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21st Century Skills
for Youth in India

Student Handbook

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This handbook has been developed by UNDP in collaboration with Leap Skills for Project Code Unnati, supported by SAP Labs India.

Foreword

Dear Students,

Congratulations on taking the first step to becoming future ready!
Do you want to know how you will become future ready? Ask yourself:- What is the most crucial thing you need to have a successful career? Education? Degree? Knowledge? Experience? If you ask an employer or a successful employee, they will all tell you that the most valuable asset a student can have is Skills. It is always skills that pave a way for a bright future.
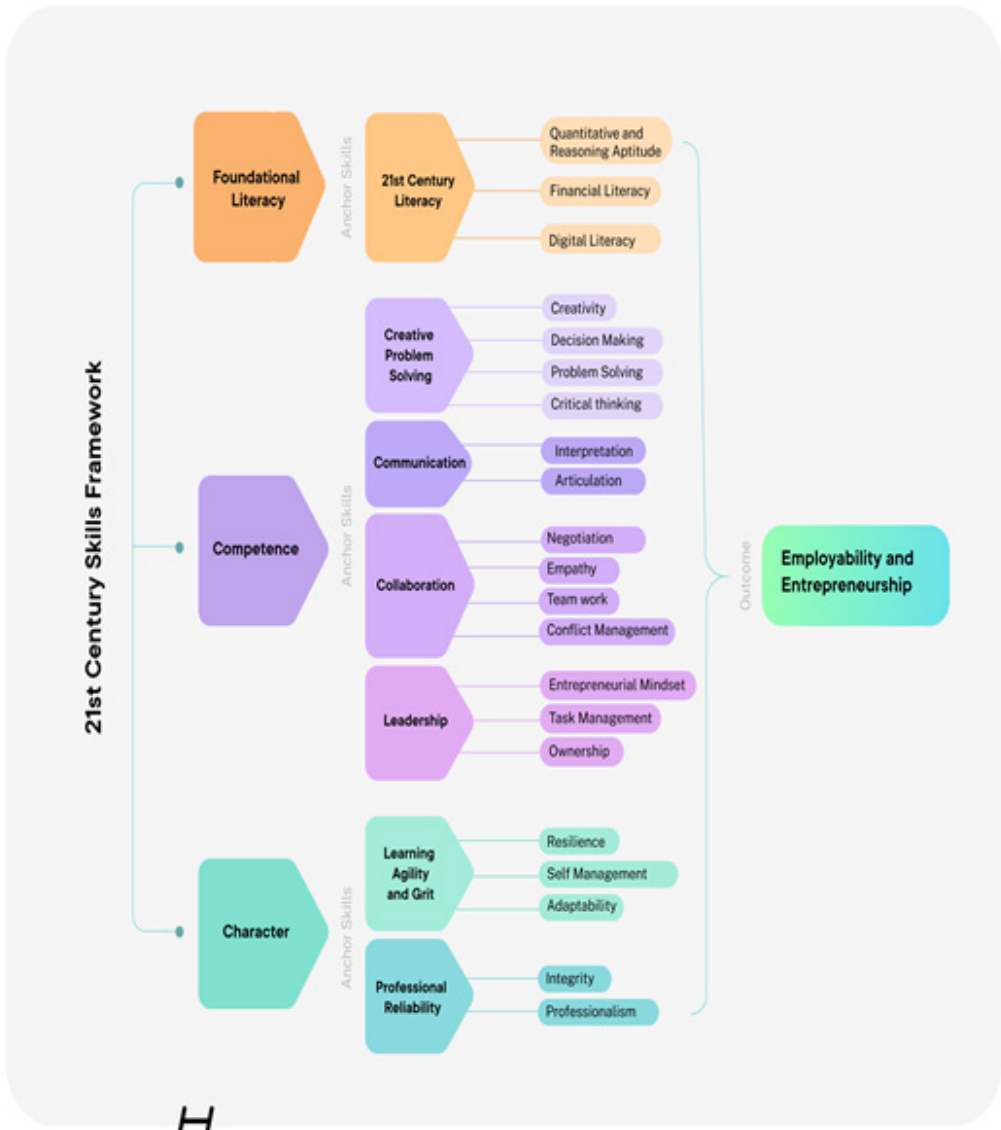
India is a young nation where every year lakhs of students graduate. Most of them have Degrees, Knowledge, some of them even have Experience. So what makes them different from each other? Why a student gets selected for a job earlier than his/her batch mates? Why someone succeeds to start a business and others just sit with ideas for long? What do people like you need to compete in today's world. The answer to all these questions is "Skills".

Skills are learned abilities that come with a combination of knowledge (literacies), competence and character qualities. The best part is that you can learn any skill at any point of your life. You are never late to learn a new skill!

About the Framework and Curriculum

This book is the result of an effort by UNDP (United Nations Development Programme) India to standardised 21st century skills relevant for youth of India. With the help of industry and domain experts, UNDP has developed a framework that defines 21st century skills and provides a pathway to the entire skills and education eco-system to make our youth ready for both employability and entrepreneurship.

With the base of CPA Framework i.e. Concept, Practice, and Assessment, this curriculum is designed to give you educator's support through trainer led sessions and flexibility of learning the concept on their own with the help of concept handbook. While enjoying the activity based learning, project based learning, mentorship support by trainers, opportunities of peer learning, you will get closer to the outcomes of Employability & Entrepreneurship. You will find yourself more confident and skilled at the end of this course. This framework is designed to elevate your knowledge and skills. You will have a perfectly balanced growth in various anchor skills like communication, problem solving, leadership, collaboration, and more.

21st Century Skills Framework

Foundational Literacy
- Anchor Skills: 21st Century Literacy
  - Quantitative and Reasoning Aptitude
  - Financial Literacy
  - Digital Literacy

Competence
- Anchor Skills:
  - Creative Problem Solving
    - Creativity
    - Decision Making
    - Problem Solving
    - Critical thinking
  - Communication
    - Interpretation
    - Articulation
  - Collaboration
    - Negotiation
    - Empathy
    - Team work
    - Conflict Management
  - Leadership
    - Entrepreneurial Mindset
    - Task Management
    - Ownership

Character
- Anchor Skills:
  - Learning Agility and Grit
    - Resilience
    - Self Management
    - Adaptability
  - Professional Reliability
    - Integrity
    - Professionalism

Outcome: Employability and Entrepreneurship

Process:
- Flipped Classroom Model (trainer led sessions & concept handbook)
- Focused on Engagement and Outcomes
- Concept, Practice and Assessment Framework

• Foundational Literacy

How students apply core skills to everyday tasks. These include a set of finite sets of knowledge that learners must build on.

21st century literacy skills

New era literacies to work as enablers for creating competencies. It builds ability to reason correctly. It includes Quantitative and Reasoning Aptitude, Financial Literacy (the basics of banking, investment, savings, sources of funds, management of funds), and Digital Literacy (ability to use digital technology, communication tools and networks)

• Competencies

These are important skills that indicate how learners approach problems. These skills help build other skills and convey knowledge

Creative Problem Solving

Ability to come up with novel ideas and ways of doing things. It includes Creativity, Decision Making, Problem Solving, Critical Thinking.

Communication

Ability to articulate, interpret and share thoughts and ideas well using the appropriate nonverbal and verbal language.

Collaboration

Ability to work effectively and respectfully with diverse teams towards a common goal. It includes Empathy, Team Work, Negotiation, Conflict Management

Leadership & Result Orientation

A leader takes initiative, has competence to plan and lead by action. A good leader can use the communication and collaboration skills to get results.

• Character Qualities

These are skills developed through habits and contribute to how learners interact with their environment, other people and situations. These are life-skills that affect the values, beliefs, behavior of a person.

Learning Agility & Grit

Learning Agility is the ability to strive for continuous learning through evaluation, reflection and challenges. It includes the ability to show resilience by improvising and making meaning out of obstacles. A person with grit is perseverant and will continue to put in efforts to achieve long term goals even in the face of adversity. It includes Self-evaluation, Goal setting, Stress Management, Anger Management.

Professional Reliability

It is the ability to independently manage time and work without the need for oversight. A person with this instinct is punctual, positive, integrous and enthusiastic about work. It's the ability to set and achieve milestones in a consistent and organized manner.

What's Inside this book!

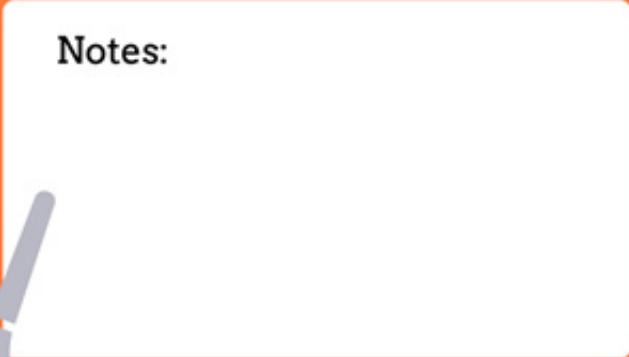This handbook is equipped with detailed study material for each lesson.

Here are key features of this handbook:-
- The handbook has lessons on the modules mentioned in the framework
- Each lesson aims to help you with the concept so you can utilise your classroom time for practice through activities. Hence, it's advised that you read the concepts mentioned in the lesson before going to the class
- Most of the lessons have 5 quiz questions at the end with answer key. You are advised to take the quiz honestly after reading the lesson and then check the answer key
- If you find any concept difficult to understand, ask for some time from your trainers to help you understand that concept better
- This handbook will support you in the learning process but doesn't guarantee that you will learn the skills in the absence of trainer-led sessions. Hence, don't miss the sessions to experience peer learning and trainer's guidance

Here is a tiny task for you!!
Before beginning the session fill in the checklist of the skills you already have. Once done, be a part of this exciting 21st Century Skill Development journey. On the last day of the session again fill up the checklist of the new skills you acquired during this time frame.

Skills you already have!

☐ _____
☐ _____
☐ _____
☐ _____
☐ _____

Skills you acquired after 21st Century Skills Framework!

☐ _____
☐ _____
☐ _____
☐ _____
☐ _____

Sessions you loved the Most:

☐ _____
☐ _____
☐ _____
☐ _____
☐ _____

Notes:

UNDP 21st Century Skills

We hope that this curriculum will help you get closer to your Employability and Entrepreneurship goals and will make you future-ready.

Happy Learning!

Message from Ms. Nadia Rasheed, Deputy Resident Representative, UNDP India

We are living in an era where degrees and trainings are not always sufficient for ensuring job security and a bright economic future. Success in the job market increasingly depends on acquiring skills beyond an academic degree and continuing to develop and evolve these skills. Supporting skills development to help prepare young people for the job market is an important area of focus for UNDP in India. UNDP's 21st Century Skills Curriculum is aimed at building competencies and boosting confidence to enable women, men, and youth to navigate challenges and opportunities in today's job market.

This curriculum has been developed through the effort and valuable time of numerous individuals. It is intended to be student-centric and forward looking, with a teaching methodology that provides space for innovation and experiential learning. In addition to strengthening academic knowledge by enhancing numeracy and digital skills, the curriculum is aimed at honing life skills and building communication and leadership traits.

The curriculum also incorporates activities, games, tasks, and performances, to encourage an enjoyable learning process and experience. I hope that young people in India will benefit from this carefully structured and designed curriculum to enhance and advance their 21st century skills.

Nadia Rasheed
Deputy Resident Representative
UNDP India

Message from Gunjan C. Patel, Regional Director and Head of CSR

I share my heartfelt congratulations to the UNDP team for successfully launching the 21st Century Skills Curriculum for the budding future of our nation. This reinforces and aligns well with SAP's mission of Powering opportunity through Digital Inclusion.

It was a long-demanded notion of skill development for the young generation of the rural belt of India. This eventually deprived them of opportunities and growth. As time passed, this void of employment & entrepreneurship increased as compared with the metropolitan cities.

As per the reports from various sources, more than 60% of the population resides in the rural part of India, urging the need to upskill the youth from the unexplored sector. With the booming education sector in India, we are still far away from catering to the needs and demands of the corporate sector through school & college education.

The 21st Century Skills Curriculum will not only benefit the youngsters with instilling new skills but will also make them self-sufficient, digitally skilled, and imbibe leadership skills that cannot be acquired through books or class. These are truly experiential and pragmatic.

Gunjan C. Patel
Regional Director and Head of CSR,
SAP Indian Subcontinent,
SAP Labs India Private Limited

Message from Amit Kumar, Head, Inclusive Growth

We, in the UNDP, believe that young people have the skills to change the world. They are the trustees of prosperity. But, sometimes they need a bit of help.
I hope this 21st-century Skills curriculum offers the much needed help to the young men and women in India in achieving their goals by providing a platform to imbibe the essential skill-sets.
The power of youth is dynamic in nature and most skills and orientations are obtained in this age. Undoubtedly, skill development is imperative and skill enhancement of youth acts as a catalyst in their journey towards success.

I truly believe that the success of India's youth has the power to transform the entire world. UNDP India's youth initiatives are all based around this belief. The launch of 21st Century Skills has helped us unravel the opportunity and growth for young Indians. Its content is specifically designed with several brainstorming sessions and validation from organizations, trainers, and students. Students after successful completion of this Module will have overall knowledge and skills in the domains of Finance, Entrepreneurship, Life Skills, Aptitude, and Digital Literacy.

The module is framed in a way to pave a successful path for students with various aspirations. I hope that this will strengthen the core requirements and help them achieve greater heights.

All the best.

Amit Kumar
Head, Inclusive Growth
UNDP India

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Session 2

Professional
Reliability

Values and Ethics

Values and Ethics

What are Values and Ethics?

Values are our basic beliefs that motivate our attitude and actions. Values help us to classify what is important for us in our life. In a narrow sense values are something that is good, desirable and worthwhile.
Ethics on the other hand are moral principles that govern the person's behavior.

Ethics are mainly based on virtues, rights, and obligations. For example, the obligation to refrain from crimes, killings, and rape is an ethical aspect.
Work Ethics are values and attitudes that individuals possess which allow them to make decisions and perform their duties with positive moral values that include elements like integrity, responsibility, high quality, discipline, humility and teamwork.

Source: ethicssage.com, Byjus.com
Image Source: https://www.scu.edu/mobi/resources--tools/blog-posts/ethics-in-life-and-business/ethics-in-life-and-business.html

Difference between Ethics and Values

Ethics

Ethics refers to a system of moral principles

Ethics aligns with a professional setup

Ethics will be consistent within a professional setup but would vary between 2 different organisations or institutions.

Ethics are determined by an institution, organisation and varied professions. Ethics that are followed by medical professionals will be different from ethics followed in the public administration domain

Ethics could act as a constraint. The action that needs to be taken in an organisation could be consistent with the values of a person, however, there could be chances that it cannot be executed as it may not align with the ethical standards of the profession, organisation or institution.

Values

Values are associated with the thought process, a person's sense of what is wrong and what is right.

Values are associated with personal aspects of a person

Values vary from person to person, it need not be consistent.

Values formed in a person are usually determined by family values, religion, culture, community etc.

Values could act as a catalyst for the necessary motivation in a person.

Source: ethicssage.com, Byjus.com
Image Source: https://www.scu.edu/mobi/resources--tools/blog-posts/ethics-in-life-and-business/ethics-in-life-and-business.html

What: Work Ethic Self Quiz

When: During Session

How: Read the question carefully and tick-mark on one of the 5 responses.

Dependability:
Are you reliable?

Never

Rarely

Sometimes

Usually

Always

Can people count on you?

Never

Rarely

Sometimes

Usually

Always

Do you follow rules?

Never

Rarely

Sometimes

Usually

Always

Responsibility:
Do you honor your word?

Never

Rarely

Sometimes

Usually

Always

While working, do you ever do other things?

Never

Rarely

Sometimes

Usually

Always

Honesty:
Are you true to the promises you make?

Never

Rarely

Sometimes

Usually

Always

Are you loyal?

Never

Rarely

Sometimes

Usually

Always

Level of rigor:
Are you a hard worker?

Never

Rarely

Sometimes

Usually

Always

Do you work to your highest potential?

Never

Rarely

Sometimes

Usually

Always

Level of initiative:
Do you do work that is not required of you?

Never

Rarely

Sometimes

Usually

Always

Do you do your job well and leave, or do you offer more of yourself, free of charge?

Never

Rarely

Sometimes

Usually

Always

What: Work Ethics Action Scenarios

When: During Session
How: Read the following scenarios, analyse the subject's work ethics and share your response.

Rahul

Rahul wanted to earn extra money, so his parents helped him get a job of delivering papers. He had to wake up early in the morning at 5 AM to fold the newspapers. He would then pack them in the sack on his bike and ride around the neighborhood, throw the paper on driveways. A few times the paper landed on the wet grass. He knew he should probably return to the house and place the paper on the driveway but at the same time he figured out that he could always pretend that he didn't notice- especially if no one complained. Rahul really didn't like the job, but he forced himself to do it every morning. About three months into the job , he decided it wasn't the worth of extra money. He told his boss that he wanted to quit, but offered to complete the last week of the month because he knew they would have to find a new delivery person.

What do you think about Rahul's work ethics, explain your response:

_____

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Reema

Reema's college was organising a fun activity day. She volunteered to run a booth where people could buy pencils and win prizes if their pencil had a code written on it.. She arrived early, set up her booth beautifully and packed all the pencils well. She wrote on the booth board that "come, buy a pencil at Rs. 20 and win a prize if you get lucky to get a coded pencil". Everyone who paid Rs.10 would get to choose a pencil from the display. If the pencil chosen had a code written on it, the person would win a prize. Reema did a great job running the booth. She carefully collected and stored the money and gave out prizes accordingly. Her friend Savita came up to the table while she was working. There was a long line of people waiting, but Reema wanted to chat with Savita while she worked, which was not easy to do. As they finished talking, Savita asked if she could have a pencil. Reema told her that she needed to pay Rs. 20. Savita handed over Rs.20 and grabbed a pencil. The boy at the front of the line complained, "Hey, that's not fair, she didn't wait in line" Reema told him she would give him a prize if he didn't tell anyone. She showed him where one of the pencils with the code was, and sent him off with a prize.

What do you think about Reem's work ethics, explain your response:

_____

_____

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_____

Sunil

Sunil started his own business trimming lawns in his neighborhood. He trims the lawn at three houses on Saturdays, but he really hopes to get more customers. On Wednesday evening, Sunil's mother escorted him from door to door, where he introduced himself, offered his services, and left each neighbor with a piece of paper he had made with his name and phone number. That Friday, two more neighbors called to hire him to trim their lawns. On Saturday, he woke up early and completed trimming the lawns of all five houses. Sunil noticed that one of his customers, Mrs Verma, had a flower bed full of weeds. After he finished trimming her lawn, he spent an extra half hour pulling the weeds out of her garden. When she was paying him for trimming the lawn, she noticed the work he had done on her flowerbed. She was so pleased, she offered him an additional amount of money but Sunil politely refused, stating that it was all just part of the job.

Analyse the work ethics of Sunit, explain your Response:

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

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Session 3

Learning Agility & Grit

Self Awareness

Self Awareness

- You might be often asked during interviews what are your strengths and weaknesses, you will be able to answer these questions only when you know about yourself well.
- Being self-aware is a habit that you can develop with practice.

What are strengths?

Your positive skills and positive character traits are considered as your strengths. This can be in the form of knowledge, talent and skills.

What are weaknesses?

Weakness is just the opposite, it can be those skills or traits which are often considered negative or undeveloped.

Self Awareness can result from Self-Evaluation and by taking feedback from others.

Img Source: https://sliwainsights.com/
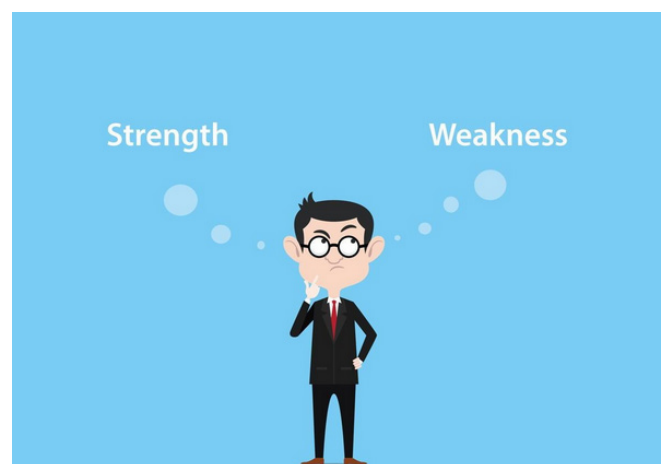
Self-evaluation

Use this table in the practice activity in trainer's guidance.

My Strengths	My Weaknesses

Taking feedback from others

Story of Saho

(This story will be discussed in session by your trainer)

Saho was an honest and hardworking guy. He always had a big smile on his face with a joyful nature. One fine day Saho went to a PCO booth and dialed a number.
As soon as the phone connected, Saho said,

"Hello? Hello Sir, Namaste I have heard that you need a driver, I am also a driver. Can you please appoint me as a driver for you"?

