the company runs out of inventory, there is a shortage cost, which is the revenue lost because the company has insufficient inventory to fill an order. An inventory shortage may also mean the company loses the customer or the client will order less in the future.

Example of How to Use EOQ

EOQ takes into account the timing of reordering, the cost incurred to place an order, and the cost to store merchandise. If a company is constantly placing small orders to maintain a specific inventory level, the ordering costs are higher, and there is a need for additional storage space.

Assume, for example, a retail clothing shop carries a line of men’s jeans, and the shop sells 1,000 pairs of jeans each year. It costs the company $5 per year to hold a pair of jeans in inventory, and the fixed cost to place an order is $2.

The EOQ formula is the square root of (2 x 1,000 pairs x $2 order cost) / ($5 holding cost) or 28.3 with rounding. The ideal order size to minimize costs and meet customer demand is slightly more than 28 pairs of jeans. A more complex portion of the EOQ formula provides the reorder point.

Limitations of EOQ

The EOQ formula assumes that consumer demand is constant. The calculation also assumes that both ordering and holding costs remain constant. This fact makes it difficult or impossible for the formula to account for business events such as changing consumer demand, seasonal changes in inventory costs, lost sales revenue due to inventory shortages, or purchase discounts a company might realize for buying inventory in larger quantities.

Q22. ABBC Company is considering an investment Project A with the expected cash flows as shown below:

Year	Project A (₹)
0	1000
1	1200
2	600
3	250
4	2000
5	4000

What is the NPV if the interest rate is 8%. What is the IRR of the Project? Should the company invest in the project?

Net present value (NPV) is the difference between the present value of cash inflows and the present value of cash outflows over a period of time. NPV is used in capital budgeting and investment planning to analyze the profitability of a projected investment or project. NPV is the result of calculations used to find today's value of a future stream of payments.

$$NPV = \sum_{i=1}^{n} \frac{Cash\ Flow_i}{(1+r)^i} - Initial\ Investment$$

$$\text{NPV} = \frac{1200}{(1+0.08)^1} + \frac{600}{(1+0.08)^2} + \frac{250}{(1+0.08)^3} + \frac{2000}{(1+0.08)^4} + \frac{4000}{(1+0.08)^5} - 1000$$

NPV = ₹ 5016.36

A positive NPV indicates that the projected earnings generated by a project or investment—in present rupees exceeds the anticipated costs, It is assumed that an investment with a positive NPV will be profitable.

The internal rate of return (IRR) is a metric used in financial analysis to estimate the profitability of potential investments. IRR is a discount rate that makes the net present value (NPV) of all cash flows equal to zero in a discounted cash flow analysis.

Equating NPV = 0 to find the IRR in Above equation

$$0 = \text{NPV} = \frac{1200}{(1+IRR)^1} + \frac{600}{(1+IRR)^2} + \frac{250}{(1+IRR)^3} + \frac{2000}{(1+IRR)^4} + \frac{4000}{(1+IRR)^5} - 1000$$

IRR = 1.03042

The internal rate of return (IRR) is 103.042 %

Q24. The shares of Armstrong company has the following anticipated returns with associated probabilities:

Return (%)	–20	–10	10	15	20	25	30
Probability	0.05	0.10	0.20	0.25	0.20	0.15	0.05

Calculate the expected rate of return and risk measures in terms of variance & standard deviation.

The expected return is the profit or loss that an investor anticipates on an investment that has known historical rates of return (RoR).

$$\text{Expected Return} = \Sigma (\text{Return}_i \times \text{Probability}_i)$$

$$\text{Expected Return} = (-20 \times 0.05) + (-10 \times 0.10) + (10 \times 0.20) + (15 \times 0.25) + (20 \times 0.20) + (25 \times 0.15) + (30 \times 0.05)$$

Expected Return = 13 %

FINANCIAL MANAGEMENT

Mean = Sum of all return value / no. Total Return value

Mean = (-20-10+10+15+20+25+30 / 7)

Mean = 10

Return Value (x)	Mean Value ($\bar{x}$)	($x - \bar{x}$)	($x - \bar{x}$)^2
-20	10	-30	900
-10	10	-20	400
10	10	0	0
15	10	5	25
20	10	10	100
25	10	15	225
30	10	20	400

$\sum (x - \bar{x})^2 = 2050$

$$\text{Variance} = s^2 = \frac{\sum (x - \bar{x})^2}{n-1}$$

(n is no. of return values)

Variance = 2050 / 7 -1

Variance = 341.667

$$\text{Standard Deviation} = \sqrt{Variance} = \sqrt{\frac{\sum (x - \bar{x})^2}{n-1}}$$

Standard Deviation = $\sqrt{341.667}$

Standard Deviation = 18.4842