The man from the other end replied,

"We already have a driver and we don't need a new driver now"

To this, Saho Replied

"Sir, I am a good driver and also an honest man. I am ready to work for you even at a lower salary you give to your present driver"

Img Source: https://sliwainsights.com/
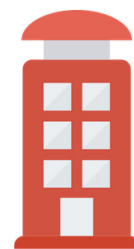
The man said, "We are very satisfied with the driver who is presently working with us. It's not a matter of money, the type of driver we want we already have him so we don't need a new driver"

Saho insisted, "Sir, I'll also do various other odd jobs at your home apart from driving, like getting vegetables from the market, picking up children from school and any other work. I assure you that I won't give you a chance to complain. Please give me an opportunity"

The man got furious and said, "I already said to you we don't need a driver" and disconnected the call.

The owner of PCO Booth was hearing the conversation. He said to Saho, "My son is working in an MNC at a very high post. He needs a driver if you wish I can refer you to him"

Saho replied, "Thank you so much for the offer, but actually I don't need any job"

The booth owner was perplexed. He said, "I just heard you begging for a job on call. What happened to you now? Since now you are getting a job easily, you are throwing tantrums."

Saho politely replied, "Please don't take me wrong, I really don't need a job. Actually, I was testing my own work! I am the driver who is working at that man's place"

Do you want to know why Saho called this person and why he rejected the job? Your trainer will discuss this story in the Self-Awareness session.

Use these tables when your trainer asks you to.

1.   From Family
Name of Family Member: _____
My Relation with this Family Member: _____

My Strengths	My Weaknesses

2.   From Teacher
Name of Teacher: _____
Designation and Institute of thisTeacher: _____

My Strengths	My Weaknesses

Img Source: https://sliwainsights.com/

3.   From Friend
Name of Friend: _____

My Strengths	My Weaknesses

Friends, to live a successful life, it's extremely important for us to understand ourselves very well. We should be able to recognize our weaknesses and work on them as soon as possible. Self-Evaluation is an extremely important concept to self-analyze ourselves in the correct way and to know our strengths and weaknesses. With judicious self-evaluation we can mark great success not only in our professional life but on various fronts like personal and social.

Img Source: https://sliwainsights.com/

Goal Setting

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Session 4

Learning Agility & Grit

Goal Setting

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Goal Setting

"If you set goals and go after them with all the determination you can muster,
your gifts will take you places that will amaze you"
-     Les Brown

Read and think:

Have you played or seen a football match? What will happen if someone removes
the goal post? Will the match be still exciting?
If you have to travel from Agra to Delhi, we will book a bus or a train. So we will
know the departure time, departure station, what route it will take and when it will
reach, so we plan thoroughly about our journey. Isn't life a very big journey like
that, but most of us don't plan for that?

What is Goal Setting?

Goal setting is a process to identify something you wish to accomplish and cre-
ate various objectives and steps that will help you to achieve it. In our journey of
life, Goal Setting helps us to analyze how far we have come and how far we can
go.

SMART Goals:

When you set your goals, ask yourself these questions-
Where am I now?-
Where do I want to get to?
What are my next steps? Who can help me?
How will I know when I have achieved my target?
What is the timing of these targets and action points?

hese questions will help you decide SMART goals.

Specific
Measureable
Achievable
Relevant
Timely

A SMART goal is a carefully planned, clear and trackable objective. It stands for **Specific, Measurable, Achievable, Relevant and Time-Based.**

S = Specific
Be as clear and specific as possible with what you want to achieve. For example, You are a tech graduate and want to join a start-up, instead of saying "I want to enter the startup world" you might say, "I want to earn a position managing a development team for a start-up tech company."

M = Measurable
What evidence will prove you're making progress towards your goal? For example, if your goal is to earn a position managing a development team for a start-up tech company, you might measure progress by the number of management positions you've applied for and the number of interviews you've completed. Setting milestones along the way will give you the opportunity to re-evaluate and course correct as needed. When you achieve your milestones, remember to reward yourself in small but meaningful ways.

A = Achievable
Using the above example of earning a job managing a development team, you should know the credentials, experience and skills necessary to earn that position. Before you begin working towards a goal, decide whether it's something you can achieve now or whether there are additional preliminary steps you should take to become better prepared.

R = Relevant

When setting goals for yourself, consider whether or not they are relevant. Ask yourself why the goal is important to you, how achieving it will help you and how it will contribute towards your long-term goals.

T = Time-based

For example, if your goal is to earn a promotion to a more senior position, you might give yourself six months. If you haven't achieved your goal in that time-frame, take time to consider why.

Example

I will obtain a job as a primary school Hindi teacher within three months after graduating with my Bachelor in Education.

- Specific: The goal of becoming a Primary school Hindi teacher is well-defined.
- Measurable: Success can be measured by the number of applications, interviews and job offers.
- Achievable: The goal setter will have the appropriate degree for the job.
- Relevant: The goal setter is planning to get a job in the education industry after getting an education degree.
- Time-based: The goal setter has set a deadline to achieve their objective within the three months following graduation.

Activity: Practice

Fill this table with trainer's guidance

My Specific Goal?	
How will I measure my progress?	
Is this achievable?	
How is this goal relevant to me?	
What is the timeline	

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Session 6

Digital Literacy (21ˢᵗ Century Literacies)

Basic Functions of Devices
(Computers and Smartphones)

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Basic Functions of Devices (Computers and Smartphones)

Computer:

A computer is an electronic device that accepts inputs, performs functions at high speed and gives output instantly.
Input Devices: Keyboard, Mouse, USB Port
Output Devices: Monitor, Printer

Basic Parts of a Computer:

Monitor (the screen of your computer),
Keyboard (A device through which you can input text and data in computer),
Mouse (To navigate from various features on screen),
CPU i.e. Central Processing Unit (The Brain of Computer).

Laptop:

A laptop is nothing but a portable PC.
Basics of a laptop:
- Screen
- Keyboard
- Touchpad
- Power Button
- AC Power Input
- CPU Cooling Fan

Source: techterms.com/

Switching On the laptop:

Few laptops have an auto switch on feature (MacBook) as soon as you lift the screen, others have a power button in the keyboard.

Switching OFF the laptop:

Broadly there are four ways to shut off your computer:

1. Shut Down: This is a power off state mode we all are familiar with, here the PC almost has no power.
2. Sleep: The PC enters in a low power state, and when you turn it back on it will get back to life quickly. Usually people use this feature when they have to take a short break.
3. Hibernate: Hibernate is the same as sleep function with only difference of longer time to get back to life and uses much less power than sleep.
4. Hybrid: This mode is suitable for desktops and not laptops. This is a combination of both sleep and hibernate with best features like low power consumption and faster restart.

Switching On and Switching Off a Computer :

Click on the power button present at the CPU. Wait for a few seconds and the computer will start automatically. Put in the password (if any) and you are ready to use it. Once done make sure all the files are saved and no processor is running in the background. To switch off the computer click on the start button on windows and select shutdown.

Shortcut: Click on Windows Logo Key on your keyboard   or   + X

Operating System: Windows vs macOS

The biggest difference is the software and user experience.
Windows is the most widely used OS. On the other hand MacOS has its own environment with seamless connection to other apple products.

Launch year: Windows was launched in 1985, Mac was launched in 2001.
Usage: Windows is most widely used as compared to Mac.
Power Button: We have a Power Button in windows while Mac doesn't have any power button.
Storage Space: Windows gives you the liberty to expand your storage space while that is missing in Macbook.
Virus: Windows are more prone to virus while mac is more safe, even if connected with a virus infected device.
Any other operating system apart from Windows & Mac?
LINUX

Source: techterms.com/

Windows	macOS
MS Word	Pages
MS PowerPoint	Keynote
MS Excel	Number

Digital Etiquette:

Do you remember those school days when we were asked to remove our shoes outside the computer lab so that the computers don't get infected with a virus. It was indeed a myth but the etiquette was followed widely. That was the era when digital education was in its juvenile phase. Even in the 21st Century, it is very crucial for us to follow the basic digital etiquette.

Basic Rules to follow in lab:

- Don't move the monitor, CPU or Keyboard from their place.
- Don't change the cables.
- Avoid bringing food and drink items in a lab.
- If you encounter any problem don't try to fix yourself. Inform your teacher or lab attendant.
- Do not change the default settings of the computer.
- Never change or add a password to your computer in the lab, you can do it on your personal computer/laptop.

Smartphone

- A smartphone is a mobile phone that includes advanced functionality beyond making phone calls and sending text messages. Most smartphones have the capability to display photos, play videos, check and send email, and surf the Web. Modern smartphones, such as the iPhone and Android based phones can run third-party applications, which provides limitless functionality. While smartphones were initially used mostly by business users, they have become a common choice for consumers as well. Thanks to advancements in technology, modern smartphones are smaller and cheaper than earlier devices. The camera in smartphones are much better today than in the past with increased camera Megapixels (MP) and RAM (Random Access Memory) that has directly increased the performance of smartphones.

Source: techterms.com/

Basic Features of Smartphone:

- Internet Access
- Communication
- Social Media
- Health & wellness tracking
- Mobile payments
- Picture & Video Editing
- Mobile Payments

Android Vs iOS:

They are basically an Operating System of a smartphone. Android is run by Google and iOS is run by Apple. They have virtual assistants such as Google Assistant and Siri respectively.

Processor:

It is also called the chipset which is the heart and soul of the Smartphone. Every action you do on a smartphone, say opening WhatsApp this goes directly to the processor and the processor gives the visual output all within a fraction of seconds.
"Processor is nothing but the brain of the smartphone"
Some processors you must know:

- Apple A14 Bionic
- Snapdragon 888 Qualcomm
- Exynos 2100 Samsung

According to the data of Stastista.com India has over 760 million smartphone users. We all know the basic functions of Smartphones however you should follow the below mentioned etiquettes while using smartphones:

- Never use your smartphone while charging.
- Keep your smartphone on silent mode while attending lectures, training or formal events.
- Avoid clicking unknown links you may receive on text messages or various other messaging apps.
- Make sure to remove all the background apps when not using your smartphone.

Source: techterms.com/

Activity 1: Features of Smartphone

When: during the session
How: Write 10 basic features of smartphones that you use and like the most

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

Activity 2: My Computer

When: during the session
How: Use this space below to draw and describe your computer.

Activity 3: Buying a laptop

When: during the session
How: find the best laptop that you would like to buy in the assigned budget

Account balance: Rs. 30,000

Laptop Price: _____

_____

To be purchased from: _____

_____

Features: _____

_____

_____

_____

Reason to Purchase (Brief):

_____

_____

_____

_____

_____

_____

Activity 4: Debate "Windows Laptops vs MacBook laptops"

When: during the session

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

Quiz:

1. Which of the following is an output device?

a. Mouse

b. Keyboard

c. Pen Drive

d. Monitor

2. Which of the following is not an Operating system in a Smartphone?

a.Android

b. Windows

c. Oxygen

d. Nitrogen

3. What is the name of a virtual assistant in Apple Phones (iOS)?

a. Miri

b.Chiri

c.Siri

d. Diri

4. When you read the statement that "A Smartphone has a 48 MP camera", what does MP stand for?

a.Multipixel

b. Megapixel

c. Masterpixel

d. Minipixel

5. What is the full form of RAM ?

a. Rotational account memory

b. Random access memory

c. Random artificial memory

d. Router access memory

Answer: 1-d, 2-d, 3-c, 4-b, 5-b

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Session 7

Digital Literacy
(21ˢᵗ Century Literacies)

Using Mobile Applications

UNDP

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Using Mobile Applications

Mobile Applications:

Mobile application which is commonly called as an App, is a software that is
designed to run on Mobile.
These are installed in the mobile through App Store (iPhone) and Play Store
(Android) or inbuilt in smartphones which come with limited functionality like
calculator, Weather, Chat, Mobile Web Browsing etc.
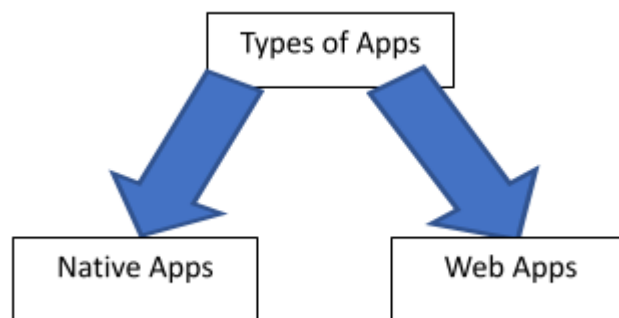
Native Apps:

Native Apps are built for a specific mobile operating system (iOS or Android)
they usually have better performance and more finely tuned UI.

Source: www.techopedia.com/
https://www.paymentsjournal.com/5-mobile-payment-security-concerns-to-consider/
https://blogs.quickheal.com/9-security-tips-using-mobile-payment-apps/

Web Apps:

- Web apps are used in HTML5 or CSS and require minimum device memory since they're run through a browser. The user is redirected on a specific web page, and all information is saved on a server-based database. Web apps require a stable connection to be used.

Source: www.techopedia.com/
https://www.paymentsjournal.com/5-mobile-payment-security-concerns-to-consider/
https://blogs.quickheal.com/9-security-tips-using-mobile-payment-apps/

Activity 1: Guess the App

When: During the session

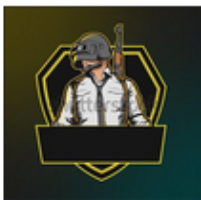How: Guess the Mobile Applications based on the logos given below. Write the name of the application in the blank space

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

_____

Source: www.techopedia.com/
https://www.paymentsjournal.com/5-mobile-payment-security-concerns-to-consider/
https://blogs.quickheal.com/9-security-tips-using-mobile-payment-apps/

Downloading apps in Android

We find various kinds of Apps on the google play store of Android devices. First you have to go to the apps section of your smartphone. Open Google play store. Here you can search your app through multiple ways:`

Via Search Icon

Tap on the magnifying glass and type the name of the app.
E.g. Search WhatsApp Messenger and now click go. You will get a list of matching apps. Few apps which are paid will reflect the price. Tap on the desired app and this will give you details about the app such as basic information, version, rating and reviews. You can decide whether to install the app or not based upon the reviews and ratings.

To Download the app, Click on Install. Then select "accept and download". Once installed select open to access the app.
For paid apps, you will have to make the payment first

Via Keywords

Sometimes you don't know the name of an App. Then you can also search on the basis of keywords.

E.g. If you type messaging apps, you will get a list of relevant apps. Tap and download the desired app from the search results.

Via Categories

You can also search the app based upon the type and use of the app. Tap on Apps and then click categories. You'll get a list of categories like Heath & Fitness, Entertainment, Games etc. choose the category of your choice and get all the relevant apps. You can also use the further filter to segregate between paid and free apps.

Source: www.techopedia.com/
https://www.paymentsjournal.com/5-mobile-payment-security-concerns-to-consider/
https://blogs.quickheal.com/9-security-tips-using-mobile-payment-apps/

Activity 2: Payment Apps

When: during session

How: Download and install any 1 mobile app that can be used to make online payment. After you are done, write the steps you use here:-

Digital Security

Are mobile payments secure? This question emerged to every mind when online shopping and mobile payment came into the market. The flexibility and convenience levels it has come up with has made it trendier among the mobile users. The mobile payment options are rapidly replacing the outmoded payment options allowing the customers to make payments or complete transfer transactions through technologies like Android Pay, Samsung Pay, Apple Pay, Paytm wallets, and many more. However, when it comes to the security of making mobile payments, there are some loop falls.

5 Mobile Payment Security Concerns to Consider

1) Multiple Software Options

Similar to laptops and desktops, mobile phones are also working on various hardware and software systems. There are still some people who are using the old versions of iOS and Android globally. And this can lead to various security issues. The devices are not well supportive of the latest mobile security technologies which attract the hackers and fraudsters for exploiting and attacking.

Some of the examples of a secure mobile device include verification codes to mobiles or emails, face scanners, fingerprint scanner, geofencing, voice recognition, etc. Hence, look for a smartphone with advanced features regarding the software and hardware for an end to end protection of your payments and accounts.

2) Lost phone

Today, smartphones are similar to credit cards. It contains all the necessary details like the contact information, names, personal collection of photographs, social media connections, and whatnot. Similarly, it also provides complete access to bank accounts, debit cards, and credit cards through various payment apps, mobile wallets, online banking apps, and much more. But what if you misplace your phone at any store, restaurant, or any other crowded place? All your personal details are sure to get leaked right? And this includes all the banking and mobile payment details, which can lead to frauds.

Hence, it is better to look for smartphones that come with in-built protection to protect your phone, mobile phone wallets, and other fraud activities. Rather than looking for a single authentication method, go for a two-factor authentication process for unlocking the phone through facial recognition, fingerprint and iris scan options along with the PIN.

3) Inappropriate using habits

Even if you have a highly secure mobile phone, the way you use your mobile phone can be problematic regarding payment security. Many mobile phone users use Google Chrome browsers for making payments through mobiles on Android phones. And browsers like Chrome and Safari are highly risky to use for making payments.

Look for secure and advanced mobile apps that come with an updated version. Lastly, there are mobile users who don't use any kind of PIN locks or other security options on their mobile phones, which allows the fraudsters to make frauds when the devices are lost. So, look for an updated payment app and browser for adding to the security of mobile phones.

4) Protect your mobile wallet

With the introduction of mobile payment options, several payment apps came into existence. Paytm, Google Pay, Apple Pay, PayPal, and many such payment wallets rapidly gained popularity with amazing offers, cashback, discounts, etc. All such applications work when a debit or credit card is added in the mobile wallet. Details like the card number, VCC number, expiry date of the card, etc. when entered in the application through encryption which is carried out through code. Again, the mobile wallet providers also use a token number generated randomly for making a payment which is not visible to the merchants while transactions are carried out.

The cybercriminals can misuse your account numbers, but when you add any credit or debit card to the payment apps using any public Wi-Fi, the risks increase to a great extent. The criminals can easily spoof off all the details used for making the transaction used while registering. For protecting yourself from such frauds, use your cards with mobile wallets while you are at home or having a personal network secured with a password. Using Virtual Private Network is also the best way to look for security while using a mobile wallet.

5) Beware of App Clones

Are you sure you have installed the right application on your mobile phone? Or is it one of the app clones? Such app clones come with ridiculous and poor security options that can be easily accessed by the criminals.

9 Security Tips

#TIP 1 Download mobile payment apps only from official stores such as Google Play and Apple Store.

#TIP 2 Before you download any app, verify the publisher. The 'Top Developer' badge (in Google Play) is usually a good sign that the app is safe. Read its user reviews and just Google "Is (app name) safe?".

#TIP 3 Carefully read the permissions that the app asks for. If you think a mobile payment app is asking for more than what is required, do not install it. If you have any doubts regarding the permissions, just contact the app's manufacturer via their Twitter handle.

#TIP 4 Never visit an online banking or shopping website by clicking on a link received in an email or text message.

#TIP 5 Always choose a strong password for accounts for net banking or online payment apps. It should be a mix of uppercase and lowercase letters and special characters

#TIP 6 Do not use unsecured, public Wi-Fi networks for online banking or shopping. Doing so may let an attacker steal your information.

#TIP 7 Only use established and well-known websites for online shopping and paying for utilities.

#TIP 8 Ensure your banking transactions are OTP (one time password) enabled. While paying a purchase through net banking, debit/credit card, you will enter your login ID and password (or card details) and also an OTP (code sent to your registered mobile number) before you can make the final payment. So, even if an attacker manages to steal your net banking/card details, payment won't go through without the OTP.

#TIP 9 Install a mobile security app that is built with multiple layers of security. The Quick Heal Total Security App comes with SafePe besides other advanced features. SafePe is especially designed to secure your financial information when you use mobile payment apps for online shopping, banking, paying bills, etc.

Session 7

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

Guess Me?

1. I am a social networking app, a part of my name is also related to weight. Can you guess which APP I am?

a. Facebook

b. Instagram

c. Whatsapp

d. Truecaller

2. I am a famous E-Commerce app, where you will get all the products from A to Z. Can you tell who I am?

a. Myntra

b. Flipkart

c. Snapdeal

d. Amazon

3. I am a microblogging app, often used by politicians. I come with a word limit. Can you name me?

a. Telegram

b. Zomato

c. Twitter

d. Torrent

4. I am a professional networking app often used to build and engage your professional network. Can you guess who I am?

a. Naukri

b. Koo

c. Indeed

d. LinkedIn

5. I am an App to gain & share knowledge. People use my platform to ask questions and answer questions of various categories. Can you tell me my name?

a. Quora

b. Evernote

c. Coursera

d. Telegram

Answer: 1-b, 2-d, 3-c, 4-d, 5-a

Answer Explanation:

1. The name in Instagram has "gram", a unit of weight.
2. If you look at the logo of Amazon you'll see an arrow originating from A and ending at Z. Which states that you will get all products from A to Z at Amazon.

3. Twitter is called a microblogging app as it comes with a word limit.
4. Although Naukri and Indeed are job portals, LinkedIn is considered as a professional networking social media.
5. Quora is a very interesting platform, where you can ask random questions and you can also answer the questions. It is also available in various regional languages.

Source: www.techopedia.com/
https://www.paymentsjournal.com/5-mobile-payment-security-concerns-to-consider/
https://blogs.quickheal.com/9-security-tips-using-mobile-payment-apps/

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Session 8

Digital Literacy
(21ˢᵗ Century Literacies)

Microsoft Document

Session 8

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Microsoft Document

Microsoft Document, commonly called MS Word, is a processor made by Microsoft. It was first released in 1983. Its first updated version was launched in the year 1989 as version 1.0. Since then 16 versions have been launched with 2019 being the latest version (16.0).

Now let's understand the various parts and features of MS Word when you open a New Document:
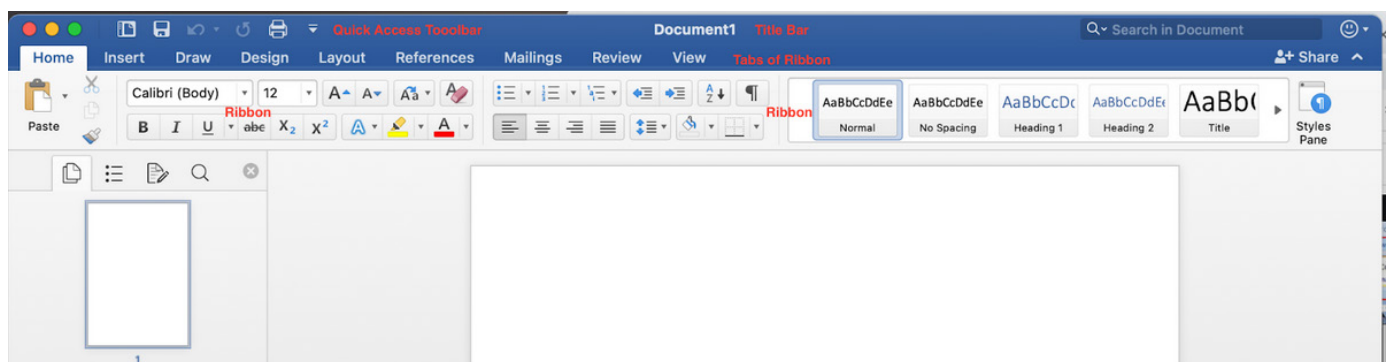
MS Word 2019

Quick Access Toolbar:

Quick access toolbar is present at the topmost part of your screen. The basic function quick access toolbar provides is Save, Undo & Redo. However this toolbar can be customized as per your requirements.

Title Bar:

Just adjacent to the Quick Access Toolbar, you will find the Title Bar. As the name says it shows the title of the Document.

Ribbon and Tab

Ribbon was introduced in MS Word in the year 2007. It gives you a plethora of functions where you can change the font, size of text, make it bold or underlined. You can add bullets, numbers, spacing and countless functions.

Just above the Ribbon you will get various tabs. These tabs will change the ribbon features as and when you visit them. Let's understand each tab one by one.

Home Tab:

Home tab is the default tab, whenever you open a new word file. You'll see the home tab and its features in the Ribbon like Font, Paragraph, Styles and editing

Insert Tab:

This is the second tab in the Ribbon, Through this tab you get additional features to INSERT Clipart, Page Number, Tables, Shapes and more.

Page Layout:

The third tab is the page layout tab, where you can make changes accounting to your page. Here you can add margins to your page, change size, add watermark and various other features.

References:

Under this tab you get the feature of adding footnotes and table of contents. You can also give captions and mark citations in your word file.

Mailings:

This tab is rarely used but has an important feature of Mail Merge.

Review tab:

Once you have written a file in a document you can check for grammar and spellings through this tab. If you wish to share a highly confidential file, under this tab you can also make your file password protected.

View:

As the name says this tab helps you to view your file. You get the features like Zoom, One-Two page view. The main aim of this tab is to look at your file through various ways.

Shortcuts of Word Document:

Ctrl A: Select all the contents of File

Ctrl B: Bold Highlighted Section

Ctrl C: Copy the selected text

Ctrl X: Cut the selected text

Ctrl N: Open a New document

Ctrl O: Open Options

Ctrl P: Open the Print Window

Ctrl F: Open Find Box

Ctrl I: Make the selected text Italic

Ctrl K: Insert Link

Ctrl U: Underline highlighted text

Ctrl V: Paste

Ctrl Y: Redo the last action

Ctrl Z: Undo the last action

Ctrl S: Save

F12: Save As

Ctrl + Shift + F: Change the Font

Ctrl + Shift + >: Increase selected font by +1

Ctrl + Shift + <: Decrease selected font by +1

Alt + Shift + D: Insert the current Date

Alt + Shift + T: Insert the current Time

Ctrl + W: Close Document

Activity: Do you know your icons?

When: During the session
How: Identify the icon and write its name and shortcut
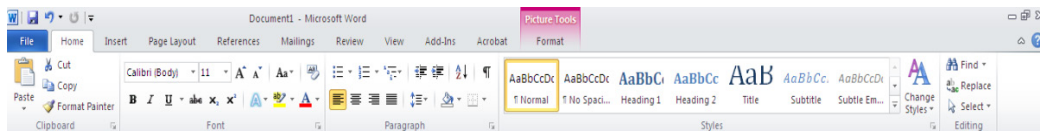
An icon is a small symbol or picture that represents a series of instructions or programs.

ICON	Name / Function / Shortcut Command	ICON	Name / Function / Shortcut Command
💾	**Save (Ctrl + S)**	Calibri (Body) ▾	
↶		11 ▾	
↻		**B**	
📋		*I*	
✂		U̲	
📑		A ▾	
≔		ab ▾	
≣		A ▾	
≒ ▾		≣	
⊞ ▾		≣	
🪣 ▾		≣	
¶		≣	
↕≡ ▾		Aa ▾	
⫷≡		⫸≡	

MS Document Quiz:

1. Which of the following is called a Ribbon in MS Doc?

a. A margin feature

b. A toolbar with various commands

c. The Review option

d. Image Formatting

2. Under which title can you get the feature to add hyperlink text?

a. Home

b. Design

c. Layout

d. Insert

3. Where will you find the option to protect your document with a password?

a. Review

b. Mailings

c. Home

d. Draw

4. Under which Tab will MS Doc give you a feature to insert Footnote?

a. Home

b. File

c. Design

d. References

5. Which is the latest version of MS Word?

a. 2016

b. 2019

c. 2018

d. 2017

Answers: 1-b, 2-d, 3-a, 4-d, 5-b

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Session 10

Digital Literacy
(21st Century Literacies)

Microsoft PPT

Session 10

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Microsoft PPT

PowerPoint is a Microsoft Office application that helps you to create a
professional slideshow presentation.

MS PPT was released in 1987. Since its inception, a total of 17 versions have
been released with the first one in 1987 as version 1.0 and the latest being in
the year 2018 with version 17.0.
The aim of MS PPT was to bring a platform for business/office presentations
but today it is more widely used in various domains.

Now let us understand the PPT Interface:

Source: http://uscm.med.sc.edu/PowerPoint.pdf
https://www.trainingconnection.com/
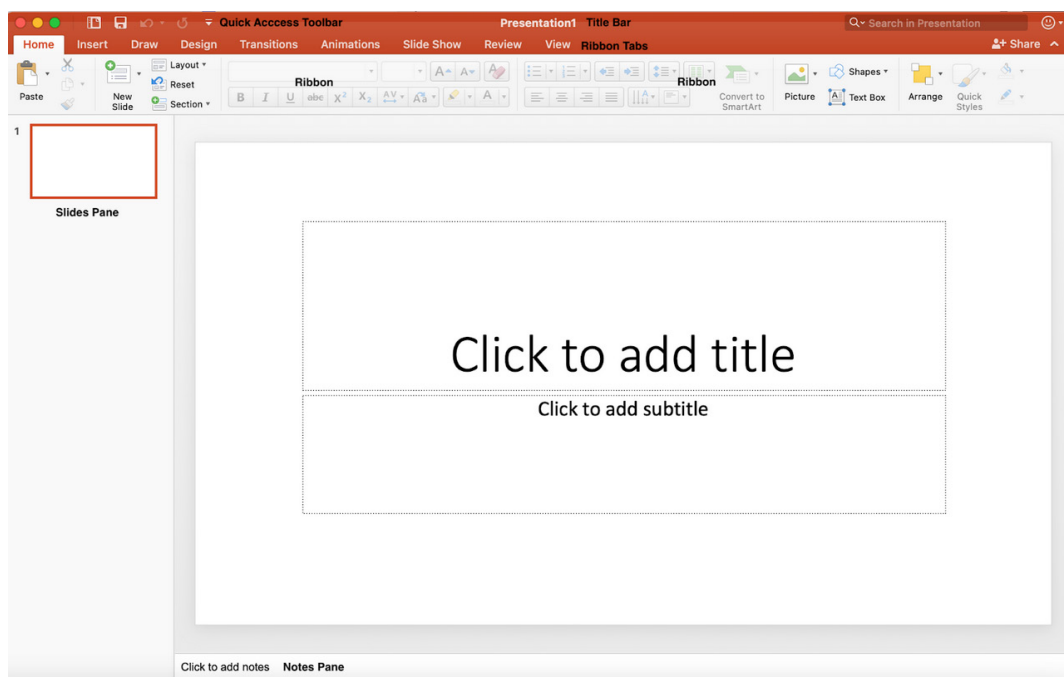
Quick Access Toolbar:

This is the same as MS Doc, with features of Save, Undo & Redo. Quick Access Toolbar is customisable as per your preferences and needs.

Title Bar:

This is available adjacent to the quick access toolbar. This bar displays the name of the document.

Ribbon & Tab:

MS PPT has 9 tabs with various features associated on Ribbon along with specific tabs.

Home Tab:

Home tab is the default tab present once you open PPT. It has various features on the ribbon like Slide Layout, Font, Uppercase, Lowercase, Picture and more.

Insert Tab:

As the name says, Insert tab helps you to insert a particular feature in your files like Shapes, Charts, 3D Models, WordArt, Audio, Video etc.

Draw Tab:

Draw tab helps you to draw on the slide. You also get the feature of highlighting your text under this Tab.

Design Tab:

Design tab gives you various designs for your slides.

Transition Tab:

This is a unique feature of PPT where you can have basic animation to make your slide look more presentable. This is majorly related to animation of slides.

Animation:

As the name says, it is also the same with various animation features. This is used to animate the text for a high audience engagement.

SlideShow:

Once you are done with making presentations, through slideshow you can see what is the ultimate outcome of your presentation after adding various transitions and animations.

Review:

It is the same like MS Doc with a bit less features, to spell check and proofread the content.

View:

As the name says it provides you various ways to view your slides either on single page or multiple pages.

MS PPT Shortcuts:

Save a Presentation: Ctrl + S
Print a Presentation: Ctrl + P
Open a Presentation: Ctrl + O
Open a New Presentation: Ctrl + N
New slide: Ctrl + M
Duplicate a Slide: Ctrl + D
Cut: Ctrl + X
Copy: Ctrl + C
Paste: Ctrl + V
Undo: Ctrl + Z
Redo: Ctrl + Y
Close Active Presentation: Ctrl + W
Quit Powerpoint: Ctrl + Q

Source: http://uscm.med.sc.edu/PowerPoint.pdf
https://www.trainingconnection.com/

Session 10

Handout
A Handout is written material given to inform or provide students with additional information.

Activity- Let us Practice making a Slide

Step 1: Open MS PPT, and choose any design you like under the Design tab.
Step 2: Write a Heading and a Subheading on the first Slide.
Step 3: Click on the new slide under the home tab.
Step 4: Write "Introduction" in the Title Bar.
Step 5: In the box below write your Name, Age, Place of Birth and Educational Background.

Note: Font should be Times New Roman
     Text Size in First Slide: Heading-66, Subheading-18
     Text Size in Second Slide: Introduction-32 & Text- 20

The slides you have created should look like this:

Slide 1:

Slide 2:

INTRODUCTION

- Name: XXXXX XXXXXXX
- Age: XX
- Place of Birth: XXXXX
- Educational background:

Worksheet

A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish
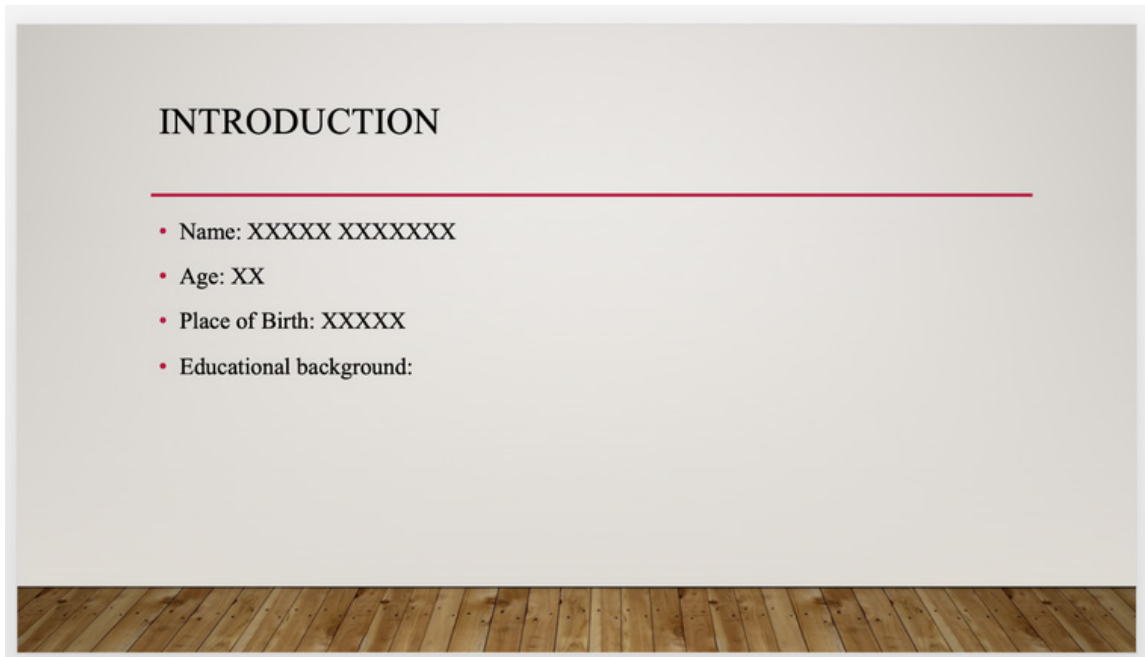
MS Powerpoint Quiz:

1. In the Insert tab under which group will you find the header and footer option?

a. Tables Group

b. Text Group

c. Object Group

d. illustration Group

2. The slide that introduces the topic is called as?

a. Bullet Slide

b. Top Slide

c. Table Slide

d. Title Slide

3. Times New Roman, Calibri, Arial are the examples of?

a. Font

b. Slide

c. Animation

d. Clip Art

4. If you wish to bring your selected text in the center, what is the shortcut key?

a. Ctrl + C

b. Ctrl + E

c. Ctrl + O

d. Ctrl + X

5. Which of the following features is not available in MS PPT?

a. Animation

b. Video

c. Motion Graphics

d. Drawing

Answer: 1-b, 2-d, 3-a, 4-b, 5-c

UNDP

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Session 12

Digital Literacy
(21st Century Literacies)

Microsoft Excel

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Microsoft Excel

- Excel is a computer program used to create electronic spreadsheets.
- Within excel users can organize data ,create charts and perform calculations.
- Excel is a convenient program because it allows users to create large spreadsheets, reference information, and it allows for better storage of information.
- Excel operates like other Microsoft(MS) office programs and has many of the same functions and shortcuts of other MS programs.

Shortcuts:

Ctrl + C = Copies highlighted Items
Ctrl + V = Pastes highlighted items
Ctrl + X = Cuts highlighted text or selected image
Ctrl + A = Select all
Ctrl + N = Create a new workbook
Ctrl + F = Find anything in the workbook
Ctrl + U= To underline the highlighted text
Ctrl + P= To print a Workbook
Ctrl + W= To close the current workbook
Ctrl + K= To insert a link in a cell
Ctrl + H = To find and replace all cell contents

Excel Interface:
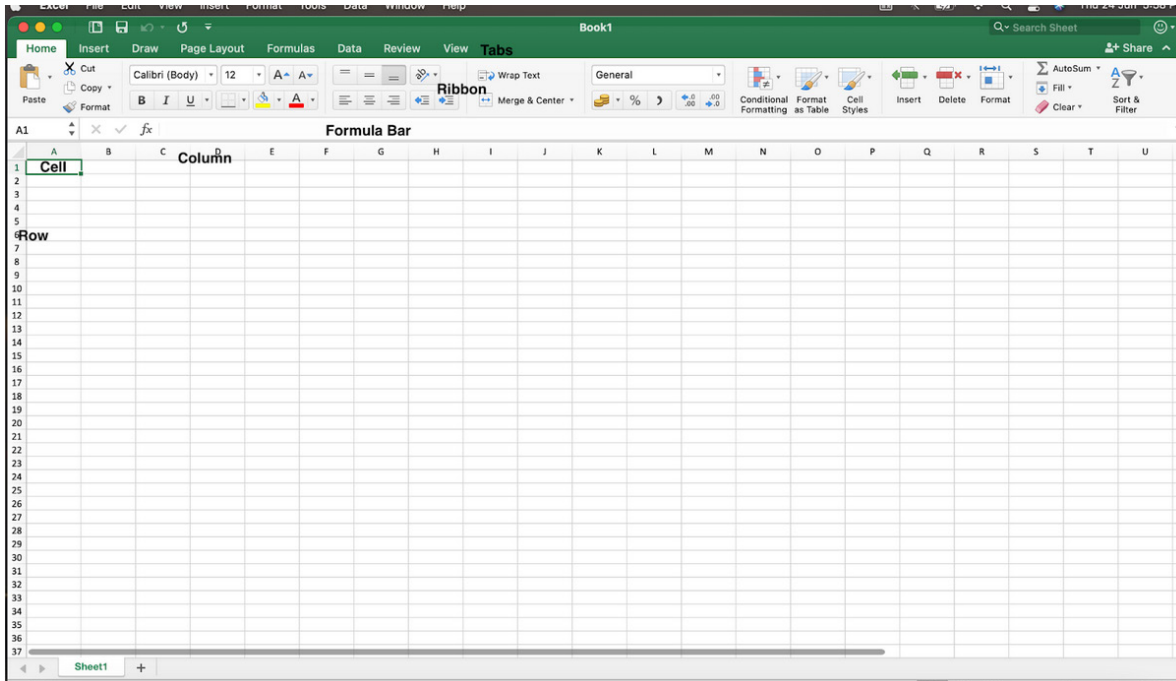
Home Tab : Just like MS Word & MS PPT, it is the default tab when you open a new file with all the text editing tools and features.

Insert Tab: Here you get all the additional features like tables, Graphs, Pictures, Links to insert in your excel workbook.

Draw Tab: This is the same as you get in MS PPT with features of drawing and highlighting text.

Page Layout: This tab gives you the liberty to change the height, width, background etc of your workbook page.

Formulas Tab: This is the feature exclusive of MS Excel where you get several mathematical formulas through which you can work upon your mathematical data.

Date Tab: Again a unique feature of MS Excel. As we know excel is all about numbers and its analysis. Data tab helps us to sort, analyse, group, ungroup and many more.

Review Tab: This is a common tab in MS Doc, MS PPT & MS Excel. We can check for spellings and grammar and proofread our data in excel.

View: As the name suggests this tab helps us to view our data in various orientations and formats.

Row: All the horizontal blocks are called rows. They are marked in numeric order.

Column: All the vertical blocks are called columns. They are marked in Alphabetical order.

Cell: The box where a Row and Column meets is called a Cell.

Formula Bar: It is a tab which displays all our inputs.

Note: A file in excel is often called as Workbook
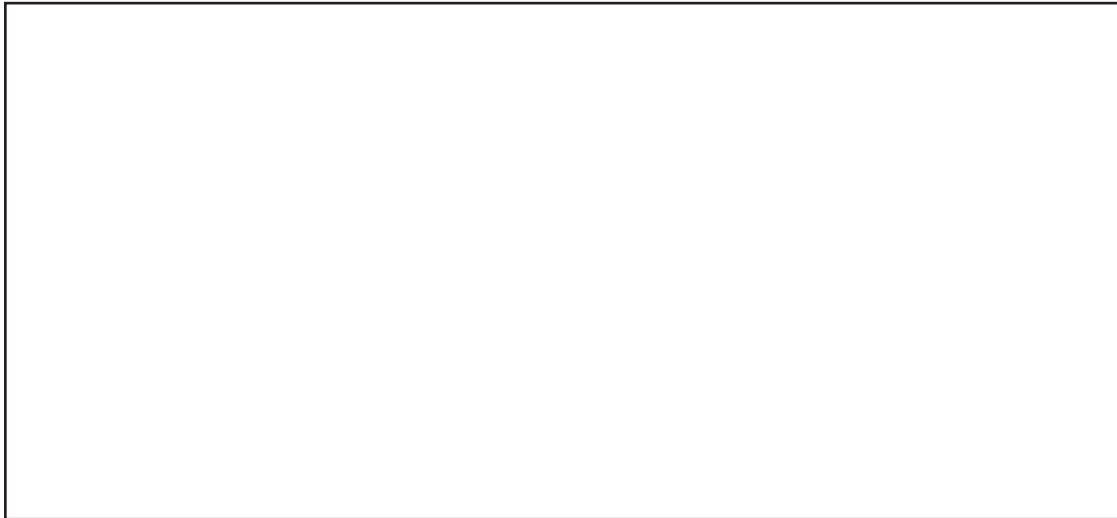
Activity: Discuss and Draw a table

When: during session
How: Read this situation and draw a table at the blank space
You are the manager of a store, it is your job to keep a note of the amount of sales and expenses that takes place day to day . To keep account of this you decide to maintain an excel sheet. Which are the columns you are interested in and why? Draw the table you want to see here:-

Activity: Create table

When: during session
How: Under trainer's guidance, create a table in excel using the following specifications:

1. Create tables in excel with months as rows and Sales, Cost as columns.
2. Fill dummy data
3. perform arithmetic
4. summation , =SUM
5. subtraction, = sales-cost
6. adding percentages
7. formula = revenue-cost/ revenue

Answer/Outcome of this activity will be discussed in the session

Activity: Use SmartArt

When: during session
How: Make the following graphics in excel sheet
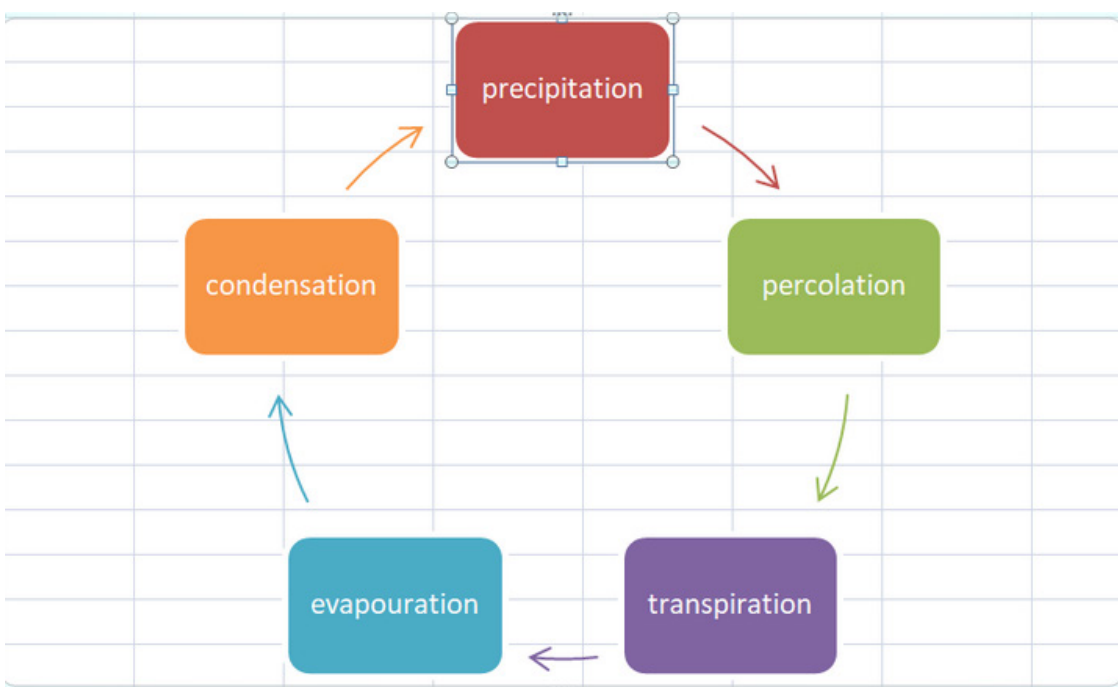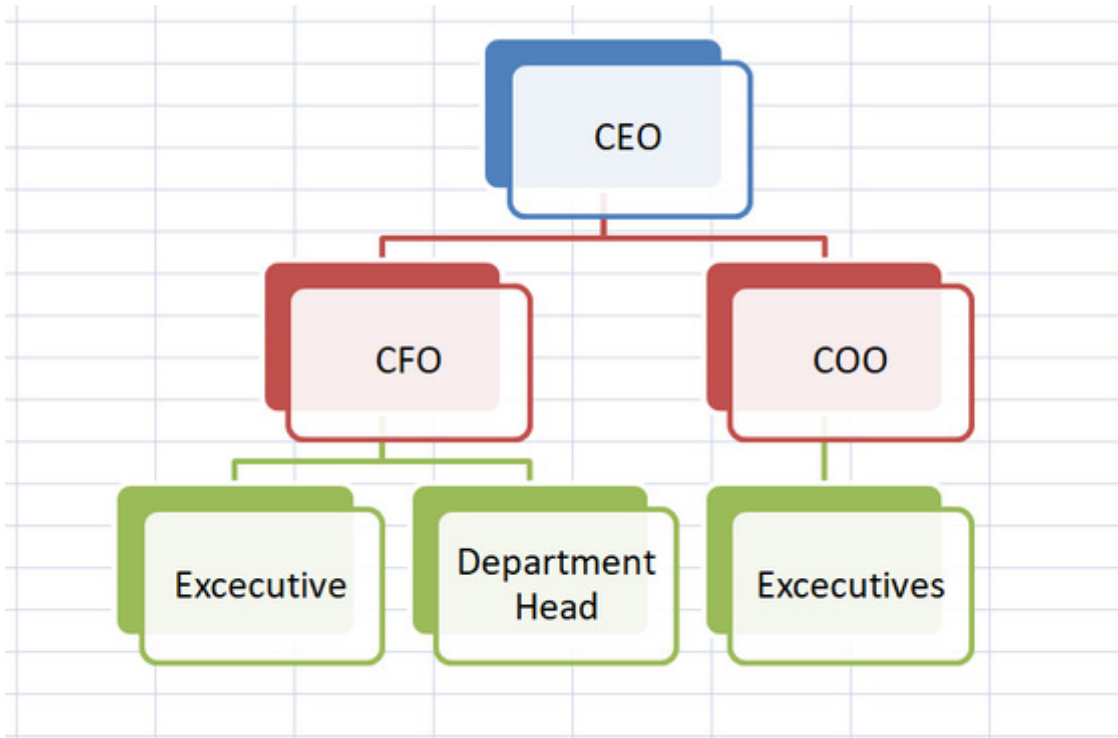
Activity: Create Dashboard

When: during session
How: Create a dashboard consisting pie chart, donut chart, line graph and bar graph to present a dashboard basis the given table:

Profit Calculations				
Months	Sales	Cost	revenue	profit
Jan	10	17	-7	1817%
Feb	15	21	-6	2200%
March	29	20	9	1850%
April	33	23	10	2133%
Totals	87	81	6	8000%

Outcomes of Activities

Activity: Discuss and Draw a table

	Sales	Cost
Jan	10	17
Feb	15	21
March	29	20
April	33	23

Activity: create a table

Profit Calculations				
Months	Sales	Cost	revenue	profit
Jan	10	17	-7	18.16667
Feb	15	21	-6	22
March	29	20	9	18.5
April	33	23	10	21.33333
Totals	87	81	6	80

Activity: Create Dashboard

Profit Calculations

Months	Sales	Cost	revenue	profit
Jan	10	17	-7	1817%
Feb	15	21	-6	2200%
March	29	20	9	1850%
April	33	23	10	2133%
Totals	87	81	6	8000%

Total Revenue for Quarter 1

6000

Sales and Cost

■ Sales ■ Cost

	Jan	Feb	March	April
Sales	10	15	29	33
Cost	17	21	20	23

Sales

■ Jan ■ Feb ■ March ■ April

12%
17%
33%
38%

profit

■ Jan ■ Feb ■ March ■ April

23%
27%
23%
27%

sales
cost
revenue
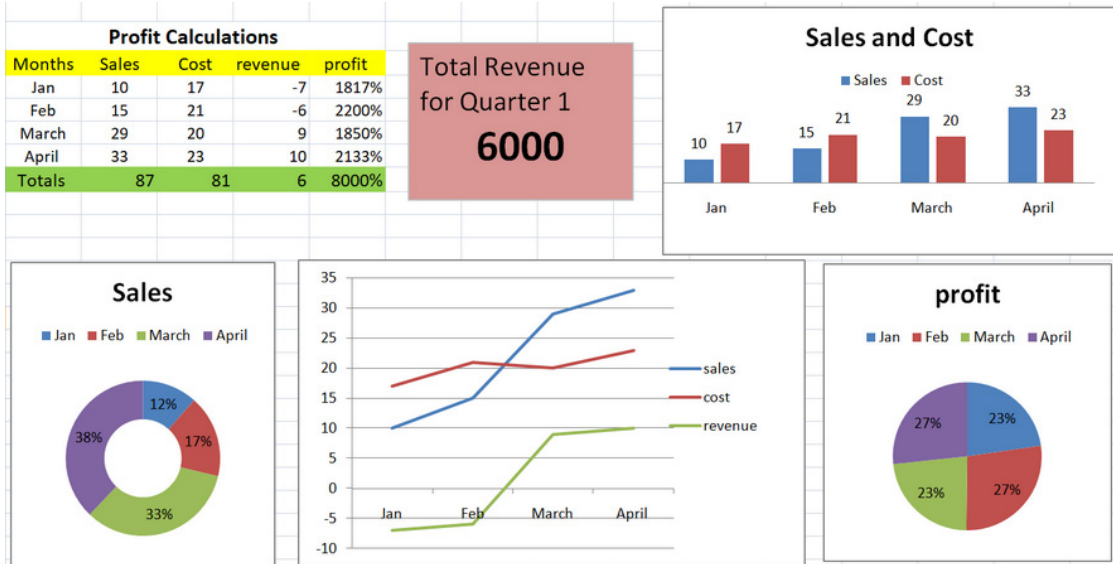
MS Excel Quiz:

1) The box where a row and a column intersects is called?

a. Worksheet

b. Sum

c. Cell

d. Tab

2) What is the name of the bar that allows you to perform mathematical functions?

a. Math bar

b. Number bar

c. Calculation bar

d. Formula bar

3) Under which option of the ribbon tab can you use the function of sorting in ascending or descending manner?

a. Insert

b. Home

c. Data

d. Page Layout

4) The selected portion in the below image is _____?

a. Row

b. Column

c. Shelf

d. Cell Cluster

5) Which of the following mathematical symbols, when added in a cell, acts as a shortcut for any formula in MS Excel?

a. +

b. -

c. =

d. X
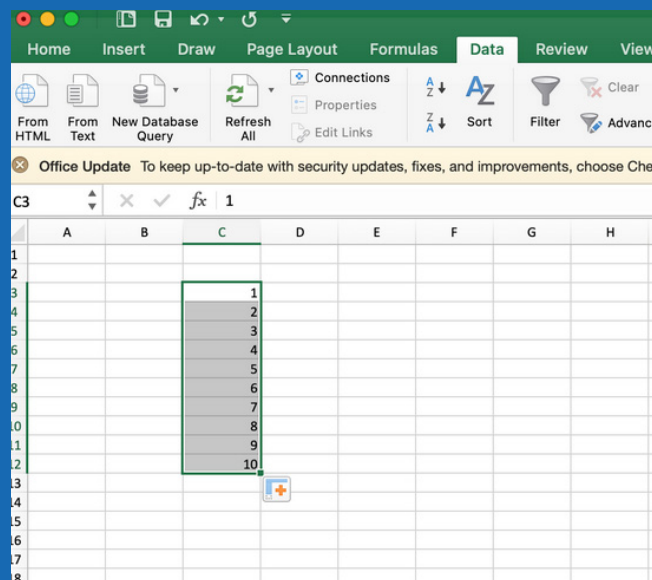
Answers: 1-c, 2-d, 3-c, 4-b, 5-d

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Session 14

Digital Literacy
(21st Century Literacies)

Google Suite

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.
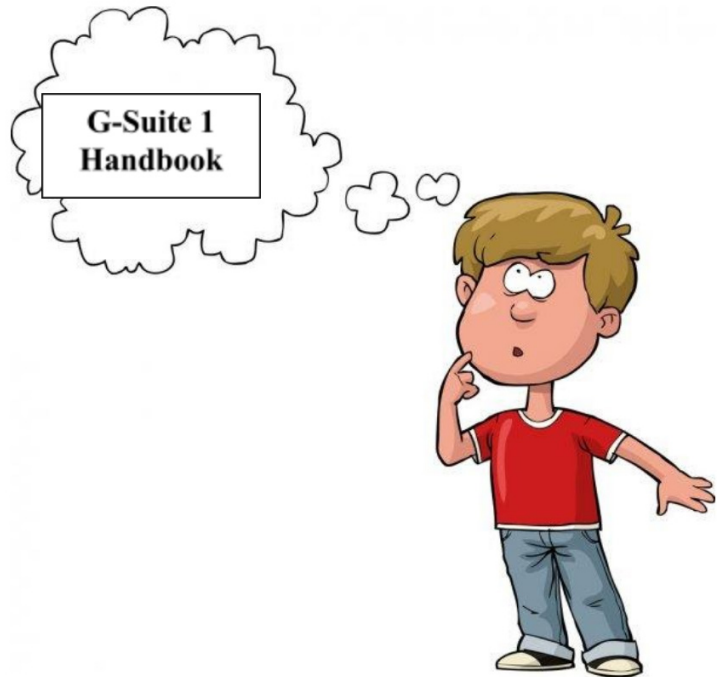
G-Suite 1
Handbook

Google Suite

What is G Suite?

G suite was launched in the year 2006 as Google Apps. Later in the year 2016 it was rebranded as G Suite and now it is commonly called as Google Workplace.

G Suite Consists of:

- Gmail
- Contacts
- Calendar
- Meets
- Chat
- Drive
- Forms

Note: This is just a basic list. Students are expected to research & try to find what other services G Suite offers.

Gmail:

It is an Email service provided by google free of cost. This is the most widely used Email service across the globe.

Contacts:

A free service by Google Contact management tool, where you can save contact, Import/Export and retrieve contacts in a new device with Gmail ID.

Calendar:

This is a feature that helps you in Time Management & Scheduling. You get free services to schedule your meeting or work and you also get reminder emails.

Meets:

With increased online meetings in past years due to Covid-19, you also get the facility of Google meets where you can have an online video conference with features like screen sharing and more. You can access Meets via Google chats and also through Gmail.

Chats:

Although it is not commonly used, it is an amazing feature of messaging where you can chat, create rooms and do video calls to your contacts.

Drive:

One of the most widely used features. This helps you to save your file in cloud storage with 15 GB of Free Storage.

Forms:

If you are working in marketing or need to do project survey or want entries for college events and function Google forms is the best way you have on an online platform.

Google Suite vs MS Office:

As you are now aware of MS Office tools along with hands-on practice. Let us dive into why G Suite is also important and why G Suite is widely used in corporates.

MS Word vs Google Docs

Yes, MS word has superior features as compared to Google Docs. It is very easy to make a report, resume and any type of document with various templates available. Which you don't get on Google Doc. Also both are compatible with each other. Formatting in MS Word is way better than Docs.
But Google docs is way better than Word when few people or a team wants to work on the same file together. Google Docs gets extra points for this handy feature.

MS Excel vs Google Sheets

If you want to create a work all alone then Excel is the best choice with a variety of templates available as per the needs. But if you are working in a team and everyone has to put in their inputs in a single file then there is no replacement for Google Sheets. Google sheets have this feature of commenting in file so as to ease the communication.

MS PPT vs Google Slides

Again with the basic difference of high features in PPT and collaborative working in Sheets. The most defining difference is that PPT has a feature of Qickstarter that gives you a wide range of outline, template and themes for your presentation.

Google Drive Files:

Can you name them?

Base of Difference	MS Office	Google Suite
Storage	MS Office gives 1TB of space	Google Drive gives 15 GB of free storage
Collaboration	Not easy to share the files with multiple users	Multiple users can share and use the file at same time.
Saving File	You have to manually save the file	File gets automatically saved in every second you make a change
Internet Connectivity	You have the facility of working offline	Internet connectivity is required

Handout

A Handout is written material
given to inform or provide
students with additional
information.

Activity

Create the following table and graphs in Google Sheets

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish
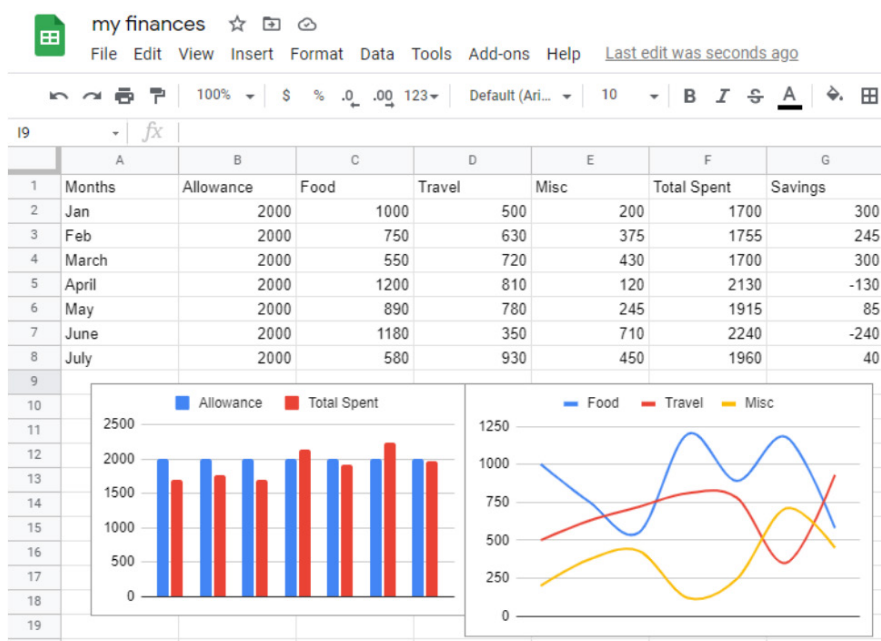
Match the pair (Match the Correct File with their Logo)

1. Google Drive   (a)

2. Google Docs   (b)

3. Google Sheets   (c)

4. Google Forms   (d)

5. Google Drawings   (e)

Answer: 1-c, 2-d, 3-e, 4-a, 5-b

Situation Based Questions:

1. Rohan, Ajay and Pranay are working on a research project. They have decided to input all their research data in a single sheet. Which of the following tool will you suggest for a better input?

a. Google Sheets

b. MS Excel

2. Kirti is making a presentation for a Presentation Contest which will be held in her college. She is participating alone. Suggest an Ideal presentation tool for her.

a. Google Slides

b. MS Powerpoint

Ans:　1-a (Since there is collaborative work between three people, Google sheets is an ideal choice).
2-b (Since she is participating alone, so no need for collaboration. Also PPT has a wide range of templates. So PPT is a good choice).

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Session 17

Communication Skills

Basic Conversations- Present

Basic Conversations- Present

When do you use the tense:-

We use the present simple to talk about things you do every day and for things you like and don't like.

Positive		
I You We They	live eat come	in Delhi pasta from Chennai
She He It	lives eats comes	in Delhi pasta from Chennai

Usage:

I live in Delhi
They Come from Chennai

Image Source: https://www.pngfind.com/mpng/mxiibx_cartoon-computer-icons-drawing-woman-thinking-girl-clipart/

Negative			
I You We They	don't (do not)	live eat come	in Delhi pasta from Chennai
She He It	doesn't (does not)	live eat come	in Delhi pasta from Chennai

Usage:

I don't eat pasta.
They don't come from Chennai.

Questions		
Am	I	
Are	you we they	waiting for Namit? going to the office? watching a movie?
Is	he she it	

Usage:

Are you going to the office?
Is she watching a Movie?

Positive answers			Negative answers		
Yes	I	am	No	I	'm not (am not)
	You We they	are		You We they	aren't (are not)
	He She it	is		He She it	isn't (is not)

- When you speak, use short forms.
- Do not = don't
- Does not = doesn't
- Add an 's' to the verb with he, she, it.

Examples:-
1. I love to paint. Do you?
2. He loves to paint. Does he?

Activity: Who am I and What do I do in a day

When: during session

How: Using english language, write your short introduction and how your usual day looks like. You can include things like name, home town, hobbies and interests, strengths and weaknesses in your introduction.

_____

_____

_____

_____

_____

_____

_____ _____

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_____

_____

_____ _____

_____

_____

_____

Fill in the Blanks?

1. My Parents _____(live/are living/have lived) near Chennai.

2. I _____(am visiting/ have visited/visit) my friends twice a month.

3. Watch carefully. First I _____(am taking/ take) a cucumber and _____(cut/ am cutting) it into pieces.

4. I will call you if I _____(get/ am getting/ have got) time.

5. How _____(am/ do) I _____ (getting/ get) to the airport?

Answers:

1. Live (We use the simple present to talk about permanent situations)
2. Visit (The simple present tense is used to talk about things that happen regularly)
3. Take, Cut (We use the simple present tense to talk about a series of actions that are completed as we speak)
4. Get (When the main verb is in the future tense, we use a simple present tense in the subordinate clause)
5. Do, get (The simple present tense is used when we ask for and give directions)

Source: https://www.englishgrammar.org/present-tenses-exercise-2/

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Session 18

Communication Skills

Basic Conversations- Past

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Basic Conversations-Past

Session 18

Handout

A Handout is written material given to inform or provide students with additional information.

Students Handout

Simple past

Subject	Verb + d/ed/ied or irregular form (V2)	
I/He/She/It You/We/They	Walked	5 miles yesterday
	Slept	last sunday

Usage:

She walked 5 miles yesterday

Negative Sentence in Simple Past Tense

Subject	didn't + Verb in base form	
I/He/She/It/You/We/They	didn't walk	to the mall yesterday.
	didn't sleep	late last Tuesday.

Usage:

She didn't sleep late last Tuesday.

Questions in Simple Past

Auxiliary Verb	Subject	Verb in base form	
Did	I/You/We/They	walk	to the mall yesterday?
	he/she/it	sleep	late last Tuesday?

Usage:

Did he sleep last tuesday?

Some useful phrases to be used in conversations

Phrases for talking about general experiences

(Generally/ In general/ On the whole), I have found that…
I (only) have (very) limited experience of this, but…/ I don't have much experience of this (at all), but…
I …. a couple of times/ a few times/ quite a lot/ a lot/ all the time and…
I haven't had any bad/ good experiences
with this. On the contrary,…
In general/ Generally, I find/ I have found…
In my (limited/ very limited/ substantial/
personal) experience,…
Like/ Unlike most people, I have found
that…
This has only happened to me twice/ a
couple of times, but…
A memorable/ shocking/ typical/ bad/
terrible/ frightening/ sobering/ disappoint-
ing/ great/ life-changing/ good experience
(that/ which) I had is…

An experience (I had) which I will always remember/ really influenced me/ is
relevant to this (debate)/ is related to this (discussion)/ changed my life/ affected
my attitudes/ this reminds me of/ comes to mind/ springs to mind/ I had related to
this/ stands out is…
An experience which I wish I'd never had is…
An unforgettable/ amazing experience (that/ which) I had is…
I might have told you this story before, but…
I witnessed…

Phrases with time expressions etc

(I don't remember this, but my parents told me that) when I was a baby/ toddler…
(I usually… but) one day…
(Just) a couple of days/ weeks/ months/ years ago…
(Just) the other day,…
I don't remember exactly when, but…
I must have been about… years old when…
I once…
I will never forget the time when….
I'd just started…, when…
Something (similar) happened to me when…
When this happened to me…/ During one of the times this happened to me…
While I was…, (suddenly)…

Phrases to end talking about experiences

… (or) that's my experience, anyway.
… though your/ other people's experiences may be different.
I hope that I never experience that again/ you don't have to go through the same thing/ the other guy was okay/ he has forgiven me/ I have learnt my lesson/ he gets what he deserves/ it will never happen again.
I still can't believe it.
It was a once in a lifetime experience/ thing.
It's difficult to believe it really happened.

Questions about experiences

Do you have experience of…?
Has… (ever) happened to you?
Have you ever…?
Have you experienced…?
I'm guessing you've (never)…
When you were…, did you…?

Phrases to talking about other people's experiences

According to a friend of mine/ what someone told me/…
I heard that…
I know a good story about…
I wasn't there at the time, but…
Someone told me that…
This didn't actually happen to me, but…
This hasn't happened to me personally, but apparently….

Activity: Memories

When: during session
How: choose one topic from the given list and write your memory on that topic, using the past tense of english language.

1. You have recently been to a vacation spot
2. You have recently watched an interesting movie
3. You met your old friend
4. Your first day in college
5. You got a hard scolding from your parents
6. A day when you/your parents felt proud of you
7. You did something good for someone
8. You were in guilt/most embarrassing moment
9. You did some social work
10. You were on cloud 9

_____

_____

_____

_____

_____

_____

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_____

_____

_____

_____

_____

Source: https://www.gingersoftware.com/content/grammar-rules/
Img Source: https://www.freepik.com

MCQ Exercise:

1. I _____ to the temple after school.
   (went/gone/goed)

2. _____ Pranay and Bhavya at last month's meeting?
   (was/are/were)

3. _____ you see Radha's new dog yesterday?
   (Do/Did/Are)

4. I _____ Science for two years.
   (Study/ Studying/ Studied)

5. Sorry, I _____ hear you.
   (wasn't/ didn't / am not)

Answers: 1- Went, 2- Were, 3-Did, 4-Studied, 5-Didn't

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Session 19

Communication Skills

Basic Conversations- Future

Basic Conversations-Future

Future Simple

Future Simple is usually written as will + Base form of verb (Walk/Talk)

To describe an Action
She'll write the letter tomorrow.

Positive & Negative

Subject	Will or Won't + Verb		
	Positive	Negative	
I/ You / We/ They/ It/ She/He	Will See	Won't See	You tomorrow morning

Usage:

We will see you tomorrow morning.

Question in Simple Future

Wh Word	Will	Subject	Base form of Verb	
What	will	I / You / We / They He / She / It	tell	him tonight
Why	won't		finish	the project.

Usage:

What will they tell him tonight?

Contracted forms of Pronoun:

I will - I'll
She Will - She'll
He Will - He'll
They will - They'll
We Will - We'll
You will - You'll

Handout

A Handout is written material
given to inform or provide
students with additional
information.

Activity: Future Prediction

When: during session
How: As per the instructor's guidance

Zodiac signs

Aquarius
Jan 21 - Feb 19

Sagittarius
Nov 23 - Dec 21

Taurus
April 21 - May 21

Scorpio
Oct 24 - Nov 23

Virgo
Aug 24 - Sept 23

Libra
Sept 24 - Oct 23

Leo
July 24 - Aug 23

Cancer
June 22 - July 23

Gemini
May 22 - June 21

Capricorn
Dec 22 - Jan 20

Aries
March 21 - April 20

Pisces
Feb 20 - March 20

My Name: _____

My Zodiac sign: _____

Sort of person I am: _____

_____

The things I like to do: _____

_____

The things I don't like to do: _____

_____

My weekly horoscope: _____

_____

_____

_____

_____

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

Quiz:

1. He _____(Will/is/not) arrive on time.

2. Will your friends _____ (Leave/Leaves/Leaving) before Tuesday?

3. It _____(snows/will snow/is snowing) tomorrow.

4. I _____('ll be/will/am being) back before Friday.

5. I'm going to the grocery store. I think _____(I've, I'd, I'll) buy chicken.

Answers: 1-Will, 2-Leave, 3-Will Snow, 4-'ll be, 5- I'll

Source: https://www.gingersoftware.com/content/grammar-rules/

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Session 20

Communication Skills

Listening Skills
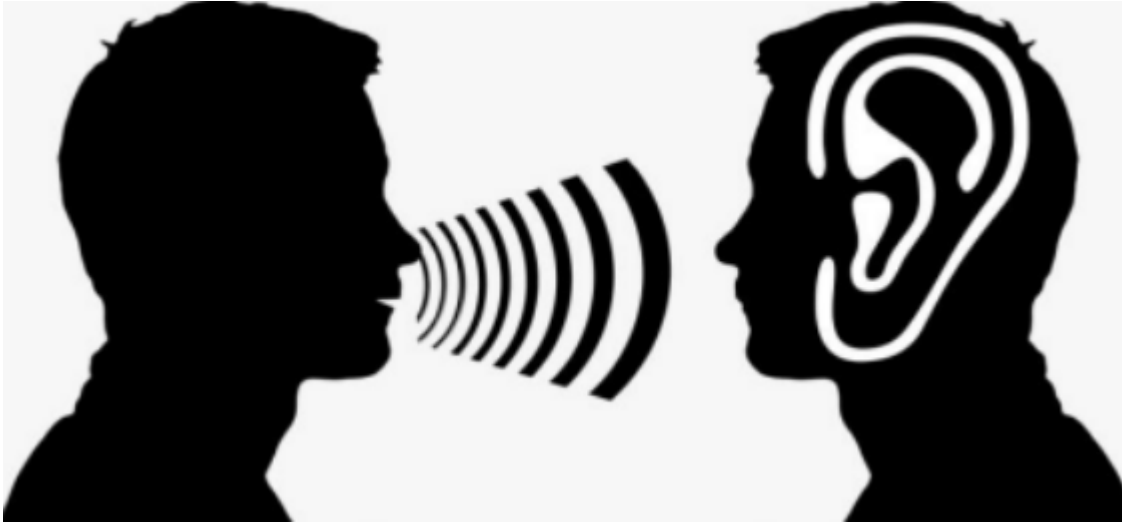
Listening Skills

The people of the World are islands shouting at each other across a sea of misunderstandings."

-George Eliot

Listening is an integral part of the communication process. A good communicator is also a good listener. Most of the class toppers claim that they could do academically well because they carefully listened to what their teacher said. In fact if you want to be successful, you essentially need to have excellent listening skills so that you can respond accordingly and communicate effectively. Listening is required in every aspect of life, be it personal or professional. For instance, A Judge listens carefully to all the witnesses and evidences before pronouncing the judgment, a clinical psychologist carefully listens to what his patient has to say to understand the crux of the mental ailment and then prescribe curative solutions accordingly, a parent has to patiently listen to the baby to understand what is going on in the child's mind, a doctor listens closely to the patient to understand the symptoms and so on.

What is Listening?

Listening is the ability to not only hear but also interpret, grasp, understand and internalize what you hear so as to make the communication process complete and effective. Listening is an art. The more you practice it, the better you become at it. The speaker has to not only listen to the verbal signals but also the non-verbal signals to make conversation successful. Active Listening is the core skill of Effective communication.

Difference between Hearing and Listening

HEARING	LISTENING
•Is physical process	•Is mental process
•Is passive	•Is active
•Through ears	•Through mind and eyes
Casual process that Just happens,involuntary	•Conscious process,requires focus and effort
•Physiological process involving 1 sense organ	•Psychological process involving more than 1 sense organ

Why is Listening Important?

1.Listening actively and attentively is vital to conversation. Listening intently raises the level of communication.
2.Listening is an important skill for building interpersonal skills in both our personal as well as professional lives. Failure to listen sends a negative message of placing low value on other people.
3.Your success at the workplace greatly depends upon your listening skills. At the workplace, You must listen to perform to expectations, avoid conflicts and misunderstandings and to succeed in any assigned task.

SIX SIGNIFICANT FACTS ABOUT LISTENING

1) Effective Listening can be learned -Some people are good listeners, others are not so good at it. Remember, good listeners are made, not born.
 2) Effective Listening requires commitment- There has to be willingness to learn. It is a constant journey that requires time, patience , discipline and constant improvement.
 3) Active Listening skills must be practiced- Practice will enable effective listening to become your second nature. Repetition is the key.
 4) Time is an important tool-Find time and opportunity to develop the skills. Stay motivated an don't give up easily, keep 5) How well you listen to others depends upon your internal communication-The internal dialogue that goes on within your mind has great influence upon how well you can absorb the message of others.
 6) Some effective Listening techniques are more difficult to implement than others-Find out your listening weaknesses and work on them.

What leads to Poor Listening?

The following are the causes of poor listening.
> 1) Weak command over Language and vocabulary-If a listener has this constraint, he may not properly understand the message conveyed and thus it may result in poor listening.
> 2) Difficult physical conditions-a noisy atmosphere around the listener may distract him creating a barrier in listening.
> 3) Non-serious Listening-The temptation to combine listening with other activities especially over the phone often contribute to poor listening.
> 4) Dislike towards the speaker-This creates a psychological barrier and acts as an obstacle in effective listening.
> 5) Impatience-If the speaker is too slow, the listener is short of time or assumes he knows what is coming or when we want to show off our knowledge by speaking, it leads to poor listening.
> 6) Information overload-When an excessive amount of information leads to distraction and boredom, the listener misses out important information leading to poor listening.

Ineffective listening styles

•The Missing in action Listener
(physically present,mentally absent,blank look)
•The Distracted Listener
(doing 2 or more tasks at a time,no eye contact,constantly nods)
•The selective Listener
(hear what they want to hear,ignore what does not conforms their beliefs)
•The contentious Listener
(Listens only to reject,disagree)

Effective listening styles

•Content Listening
(Goal is to understand)
•Empathetic Listening
(Goal is to evaluate information)
•Active Listening
(Goal is to gain insight to solve a problem)
•Critical Listening
(Goal is to appreciate)

7 Steps of Being a Good Listener

STEP 1 : State your Intention to Listen

Clearly convey the msg to the speaker that you are interested in listening what he has to say by stating any relevant expressions"I am all ears.", "Please say, I am listening to you", "Go on, that sounds interesting"

STEP 2: Manage Physical Environment

Cut down noise,distractions,children playing,songs/music playing,Tv volume,poor network, cooker whistles,grinder on , dogs barking etc, create a peaceful environment in order to focus.

STEP 3: Make Internal Commitment to Listen

Mentally prepare yourself to listen carefully and note down points if need be, stop internal dialogues/parallel thinking/parallel singing etc.

STEP 4: Ask apt Questions

Ask open ended ,close ended relevant questions in order to gain better clarity and thereby signalling the speaker that you are keenly listening to him

STEP 5: Participate Actively

 listen, nod , show interest,ask Qs,make notes if speaker allows

STEP 6: Assume Listening Posture

make eye contact,nod where necessary, speak little where required, do not show boredom or impatience,don't watch clock,give undivided attention,read non-verbal cues as well

STEP 7: Avoid Talking

Don't speak/chip in between,let the speaker finish,ask him to continue/carry on,never interrupt unnecessarily, be natural and genuinely interested

Let's Reflect:

Q1.Can you share an experience when you felt bad because you were not adequately listened to by someone?

_____

___ _____

_____ _____

_____ _____

_____ _____

_____

_____ _____

_____

_____ _____

Q2.Can you share an experience when you were satisfied that someone patiently listened to what you said?

_____

___ _____

_____ _____

_____ _____

_____ _____

_____ _____

_____ _____

_____ _____

Q3. Now compare the above two instances and tell which experience made you happy and why?

_____

___ _____

_____ _____

_____ _____

_____ _____

_____ _____

_____ _____

_____ _____

Q4. How much would you rate your self on a scale of 10 for listening skills. Why?

_____

___ _____

_____ _____

_____ _____

_____ _____

_____

_____ _____

_____

_____ _____

Q5. What would you start doing from now onwards to become a better listener?

_____

___ _____

_____ _____

_____ _____

_____ _____

_____

_____ _____

_____

_____ _____

Q6.What will you stop doing from now onwards to become a better listener?

_____

___ _____

_____ _____

_____ _____

_____ _____

_____

_____ _____

_____

_____ _____

14

Session 21

Communication Skills

Reading Skills

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Reading Skills

It's important to understand the concept of various reading techniques like scanning and skimming. Knowing these techniques can help you vary your speed based on the text and time given. It also makes us capable of withdrawing conclusions from the information scanned/skimmed.

Scanning:

When we are looking for a specific piece of information, we do not read each and every detail given in the reading material; rather we quickly run through it. In other words, we scan the passage to locate the information we want. For example, we scan through-

- the telephone directory to locate a phone number
- a page of a dictionary to find out the meaning of a word
- the newspaper to locate a piece of news or information, e.g. Tour packages being offered by different travel agencies
- a chapter in a text to locate specific information

Skim & Scan

Strategies to help you find the information you need!

Created by Kristen Vibas

Skimming:

Skimming is one of the tools you can use to read more in less time. Skimming refers to looking only for the general or main ideas, and works best with non-fiction (or factual) material. With skimming, your overall understanding is reduced because you don't read everything. You read only what is important to your purpose.

Difference between Skimming and Scanning

Skimming is reading rapidly in order to get a general overview of the material. Scanning is reading rapidly in order to find specific facts. While skimming tells you what general information is within a section, scanning helps you locate a particular fact.

How to attempt reading comprehension

You may get to appear in some tests and "reading & comprehension" is a common section to assess reading skills of candidates. In this section, you will get a paragraph to read and some questions to answer.
These questions can be of 6 types:

- Questions that ask about the main idea
- Questions that ask about supporting ideas. (Hint - these all support the main idea)
- Questions that ask you to make inferences
- Questions that ask about the author's tone/point of view
- Questions that require you to make an analogy or to hypothesize what would happen under different conditions
- Questions that ask about the logic of the passage. This means the structure/ purpose of the argument. What is the passage trying to accomplish?

Process you can follow for reading and comprehension:
- First read the title
- First sentence of each paragraph usually gives away the topic of the rest of the paragraph
- Look for keywords
- Read in blocks
- Read the questions first (but not the answer options)
- Take notes
- You don't necessarily need to know the details

Activity: Reading & Comprehension

When: during session
How: Read the Passage Below and Answer the Questions)

We must do all we can to stop conflicts and civil war. Most conflicts happen in poor countries, especially those which are badly governed or where power and wealth are not distributed fairly between different tribal or religious groups. So the best way to check fighting is to make a political arrangement in which all groups have their representatives. The need is to ensure human rights and economic development of all.

The next fundamental freedom is one that is not mentioned in the UN charter. In 1945, the leaders could not imagine that such a situation would arise. That is the freedom of future generations to live on this planet. Even now many of us have not understood its importance. We are using up the limited resources for our present use. We are over using and even wasting them. We are, in fact, robbing our children of their right to live. We must preserve our forests, fisheries and wildlife. All of these are collapsing because of our own habit of consuming or destroying them.

1. Most wars happen in which countries?
Answer: _____

2. Which is the best way to check fighting?
Answer: _____

3. How are we robbing our children's right to live?
Answer: _____

4. Which Freedom is not mentioned in the UN Charter?
Answer: _____

5. Name one Limited resource mentioned in the Passage?
Answer: _____

Answers: 1-Poor, 2-Making political arrangement, 3-By over using limited resources, 4-Freedom of Future Generations, 5- Forest

Activity: Reading and making a decision

When: during session
How: Read the situation and do the needful under trainer's guidance

Situation: You are planning to take a short break from work without spending much time and money. You come across the following pieces in a newspaper. Scan through them to decide which place would be the best option.

Coorg

Madikeri, the district headquarters, is the only gateway to Coorg. The misty hills, lush forest and coffee plantations will cast a spell on you. Find a resort, coffee estate or stay in a home for a truly Coorg experience.
By Air: The nearest airports are Mangalore (135 km) and Bangalore (260 km). There are flights to Mangalore from Mumbai and to Bangalore from Ahmedabad, Chennai, Delhi, Goa, Hyderabad, Kochi, Kolkata, Mumbai and Pune.
By Rail: The nearest railheads are Mysore, Mangalore and Hassan.
By Road: There are two routes to Coorg from Bangalore. Both are almost the same distance (around 250-260 km). The route via Mysore is the most frequented one. The other route is via Nelamangala, Kunigal and Chanrayanapatna.

Kumaon

Kumaon is a place which dreams are made of. Be it Ranikhet, Nainital, Bhimtal, Pithoragarh or Almora - they form the rich, picturesque mantle of Kumaon.
If you really want to relax, then visit only one place at a time. The fabulous Kausani is one of the many queenly haunts of Kumaon. October is great when the going is comfortable, the air bracing, balmy and crisp.
You have two choices to reach there. Either you can go via Ranikhet or via Almora. Either way the distance is more or less the same for Kausani, which is around 303 km. From Delhi one can go by train till Kathgodam. Convenient bus and taxi services are available from Delhi and Kathgodam. Ideally, take your own vehicle. The Kumaon Mandal Vikas Nigam Guest House provides excellent accommodation. It offers rooms between Rs. 250 to Rs. 800.
Kausani is famous for its sunrise and sunset. One is completely mesmerized by the sight. The area has a number of pilgrimage spots. Simply sitting and gazing at the distant peaks is rejuvenating for the people living in polluted Delhi.

Activity: Reading and making a decision

Dhanaulti

Dhanaulti is a romantic getaway: covered with snow, few people around, an early morning mist to give you the feeling that you are walking in the clouds. Lambs gambol in meadows. The beauty of the pine forest can transform you.

The drive from Mussoorie is grand. In March, the mountainsides are mantled with alpine flowers, wild pear and apple blooms and the rhododendron sets the forests afire with its ruddy flowers. Round the year it is great for trekkers. When you reach Dhanaulti, stroll down in any direction. No vehicles and no pollution. Tracks lead through deodar and pine and you come upon stone house clinging to mountainsides.

There is a great variety of birds: the blossom-headed parakeet, the flycatcher, the whistling thrushes, Tickell's thrush, chloropsis or the greytit. Take the loop and come down via Mussoorie, 25 km away and watch the white-cheeked bulbuls and the blue magpies.

From Delhi, you can drive to Mussoorie that is about 250 km, then to Dhanaulti; or, take the train to Dehradun, then drive three hours to Dhanaulti. GMVN Guest house offers rooms for Rs. 250 to Rs. 400. Dhanaulti Breeze rooms provide rooms from Rs. 800 upwards.

Justify your choice: (give two reasons)

i)._____ ____

_____

ii)._____ ____

_____

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Session 22

Communication Skills

Extempore- Let's Speak

Extempore- Let's Speak

Priya's story:

Priya was a young businesswoman who was earning good money and fame because of her work. After getting success in her community, she wanted to scale her business to other towns. To be able to do this, she had to collaborate with other people and get investments by pitching her ideas to the investors. Her ideas were really impressive but she was not able to express them in her conversations. Everytime she ended a meeting, her regret followed her for not being able to share her ideas. She lacked confidence and habit of speaking on the spot.

Isn't it the story of most of us? We have a lot of thoughts but we fail to articulate them well. Let's use the extempore to overcome this fear.

Extempore:

The literal meaning of Extempore is "At the Time" a situation where you speak on a topic without any pre planned preparation.

Some topics that you can practice speaking:

- 3 life lessons I have learned
- The best vacation I have had
- My favourite book/ person on the earth/ place to visit
- The future of our country
- What makes a person successful
- The power of habit
- The happiest day of my life
- A turning point in my life
- If I were the Prime Minister of our country
- If I were given a chance to be invisible for a day

Areas to Focus on for an Effective Extempore:

- Content Knowledge
- Confidence
- Voice Modulation
- Time Management
- Instant Thinking
- Communication
- Comprehension
- Idea Generation

Activity: your suggestions for Priya

When: during session

How: After reading Priya's story at the beginning of the session, share atleast 5 suggestions for her to become a confident speaker

_____

_____

_____

_____

_____ _____

_____

_____

_____

_____ _____

_____

_____

Students are expected to Complete the following after their completion of Extempore Module:

List 3 Benefits of Extempore that you came across:

- i)
- ii)
- iii)

Write any 5 Tricks that helped you to deliver a successful Extempore

- i)
- ii)
- iii)
- iv)
- v)

Note: Fill the points based on your experience

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Communication Skills

Body Language

Body Language

Today, this term has assumed so much importance and prominence in all spheres of life that without a positive body language, none of us can survive in the professional arena, personal lives, and in the world, in general. For example, you are facing a job interview and the interviewer is questioning you. Now, although you are polite and replying well to the questions, the interviewer may still not select you. The reason is very simple. Perhaps your body posture or body movements were not appropriate or were rude. This may have led the interviewer to think that you are either not interested, or you are not a good candidate for the job profile.

Body Language is non verbal communication, often described with physical gestures to convey a message.

See the picture below and recognise how the body language is changing as per the feelings of people.

Image Source: https://www.verywellmind.com/
https://www.quora.com/   Img: https://coolumchiropractic.com.au/fun-and-easy-exercises-to-improve-kids-posture   https://www.pngwing.com/en/free-png-nhigz/download

Stand Erect

The first point to be kept in mind is to stand with the spine erect. You must not slouch or hunch. Hunching or slouching gives an impression of laziness and lethargy. Bad standing posture also symbolizes low self-esteem. This is not a good attribute to sport while standing.

Image Source: https://www.verywellmind.com/
https://www.quora.com/   Img: https://coolumchiropractic.com.au/fun-and-easy-exercises-to-improve-kids-posture   https://www.pngwing.com/en/free-png-nhigz/download
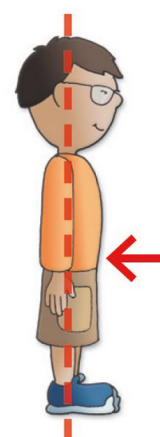
Free your hands

Next point to be careful about is to not put your hands inside your pockets, while talking to someone. This posture shows disrespect. Keeping hands in the pocket or closed shows that a person is not interested to talk. Remember that arms are the vocal cords of body language and can speak volumes about your attitude and interest.

Don't stand with crossed legs

The standing leg cross is a body gesture of defiance, defensiveness and submission. This is the posture that is mostly adopted by people when they meet others who are complete strangers. This posture is considered to be defensive in nature. Hence, such a gesture shows that the person is not confident of oneself, or in other words, lacks self-confidence.

Original smile vs. Fake Smile

There are many traits of an original smile. Whenever a person smiles naturally, without any voluntary force, wrinkles are created around the eyes. This is because in an original smile, the lip corners are pulled up and the muscles around the eyes are contracted. In a fake smile, only lip movements happen. People giving fake smiles smile only through their mouth and not eyes. Research has proved that the more a person smiles, the more positive reaction he/she gets from others. There is one more way to detect false smiles. When a person tries to fake a smile, the right hemisphere of the brain – the one specializing in facial expressions – sends signals only to the left side of the body. Hence, a fake smile will always be stronger on one side and weaker on the other side. However, in a genuine smile, both parts of the brain send signals and hence, the smile is equally strong on both the sides.

Eye contact and Eye blinking

If the person's eyes are looking away from you, then you must realize that the person is bored of you and it is better to either change the topic of discussion or leave. Interview body language experts suggest that when you are doing the talking you need to hold eye contact for periods of about 10 seconds before looking away briefly and then re-establishing eye contact.

Image Source: https://www.verywellmind.com/
https://www.quora.com/   Img: https://coolumchiropractic.com.au/fun-and-easy-exercises-to-improve-kids-posture   https://www.pngwing.com/en/free-png-nhigz/download

The rate at which your eyes blink is also a conveyor of valuable information. If you are interested in someone or someone's talk, you will not bat an eyelid as often. However, if you are not interested in someone, your rate of blinking your eyes will increase dramatically. Increase in the blinking rate of the eyes conveys disinterest or boredom.
`

Nod your head while listening to the other person

Nodding your head while listening to the other person is an additional way to show attentiveness. Nod your head occasionally to let them know you are enjoying and understand what is being said.

Handout

A Handout is written material given to inform or provide students with additional information.

Activity: A picture says it all

When: during the session

How: Look at the photographs below, and write a caption in 2-3 sentences on what you think their body language is saying.

Image Source: https://www.verywellmind.com/
https://www.quora.com/   Img: https://coolumchiropractic.com.au/fun-and-easy-exercises-to-improve-kids-posture   https://www.pngwing.com/en/free-png-nhigz/download

Quiz:

1. Body Language helps us to _____?

a. deliver effective non verbal communication

b. It is just a myth

c. Learn a specific language of body

2. Standing/Sitting Erect is an indication of ?

a. Back Problem

b. Confidence

c. Low Self Esteem

3. Keeping your hand in your pocket while talking to someone is a sign of ?

a. Overconfidence

b. Disrespect

c. Attentiveness

4. If you nod your head when someone is speaking, this is an indication of?

a. Getting Bored

b. Passing Time

c. Being Attentive

5. Which of the following body part is considered as Vocal Cord of Body Language?

a. Arms

b. Eyes

c. Head

Answers: 1-a,2-b, 3-b, 4-c,5-a

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Session 24

Professional Reliability

Grooming and Etiquette

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Grooming and Etiquette

Clothes and manners do not make a man or a woman, but when he/she is made, they greatly improve his appearance. Whether this is real or imaginary the most important fact is that your appearance influences the opinion of everyone around you.

Personal grooming is a way of life. It is a process of making yourself look neat and attractive. These are the things which you do to make yourself and your appearance tidy & pleasant. Everyone should go about grooming themselves well for their own satisfaction, for boosting their image and self-esteem.

By following these basic personal grooming tips, you can ensure making a good impression on people who meet you, as well as those around you.

Face

Your face is the first point of contact when you meet someone. You don't need makeup to make a good impression. Just keep your nostrils clean, your eyes crust-free, eyebrows trimmed, and avoid unwanted facial hair.

Skin

As a general rule, keep your skin clean and dry. Not sweaty or sticky. Just cleanse your skin everyday and apply a suitable moisturizer

Hair

Like your skin, keep your hair clean and dry. Also, keep a tidy hairstyle. Hair shouldn't fall over the ears, eyebrows or even touch the back of the collar. In case you have long hair make sure to tie them properly. Well combed hair with minimal accessories is the key to go.

For men, facial Hair should be well trimmed, with a proper shape of Moustache and SideBurns. If you have a patchy beard, it is always suggested to shave it.

Nails

Nail art is great but avoid dirt under your nails. And cut nails in the right shape. There are people who chew their nails when they are nervous or upset, you should try to avoid that.

Feet

No cracked heels. No dirty toenails. Avoid smelly socks. If you tend to sweat too much through your feet, put some baby powder in your shoes before wearing them. It won't do any changes to your appearance, but it will definitely help you not feel self-conscious about your sweaty feet. And that will help you focus your mind on other important tasks around you.

Shoes

Wear shoes that don't make you limp or drag your feet. Also, wear shoes according to your age, occasion and use.

Clothes

Always go for well fitting clothes. Wear your current size, not the size you want to be. Wear the style that's appropriate for the occasion and place you are going to. Feel comfortable and classy.

If you are supposed to wear Uniform in your organisation or college, always wear a clean and well ironed uniform. It's good to keep a spare uniform with you, apart from your regular ones.

Mens Dressing Formal and Business Casual:

- Mens formal dressing includes a plain formal shirt, trousers, coat/blazer and tie.
- Always use a tie if you are wearing a coat or blazer.
- If you don't have a tie, a simple formal shirt, shoes and trousers would do.
- For Business Casual: Trousers can be replaced with chinos.
- Socks: Full length socks in formal attire, one can use ankle length in Business Casuals. Wash your socks daily and never repeat the old unwashed socks again.
- Accessories: Wrist watch (avoid sporty watches), Clean White Handkerchief,

Women's Formal:

- Shirts (Solid, Micro & Broad Stripes, Micro & Broad Checks, Printed, 3/4th sleeves)
- Trousers (slim fit, straight fit, stripe, plain)
- Blazers, Suits
- Skirts
- Salwar Kameez
- Accessories (Scarves, ties, belts, purse, jewelry, sandals, shoes)

Handout

A Handout is written material given to inform or provide students with additional information.

Activity: Checklist for Image building

When: during session:

How: under trainer's guidance, fill the sections in the checklist

Personal Hygiene and Grooming	Appearance	General Etiquette

Activity: Quiz

When: during session:

How: under trainer's guidance, fill the sections in the mind map

1) Unlike social etiquette, office and business etiquette are primarily based on :

(A) Hierarchy and Power
(B) Personal relationships between co- workers
(C) Common sense and courteously
(D) Option a and c

2. You invite an out-of-town client to dinner to discuss work; you should:

(A) Take them to your favorite sports bar that's showing an important game
(B) Take them to an upscale French restaurant with a romantic ambience
(C) Ask for their preference and pick an appropriate restaurant
(D) Invite the client to your office to eat fast food

3. Your office culture allows you to keep personal items on your desk and in your cubicle. You:

(A) Fill your desk with pictures of family and friends, kids' artwork, favorite knick & knacks.
(B) Balance personal and office items in your cubicle. One in five objects on your desk can be personal
(C) Avoid displaying anything other than work-related items on your desk. It is inappropriate for your attention.
(D) Your cubicle is a mess of scattered papers, so you do not have any space for personal items

4. Emails should be replied to within ___ hours while phone calls should be returned within ___ hours.

(A) 48, 24
(B) 24, 4
(C) 4, 24
(D) 24, 24

5. If you eat at your desk, which 2 rules should you always follow?

(A) Eat foods that have low odor.
(B) Don't chomp ,talk with your mouth full.
(C) Eat only healthy foods so you don't tempt dieters.
(D) Never eat at your desk.

6. What do you do if you are expecting a call on your cell phone but you have to go into a meeting?

A. Inform your colleagues that you are expecting a call and may need to briefly leave the meeting when the call comes through.
B. Warn your colleagues that you are expecting a call and answer it freely while in the meeting.
C. Put your phone on vibrate and quickly leave the meeting when the call comes through.
D. Ask the person who is facilitating the meeting to stop for a minute while you take the call.

7. Should you connect with your boss on Facebook or Twitter ?

(A) Yes
(B) No

8. You are running 15 minutes late to a meeting with a client. What should you do?

(A) Stop what you're working on and leave for the meeting immediately
(B) The client is your friend, he will wait as long as you want
(C) Your client won't mind waiting, 15 minutes is nothing
(D) Call the client and tell him that you'll be there in a few minutes

9. A co-worker comes to your office to introduce you to a friend of his. You:

(A) Smile and nod
(B) You stand up, establish eye contact, smile and shake his hand
(C) Wave and tell him how happy you are to meet him
(D) Give him a "high five"

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Session 25

Communication Skills

Presentation Skills

Session 25

Presentation Skills

It's quite common to fear speaking before a group. Some reasons that make you fear public speaking are : Self-consciousness, fear of being judged by others or not being prepared, lacking knowledge etc. Being prepared and practicing more can help you become more confident. The ability to present ideas and information effectively is perhaps the most saleable of all professional skills. A professional is expected to deliver presentations to clients, co-workers, superiors, etc. Let's understand how we can deliver an effective speech/presentation in front of a group of people.

Basic pointers to structure your Presentation:
- Clarity of Purpose
- Knowing the Audience and their perspective
- Opening your Presentation
- Body of Presentation
- Closing your Presentation

Source: Wikipedia

Starting the presentation:

Grabbing the attention of your audience is very important when you are starting your presentation. So, start with a bang. You can either keep it simple to start with your Introduction or you can make it more interesting by starting with a question, data, story. Have high energy, loud volume and engaging expressions on your face when you start.

Main body of the presentation:

After making a good first impression at the beginning of the presentation, you can continue with engaging and relevant content to explain the what, why and how of your topic.

Closing the presentation:

Your conclusion is the most important part of your speech and the most important part of your conclusion is your final message that you want your audience to remember. Plan a closing activity to ensure that you are leaving your audience with the message, energy and feelings that you had intended for.

Here are some interesting rules that you can follow while planning your presentation.

10-20-30 Rule:

6 X 6 Rule:

This rule indicates that you shouldn't have more than 6 words in each line and not more than 6 bullet points in each slide.

Source: Wikipedia

Activity: Group Presentation

When: during session:
How: Choose a topic and plan & deliver

Steps for preparation:

1. Decide the storyline of the presentation.
2. Decide the role of each team member in the presentation (who will present what).
3. Rehearse at least once and time your presentation.
4. Discuss about how the team members will introduce themselves (each person will give his/her own introduction or one member will introduce all)
5. Focus on transitions : Ensure a smooth transition, when a person hands over the presentation to another.
6. While presenting, every member in the group on stage should appear alert and energetic. You should not look bored when other members of the team are presenting.

List of topics:

1. Joint family vs Nuclear family
2. School life vs college life
3. How can we deal with pandemics effectively
4. Polythene bags should be completely banned
5. Does dress code really matter at educational institutions?
6. Cricket should be made the national sport of India.
7. Co-ed schools vs single-sex schools
8. Extra curricular activities should be made compulsory in school
9. Importance of English in today's world
10. Social Media - a waste of time or an important communications medium?
11. Is Indian news media socially responsible?
12. Work life balance
13. Importance of plastic recycling
14. Internet has lead to heightened terrorism activities.
15. Upcoming technologies that can change your life
16. Is India ready for a cashless economy?
17. How can our country have a stronger economy?
18. Modern vs Traditional
19. What can we do for gender inclusivity
20. Job vs business

Assessment parameters:

PARAMETERS	Description
Eye Contact	Maintain direct eye contact, seldom looking at notes.
Body Language	Movements should seem fluid and help the audience visualize.
Content	Well-organized and well-articulated, speak about different ideas.
Transition	Transitions contribute to the flow of Presentation
Confidence	Speak clearly and confidently, displaying excellent knowledge of how to use pace, volume and pronunciation to make speaking more interesting
Fluency	Smooth and fluid speech; few to no hesitations; no attempts to search for words; volume should be excellent.

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

Quiz:

1. Pranay has to give a presentation on the topic "Maharashtra Tourism" to the government officials . Which among the following should be his first step?

a. Sit back and relax

b. Download a presentation from Internet

c. Research about the topic and make his own presentation

2. Ayush has made a Presentation but is extremely nervous. Which of the following tasks can help him to fight nervousness?

a. Forget everything and sleep

b. Continuous Practice

c. Give up

3. Mr. X has made a presentation of 40 slides for a time slot of 10 min. What among the below mentioned advice is best suitable for Mr. X?

a. Forget everything and sleep

b. Continuous Practice

c. Give up

4. Which of the following is the best practice for Audience Engagement?

a. Narrate a story based on topic

b. Sing a song

c. Dance

5. What is the 6X6 rule?

a. 6 Slides & 6Points

b. 12 points in 1 Slide

c. 6 words on one line , 6 lines in one point

Answers:

1. C (It is very important in every presentation to do an in depth research about the topic you have been allotted)

2. B (Nervousness is a common scenario and everyone goes through it. The key to fight nervousness is to practice for the presentation that will eventually boost your confidence and eradicate the nervousness)

3. C (The key to a very successful presentation is that you need to have only relevant information on slides, so always try to follow the 10-20-30 rule)

4. A (To capture the attention of audience/listeners in your presentation is all up to your creativity but the most widely practised way is to narrate a story. Dance and Singing in both formal and informal scenarios is often discouraged)

5. C (6X6 rule states that one should have not more than 6 words in each line and not more than 6 points in each slide)

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Communication Skills

Resume Writing

Resume Writing

A résumé is a piece of paper that tells a prospective employer who you are, what you've done, and why they should hire you. Some businesses just want a completed application but the résumé brings extra attention to the application. For most jobs, you will most likely need a résumé. The information you need to complete a job application is similar to that of a résumé . But an employer doesn't need to know absolutely all there is to know about you. They need to know that you have the skills, knowledge, and personality traits needed for a particular job. Resumes tell about your complete information ranging from educational background to corporate experience.

Below are the key elements in a resume:
- Personal Information
- Objective
- Education
- Work Experience
- Awards & Honors
- Activities & Hobbies
- Skills
    -Soft Skills
    -Technical Skills
- References

Tips for Effective Resume:

- Keep your resume to a page or two
- Resume must be chronological
- Keep it recent and relevant
- Try to frame bullet points rather than paragraphs
- Use effective keywords and buzzwords
- Avoid and spelling or grammatical error
- Constantly update it

Sample Resume for Freshers

Name

_____

Contact: Email
         Phone Number
         Address
         LinkedIn Profile Link

Career Objective: _____

Educational Qualification:
Graduation
Name of University/College   (Duration)
(Stream and Specialization)
(Aggregate GPA, Percentage or Grades)

High School (12th)
(Name of College)(Board: CBSE/ICSE/State)   (Duration)
(Stream- Science/Commerce/Humanities)
(Percentage/Grades)

School (10th)
(Name of School) (Board: CBSE/ICSE/State)   (Duration)
(Percentage/CGPA/Grades)

Internship:

Name of Organization   (Duration)
Roles & Responsibility

Skills:

Achievements:
Co-curricular Achievements-
Extra Curricular Achievements-

Projects:

Name of Project   (Duration)
Details

Reference:
Name
Designation
Email Id
Contact Number (Only after permission)

This is a Sample Resume for Freshers, you can use as a reference and make changes according to your information.
Let's walk through each Heading and see what is expected of you.
Resume Starts with your name in Bold with a comparatively big font size.

Contact: Soon after your introduction you share your contact with Email, Contact Number, Address and LinkedIn profile Link.

Career Objective: It is a statement (2-3 lines only) where you mention your short term professional goals. You must write this only if you are a fresher, if you have more than a year of work experience you can avoid this. You may get various framed lines on the internet. Use it for reference but NEVER copy them.

Education Qualification: This section tells about your educational background and scores. It should always start with your most recent quantification and then extend to the past one.
Post Graduation/Graduation details followed by 12th Class details and then 10th Class details.

Internship: Since you are a fresher, it is obvious that you don't have any work experience and it is always recommended to do at least one internship to make your resume strong.
Note: Never mention your internship details as a part of work experience.

Skills: Here you mention the skills you have strong hold on. It can be categorized as Soft Skills (Communication, Presentation, Leadership) or Technical Skills (Python, SQL, Java).

Achievements: Hiring managers not only look for your academics and score but also your achievements during your study period. It is recommended to classify your achievements as Curricular (Related with your curriculum like 1st rank in School Final Exam, Olympiad etc) or Extra Curricular (Related beyond your curriculum like Inter school dance competition, Debate etc.) If you have less achievements you can avoid the above segregation and can mention them together.

Projects: If you have done any project you should mention it in the resume. Give complete details about the project, timeline and learning. You can also mention your Final year thesis project for college.

Reference: To make your resume more effective you can always add references. Here you add details of people who know you or you have worked with. Like your school/college principal, HOD or your manager in Internship. Never share their information in your resume without their permission.

Note: This is just a sample resume, you can add and delete as per your requirements. You can add details like Industry Visit, Any Short term courses etc that can increase your chances of shortlisting.

Activity: Writing Resume

When: during the session

How: Write your resume here, considering that you are applying for a job tomorrow

Note: Always share your resume either through the company's website or via Mail to HR. Never up-load the entire resume on professional networking sites like LinkedIn (as a Post) as it consists of your personal information and can be misused. Use bullet points rather than paragraphs in Resume.

Quiz:

1) Resume is important for_____?

a) Job Application
b) Promotion
c) Increment

2) Career Objective tells the recruiter about your _____?

a) Experience
b) Personal Information
c) Career plans and short term goals.

3) Information in a resume should always be in _____?

a) Bullet points
b) Paragraphs
c) Doesn't matter

4) Which of the following will you mention first under the Educational Qualification Section?

a) Class 12 details
b) Graduation details
c) Class 10 details

5) Which of the following will validate the information you have provided in your Resume?

a) Reference
b) Your Signature
c) Personal Details

Ans: 1-a, 2-c, 3-a, 4-b, 5-a

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Session 31

Communication Skills
Writing Cover Letter

Writing Cover Letter

Cover Letter

A cover letter is a document sent with the resume to provide additional information on your skills and experience. The letter provides detailed information on why and how you are qualified for the job that you are applying for.

A good cover letter

Gets attention of the employer

Tells a lot about your personality

Complements your resume with additional information, rather than simply restating the facts mentioned in your resume

Basic Cover Letter Format:

1. Your name
2. Salutation to the receiver
3. Introductory Paragraph
* Give a catchy opening line along with the role you are applying for and why you are a good fit for the job role.
4. Body paragraph
* Mention your previous positions, projects & skills acquired.

5. Closing Paragraph
* Tell why you are interested in the position, your interest towards the company and what makes you a good fit. (Detailed Information)

6. Call-to-Action
* Convince to make the recruiter move forward with your application.

Tips for an Effective Cover Letter

* Strong opening
* Keep confident writing tone
* Short & Crisp
* Proofread to avoid any grammatical and spelling error
* Be Optimistic
* Research about your Company and job role

Sample Cover letter:

Job Role (e.g. Marketing Executive, Executive Software developer)

(Your Email)   (Your Contact Number)   (Your Address)

Date

Name of Hiring Manager
Organization's name
Address
Email ID of Hiring manager

Salutation,

Introductory Paragraph: _____
_____
_____
(Give a creative opening via an anecdote or quote, mention about the job role you are applying and support it with reasons as to why do you think yourself as fit for the position)

Body Paragraph:
_____
_____
_____
(Basically you have to mention the entire key points of your resume in a detailed manner. Like explain your past job role and responsibilities, how it is related to the current job role. talk about your past Projects,Short Courses, Skills etc.)

Closing Paragraph:

_____
_____
_____
(Conclude by telling why you are interested and you being the ideal candidate for the open position. This has to be very strong as this will convince the recruiter to move ahead with your application)

Closing Salutation

(Your Name)

Activity: Writing Cover Letter

When: during the session

How: Write your cover letter here, considering that you are applying for a job tomorrow

Quiz:

1) A cover letter is a Document which is attached with _____?

a) Resume
b) Job Offer
c) Notice

2) Usually a Cover letter is written to _____?

a) Marketing Manager
b) Finance Manager
c) Hiring Manager

3) The top most heading in a Cover letter consists of?
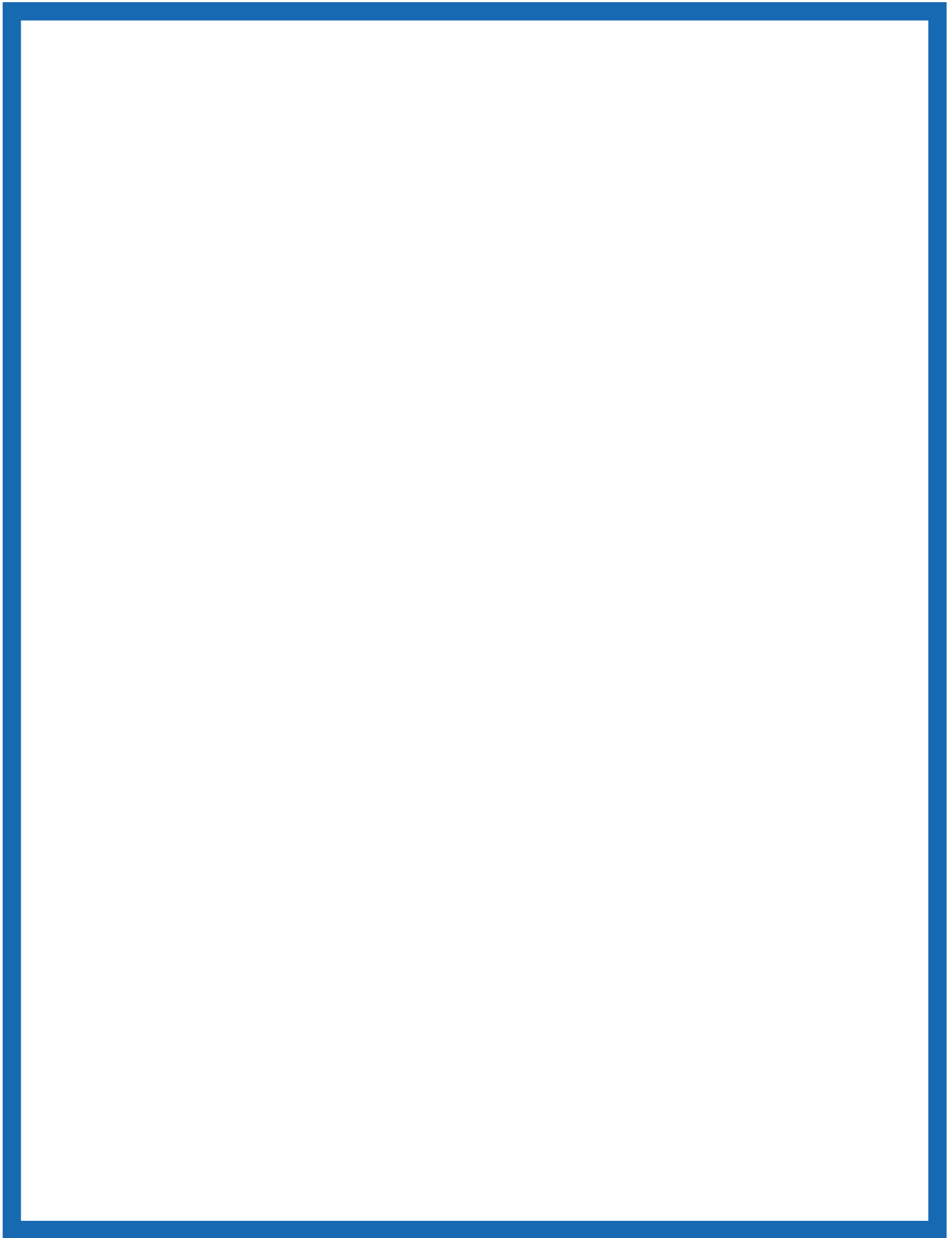
a) Name
b) Job Role
c) Career Objective

4) How is a Cover letter different from Resume?

a) Cover letter is more detailed
b) No difference both are same
c) Resume is more informative

5) For which of the following documents, doing research on Company & Job Role is must?

a) Resume
b) Cover Letter
c) Termination Letter

Ans: 1-a, 2-c, 3-b, 4-a, 5-b

21

Communication Skills

Email Writing

Email Writing

Emails are the fastest means of communication now and are being used all over the world. They are cost effective, easily accessible and serve as a written proof. Being able to write professional emails is very important. You will be using email not only when you get into a job or business, but for reaching out to people to get a job.

Parts of an Email:
Look at the picture given below, see different parts and read their description:

1) To
Here we add the email address of the recipient (receiver's email ID)

2) CC
CC in Email stands for Carbon Copy. If you wish to send the email to someone else other than the receiver you can add his/her email Id in the CC section.

3) BCC
BCC stands for Blind Carbon Copy. It is majorly used for marketing purposes. You must use BCC when you want to send an email to many people and those people don't want their Email address to be shared.

Difference between CC and BCC: When you add several email IDs in CC to multiple contacts, the email address of everyone can be viewed by everyone while in BCC it is hidden. So if you want every receiver to see each other's email ID use CC and if you want to maintain privacy use BCC.

4) Subject
Subject is something which a user sees in Inbox hence it should be short, crisp and to the point.
Example: You wish to write an Email to your team members regarding month end team connect. What do you think is an ideal subject?
1) Team Meeting
2) Team Meeting- 30th March; 6:00 PM

Subject should be short and must deliver as much information as possible. So the second option is a good subject line.

5) Content
After the subject you write the detailed content in the large Box. The content is usually divided in three parts:
i) Opening
ii) Body
iii) Closing

Opening: It consists of salutation and a general introduction. You can use salutations like Dear, Hello, Greetings etc. If you are writing to a person in a designated position you can mention Dear (Most widely used), e.g. Dear Hiring Manager or Dear Mr. Sharma. In case of females if you are confused whether to add Miss or Mrs. it is always suggested to use Ms.
Note: Avoid using Dear Sir/Ma'am
Once given a salutation to the receiver, you must write a general overview (2not more than 2 lines) about why you are writing this email. It can be for various reasons like application for leave, Job Application, Request Emails and many more.

Body: Here you give detailed information about the reason you mentioned in the overview. For Example if you wish to apply for leave. Mention the reason for leave, exact days of leave, mention leave duration with the help of dates and any other relevant information.

Closing: In a formal closing part you have to mention your details, like Name, Contact,. Also you can ask the receiver to go through the file or documents that you have attached (if any). The most common and safe closing can be:

Sincerely/Regards
(Your Name)
(Your Contact Number)
(Organization) if applicable

It is important to note that the opening and closing depends on the context of Email. For example if you are sending an appreciation mail the closing will change from Regards to Best Wishes, in a request email it will be changed to Thanks in Advance or Simply Thanks etc.

Rules for writing effective emails:

Just like letters and applications, every mode of communication has some rules that we need to follow. Email writing too has many rules that we should keep in mind as it's the most widely used and professional mode of communication. Learn the following rules to make a good impression on your future employer.

1. **ALWAYS** include a meaningful heading in the subject line along with a brief outline of what the email body will include.
e.g.
[REQ] Request (for a reference)
[ACTION] Action (to be completed)
[FYI] For your information

2. **ALWAYS** address the reader in a professional manner. If you are not sure who the reader is you can see the example on how you could address them. You should make it as personal as possible.
e.g.
Dear Miss Rose
Dear Mohammed
To whom it may concern

3. Round up the main point of your email in the opening sentence.
e.g.
Think about what you would like the reader to do next, what actions they need to take or how the information you are sending is useful for them
Think about what you want to say in advance

4. **DO NOT** use all capital or all small cases unless referring to a known acronym or term that is familiar to the reader.
e.g.
CSDO/ WP/ TTFN/ PAF

5. **ALWAYS** check your grammar before sending and NEVER use slang/ text speak/colloquiums.
e.g.
LOL/WAG1/WUUP2/LY

6. **ALWAYS** keep language professional. If necessary, ask a friend or colleague to proofread before you send the email.
e.g.
Would it be possible to request this information from you?

7. Be concise and polite. **ALWAYS** remember to use 'please' and 'thank you
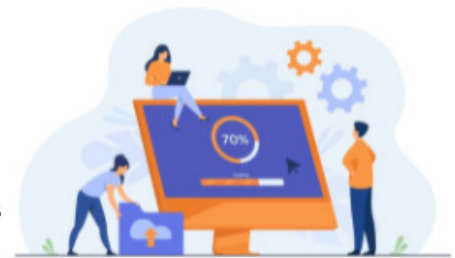e.g.
Thank you in advance for your time

8. **ALWAYS** check for spelling, grammar, punctuation and any careless mist
e.g.
Careless mistakes are more difficult to identify so attention to detail is necessary

9. **ALWAYS** use paragraphs.
e.g.
Ensure that the email is broken up into paragraphs and not written as an essay

10. Add a signature block at the end of the email to ensure the reader has details on how to contact you.
e.g.
Emma Watson
BSc Sociology and Criminology 2nd year
Student ID: 060002365
NOTE: Add address and a contact telephone number if necessary

Activity: Write a formal email

When: during the session

How: Situation: you have completed your graduation and want to apply for a job. You went to the website of a potential employer and found the email address in the contact section. Draft the email that you would like to send to offer your candidature. You can use the name of an existing industry or company while writing the email.

Activity: Do's and Don'ts of
Email writing

When: during the session

How: based on your learning from the email writing session, write at least 5 things that you should do and 5 things that you shouldn't do while writing effective formal emails

Dos	Don'ts

Quiz:

1) Name the following Icons (Hint: Visit your email inbox)

A	B	C	D

A:_____

B:_____

C:_____

D:_____

2) Which of the following is the correct full form of CC (Email Writing)

a) Cartoon Copy
b) Carbon Copy
c) Coupon Copy
d) Collaboration Copy

3) What does BCC stand for?

a) Blind Carbon Copy
b) Before Collaboration Copy
c) Boost Cost Copy
d) Blind Collaboration Copy

4) Rajat wants to send a Marketing Email to 50 prospective consumers. Which of the following features is he most likely to use?

a) CC
b) BCC
c) Subject
d) To

5) Kunal was writing an Email to his boss, but due to an internet connectivity issue he thought to continue the Email later. Name the section of the email, where the incomplete Email would go?

a) Starred
b) Saved
c) Drafts
d) Snoozed

Ans:1) A-Archive, B-Delete, C-Mark as Read, D-Snooze 2)-b, 3)-a,4)-b,5)-c

22

Digital Literacy (21st century literacies) + Communication Skills

Social Media & Networking- LinkedIn

UNDP

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Social Media & Networking- LinkedIn

Social Networking

Social networking is the use of Internet-based social media sites to stay connected with friends, family, colleagues, customers, or clients. Social networking can have a social purpose, a business purpose, or both, through sites like Facebook, Twitter, LinkedIn, and Instagram.
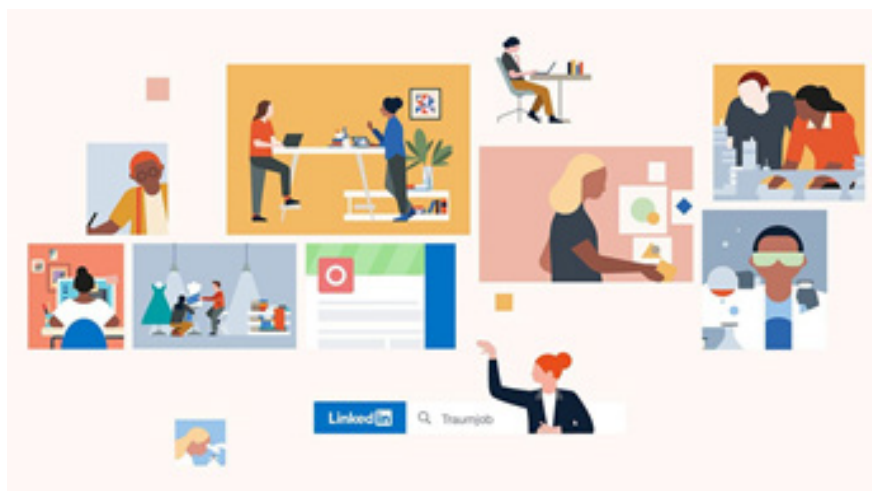
Social Media

A social media (also social networking site or social networking service) is an online platform which people use to build social networks or social relationships with other people who share similar personal or career interests, activities, backgrounds or real-life connections.

Linkedin

- LinkedIn is the world's largest professional network on the internet. You can use LinkedIn to find the right job or internship, connect and strengthen professional relationships, and learn the skills you need to succeed in your career. You can access LinkedIn from a desktop, LinkedIn mobile app, mobile web experience, or the LinkedIn Lite Android mobile app.
- A complete LinkedIn profile can help you connect with opportunities by showcasing your unique professional story through experience, skills, and education.
- You can also use LinkedIn to organize offline events, join groups, write articles, post photos and videos, and more

Benefits of having LinkedIn account:
- Extensive job Listing
- Endorsements & Testimonials from professionals
- Business Connections
- Introduce others to your achievements
- Helps you to research about companies & employees
- Step in new industry

How do I get started on LinkedIn

Step 1: Create your profile
Signing up and creating your profile is the best way to begin using LinkedIn. Through your profile, you can showcase your professional life, milestones, skills and interests. Your LinkedIn profile is a professional landing page for you to manage your own, personal brand. It's a great way for you to tell people who you are and what you do by displaying a general history of your professional experiences and achievements. You can use your LinkedIn profile to add a personal touch that a typical resume or CV may not reflect.

- **Sections you can display on your profile**
Introduction section: The top section of your profile that displays details of your current personal and professional status. This includes:
- Name
- Profile photo
- Background photo

163
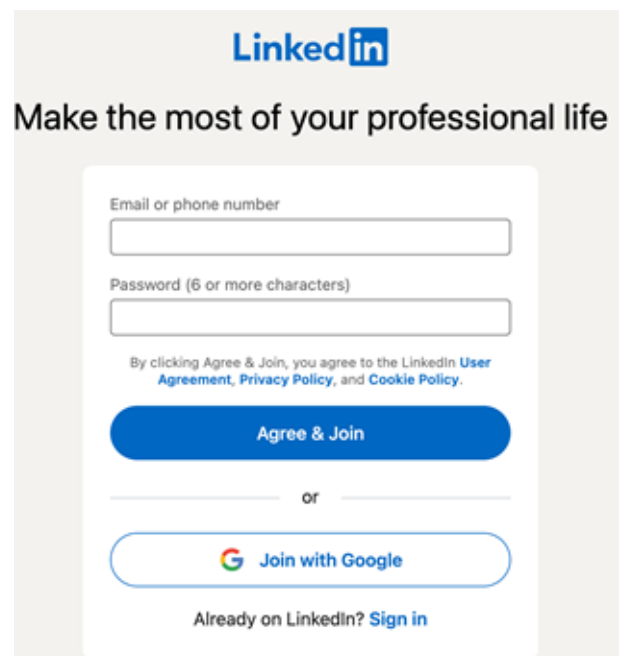
- Headline
- Current position
- Education
- Location
- Industry
- Contact Info
- Summary
- Open to finding a new job, hiring, and providing services

Experience: Professional positions and experience, including jobs, volunteering, military, board of directors, nonprofit, or pro sports.

Education: School and educational information. Recommendations: You can request professional recommendations from your peers.

Certifications: Certifications, licenses, or clearances you've attained. Courses: Adding your body of coursework can help your education to stand out. Honors & Awards: Show off your hard-earned awards.

Languages: Languages you understand or speak.
Organizations: Show your involvement with communities that are important to you.
Patents: Any patents you've applied for or received.
Publications: Publications that have featured your work.
Projects: Showcase the projects you've worked on, along with team members.
Skills & Endorsements: A relevant list of skills on your profile helps others to understand your strengths and improves your likelihood to be found in others' searches.

Step 2: Build your Network
Your network plays a crucial part in unlocking the power of LinkedIn. You can begin by adding your family, friends, past or current classmates, and co-workers to your network. You can also follow people, companies, or topics by navigating directly to the Follow fresh perspectives page, which displays recommended sources to follow. You can use the LinkedIn Events feature to create and join professional events such as online workshops, seminars, sales and marketing events, networking events and more.
Invitations: You can send an invitation to a LinkedIn member to ask them to join your network. If they accept your invitation, they'll become a 1st-degree connection.
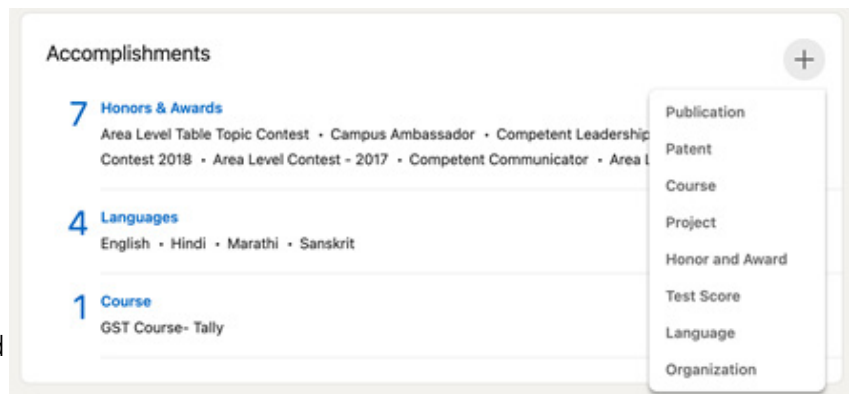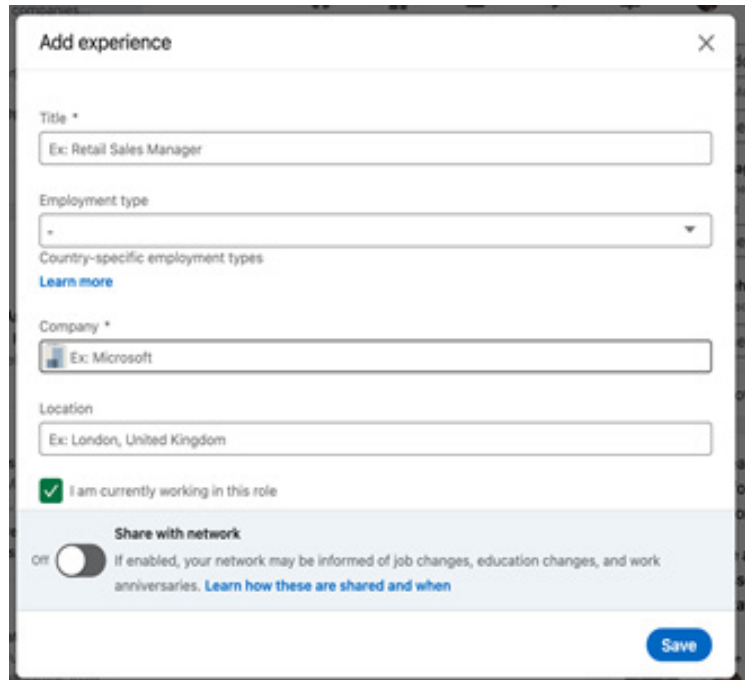
InMail messages: These are private messages that allow you to directly contact any LinkedIn member who isn't one of your 1st-degree connections, while protecting the recipient's privacy.

There are several ways to connect with people on LinkedIn:

Member's profile: Click or tap the Connect button on their profile page.

Search results page: Click Connect to the right of the member's information.

Grow Your Network page: Import contacts using their email address.

My Network page: Accept pending invitations.

People you may know: Click or tap the Connect button below the member's name.

Leverage Connections: Ask a mutual connection to help you connect. Send a message to your existing network asking who can help you connect to a 2nd-degree connection.
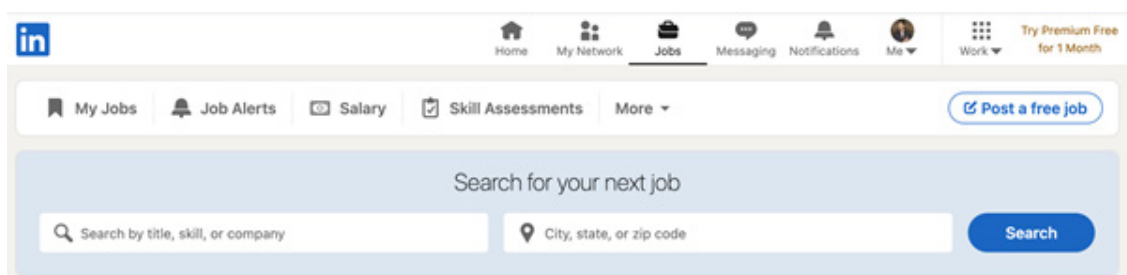
Note:

- Currently, there's no option to personalize your invitation by adding a message when   connecting via mobile devices, mobile browser, and the LinkedIn Lite mobile app.

- Your LinkedIn account may be temporarily restricted from sending invitations if members report invites as spam.

Step 3: Find a Job

If you're looking for a new professional opportunity, you can get started on your job search on LinkedIn. You can easily search for a job on LinkedIn from the job's home page and narrow down your results using filters, keywords and advanced search. You can use LinkedIn to research companies and reach out to the hiring community. You can also apply directly for roles, save job searches, and notify your connections and recruiters that you're open for job opportunities.

Apply and prepare for a job

- Use the Resume Assistant feature in Microsoft Word to create your resume.

- Upload a default resume to use when applying for jobs posted on LinkedIn and save up to four additional resume options for different job descriptions.

- Use the Interview Preparation feature to help you prepare for your interview.

- Keep track of jobs you've applied to on a spreadsheet with dates and notes.

- **Note:**
  You can view all applications for Easy Apply jobs hosted on LinkedIn. Jobs that require application completion on their company website won't be available on this list.

Step 4: Participate in Conversations

- You can easily participate in conversations on LinkedIn. Participating in conversations can allow you to share your perspective on relevant issues and topics with others. You can like and comment on posts and articles on LinkedIn. You can create or join LinkedIn Groups to connect and grow with members who share your interests, experiences, or aspirations. You can also use a set of lightweight expressions called LinkedIn reactions, to easily communicate with your network.

Linkedin Reactions

Like   Celebrate   Support   Love   Insightful   Curious
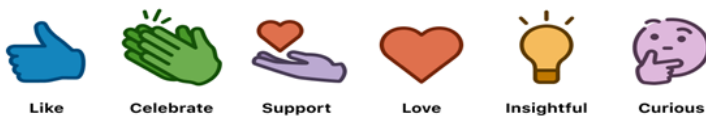
Step 5: Post Content

- You can post and share content on LinkedIn using the share box at the top of the LinkedIn homepage. Use Start a post from the main share box on the LinkedIn desktop experience to view additional sharing options.

- Use **Start a post** to share posts.
- Use the **Camera icon** to share photos.
- Use the **Video icon** to share videos.
- Use the **Document icon** to share documents.
- Use **Write article** to publish articles.

Additionally, you can:

- Use the **Add** icon to view post suggestions.

Once you post an update, it'll be shared publicly, on Twitter, with your connections, or with a LinkedIn Group depending on the visibility you choose.
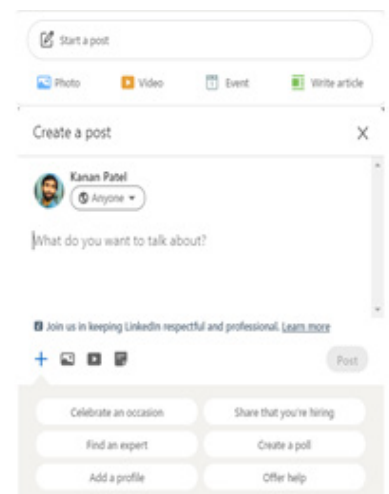
Activity: Creating Profile on LinkedIn

When: during the session
How: Follow the steps below to create your linkedin profile

- Take out your smartphone. Go to the play store >> Type "LinkedIn" in the search bar >> Install app. (If you don't have a smartphone then use a computer)
- Signup by filling your personal details.

- Reflect at the two arrows, each showing space for your Display Photo and Cover Picture respectively. Upload your DP and CP.

- Scroll down to "Your Dashboard", here you can see the number of people who viewed your profile, post views and search appearances (this displays statistics on how many people found you through a search on your LinkedIn).
- You can also find other options below your dashboard. Reflect on the side image.

- Scroll your page down.
- Click on "See all" >> Click on "plus" in the bottom right corner of the page.

- Fill in required details in each section you see in the picture. Make sure to caption details true to your knowledge and mention your "About, Skills, Accomplishments" such that it attracts your connections and recruiters on LinkedIn.

Intro	⌄
About	⌄
Featured	⌄
Background	⌄
Skills	⌄
Accomplishments	⌄
Additional information	⌄

- Now, Go to your home page, this is where your feed appears.

- You can find all the options such as My network, Post, Notifications, Jobs on a horizontal bar at the bottom of your page.

- At the left corner on the top of your page, you will find an option "Your Story". This is similar to the option you use in Facebook, Instagram and WhatsApp to share your status / story. Use this option to upload your professional achievements, certifications, milestones achieved, etc.

- At the right corner on the top of your page, appears an option of "Messages". You can use this option to have conversations with your connections.

- On the top of your page appears a search bar that will help you search your friends, family and colleagues etc.
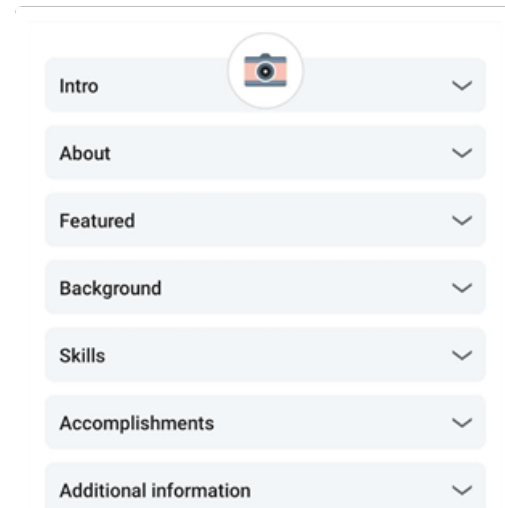
Quiz:

1) Is it possible to set a Job Alert on Linkedin?

a) True
b) False

2) Does LinkedIn offer skill development courses?

a) True
b) False

3) LinkedIn is a social media to have fun and make friends?

a) True
b) False

4) Recruiters can shortlist your application on the basis of your LinkedIn profile?

a) True
b) False

5) Is LinkedIn a source of Entertainment?

a) True
b) False

Answers: 1-T, 2-T, 3-F, 4-T, 5-F

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Session 35

Communication Skills

Social Media and Job Search- Naukri

Social Media and Job Search- Naukri

Using technology for Job Search- Naukri

What is a job portal?

Job portals are job search engine sites that make the process of looking for a job easy and quick. These specialized search engines allow candidates to search for jobs suiting the role candidate is looking for, where, when and other criteria. Various job sites allow one to search many job boards, job postings and associations. Some special job sites can also aid the candidate in finding specific job roles or job roles in specific sectors. There are various job portals available to the candidate based on the needs and preferences of the candidate, such as: monster.com, indeed.com, naukri.com, shine.com and more.

Why use job portals?
There are various ways job portals make the life of candidates easier, here are a few reasons job portals should be used:

- It is easy to use job portals as it opens up the entire workplace market to the candidate at just the click of a button.
- It is cheap, as it only requires the candidate to have a decent internet connection and a resume which is to be uploaded.
- It is universal, as candidates can browse through job opportunities all across the globe.
- It is convenient, as it can be accessed from anywhere at any time.

Common job portals

1. Naukri.com
2. LinkedIn
3. Monster.com
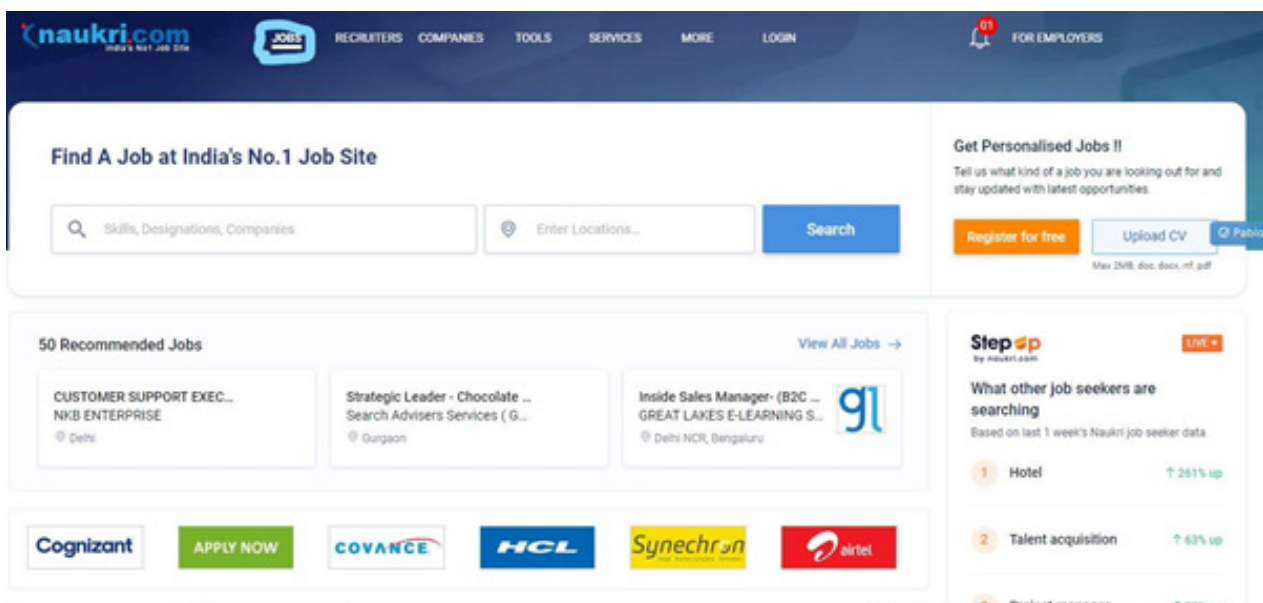4. Times Job
5. Shine.com
6. Indeed.com

In the list above, Linkedin and Naukri.com are the most sought after.

About Naukri.com

Naukri.com is an Indian employment and job portal working in India and Middle East. It has about 49.5 million registered job seekers (Dec 2016)

The platform is operational on both Website & Mobile App.

Naukri Interface:

Benefits:

- Free of cost registration
- Multiple jobs on single click
- Unadvertised Jobs
- Job Application Tracking
- Mobile Friendly
- Direct contact to recruiter
- Access to jobs in Gulf Nations

Source: https://www.naukri.com/blog/

Activity: creating profile on Naukri

When: during the session
How: Fill in the form to organise the information for creating a profile on Naukri.

Naukri.com Profile form	
Name	
Email Id	
Phone Number	
Fresher/Professional	
Your Location	
Preferred Location(Can choose 3)	
Current Industry	
Education - Highest education completed - Course(Full time/Part time) - Speciality during course - University/College - Year of Passing out	
Things you are good at (Add you skills)/ Skills should be as per resume	
Resume Headline/ One line description of your profile	
Upload Resume(Should have your updated resume in your phone)	
Profile Summary Profile summary should mention the highlights of one's career/ education. What are one's professional interests and what kind of career one is looking for?	
Details of project Project titles Client	

Started working from Worked till	
IT Skills	
Certifications	
Desired Career Profile Functional Area Role Desired Job type(Permanent, Full time, Contractual, Part time)	
Other Details Date of Birth Gender Enter your Hometown Enter your area pin code Marital status Enter Permanent Address Category(SC/ST/General)	
Languages Known	

What is a good profile photo to be used for Job Portals?

- Eyes:

Make eye contact with the viewer. Look in the direction of the camera, and focus beyond it. This will create an impression of immediacy.

- Smile:

A smile is important. Show a few teeth if that feels natural to you. Research has shown that smiles showing teeth convey a more likeable impression.

- Dress:

Dress professionally and simply in a current style. Avoid dazzling patterns. Keep the focus on you rather than your clothes.

- Double chins:

Double chins and sagging jaw lines can be camouflaged by moving the jaw forward while holding the face steady.

- Simple background:

A blank wall is best, if possible. The goal is to have something that is not distracting.

How to search and apply for jobs on Naukri

Using Desktop

1. Go to Naukri.com and click on the search bar at the top
2. In the search bar, type a keyskill, job designation or company name. You can also use Boolean search to refine your search query.
3. You can type multiple terms in the search bar. An example would be search as "java, javascript, software engineer" which combines both keyskills such as 'java' and 'javascript' with the designation 'software engineer'. This would look for all three terms to display job listings.
4. Type the location where you would like to get a job in the location field. Select the work experience in years for which you want to see jobs in the work experience field. Select the minimum salary for which you would like to see jobs.
5. Click Search
6. Use filters such as Top Companies, Industry, Salary range, Location, Education, Employer type (posted by company or hiring consultancy), Job Type (International, Premium, Walk-in) and Freshness (how long ago the job was posted) to get more accurate results. These are found on the left side of the search results.
7. You can click the Sort by dropdown at the top of the search results to sort either by relevance or by the date when the job was posted.
8. Click a job listing to view more details about the job
9. Click Apply or Apply on Company Website to apply for the job.

Source: https://www.naukri.com/blog/

On Android and Mobile Web browser:

1. Tap the hamburger icon at the top left corner of the screen. Select Search Jobs option to go to search page
2. OR
3. Tap the search icon in My Naukri Home page to go to Search Jobs page
4. In the search bar, type a keyskill, job designation or company name.
5. Type the location where you would like to get a job in the location field. Select the work experience in years for which you want to see jobs in the work experience field. Select the minimum salary for which you would like to see jobs.
6. Tap Search Jobs
7. Tap the filter icon at the bottom corner to filter and sort the results. You can sort by relevance or job posted date. You can use filters such as employer type, location, education, industry, salary and job type.
8. Tap a job posting and click Apply or Apply on Company website button to apply to the job. Applying on the company website will take you outside Naukri to the company's website.

Quiz:

1) Which is the parent company of Naukri?

Ans: _____

2) Can you register for free on Naukri?

a) Yes
b) No

3) Apart from India, which other regions of the world does Naukri provide strong job opportunities?

Ans: _____

4) Ramesh is a graduate fresher and looking for a Job opportunity in Mumbai, for the role of Business Development. Mention the filters Ramesh can use to get ideal job openings.

Location: _____
Education:_____
Job type: _____

5) Does Naukri offer Learning Course Material?

a) Yes
b) No

Answer: 1) Infoedge 2)Yes 3) Gulf 4) Location- Mumbai, Education- Graduate, Job Type- BDA (Business development associate) 5)Yes

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Session 36

Communication Skills

Interview Skills

UNDP

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Interview Skills

What to Say When You Arrive at the Interview
- When you arrive at the site of the interview you should be prepared to greet and make a quick introduction to the person who greets you. In most cases, it will be the receptionist and/or the secretary.
- You should begin your interaction by stating your name and the reason for your visit. Be courteous and respectful to this first contact at the company. Many hiring managers will ask the receptionist for his or her impression of a candidate. If you act rudely or dismissively, you could put yourself out of the running for the job before you even meet with the hiring manager

What to Say When You Meet the Hiring Manager
- Most of the time you will be asked to wait for a few minutes in a public area of the office near the reception or the department where you will be interviewed. Then, you will be escorted to either the interview room or the interviewers office. Even though your presence has already been shared before you entered the space, you should take the time to greet and introduce yourself.
- Remember to stand up and offer to shake hands even if the interviewer doesn't offer.
- Tell the interviewer that it is a pleasure to meet them, smile, and be sure to make eye contact.

Talking about Skills and Interests

- Over the course of the interview the interviewer pays close attention to your level of self-awareness (how well you know about yourself) and your instincts or the personality traits(showcased through your skills, interests and experience) that come naturally to you (e.g., dedication, teamwork, empathy, etc.). Hence an ideal candidates' responses would position him/her as someone who understands the job role and is suitable for it.

"What are your hobbies?"

This question helps give employers a holistic look at your personality, skills and values.

1. **Never say no**

- If you're asked, "What are your hobbies?" in a job interview, the first and most important advice is to never respond by saying "I have no hobbies". This shows a lack of initiative and interest, little passion, and doesn't reveal anything about your personality or capacity for cultural fit, which is precisely what hiring managers and recruiters are trying to determine.
- When undertaking your job interview practice, prepare an answer to this question that is honest and sincere. Let your response reflect your skills and interests, and paint a picture for prospective employers of the capable and enthusiastic candidate you are.

2**. Make it relevant**

- Whatever activities you enjoy doing in your spare time, when asked "What are your hobbies?" in a job interview, frame your answer in the context of the job and organisation you're applying to work at.
- For example, if you're applying to be a finance analyst, talk about the problem-solving elements of your hobby. If you play competitive tennis, talk about your role in planning all the home and away match logistics for your team, and ensuring cost effective transportation for getting everyone to a range of locations throughout the season. If you're applying to be an IT project manager and you're a passionate reader, talk about how you started a book club and regularly feature books related to IT innovation and transformation. Tell your prospective employers how you regularly lead or facilitate fascinating discussions on this topic.
- While it's perfectly normal that your hobbies will be distinct and different from your work, shine a light on the parts of your hobbies that show off the key technical and soft skills employers are looking for.

3. **Showcase your creativity**

- Do you play guitar, write short stories or make pottery? When answering the question "What are your hobbies?" ensure you acknowledge and celebrate any creative hobbies you undertake. Explain how these activities improve your lateral thinking skills, strengthen your ability to approach tasks inventively and drive your original use of available resources.
- No matter what job you're applying for, there's a role for creativity at every organisation. While as an administrative assistant you might not be creating brilliant imagery on Photoshop every day, creativity is a much broader and more applicable skill. It can be used in all workplaces and industries to solve problems and find innovative solutions to challenges.

4. Be a good sport
- Few hobbies show potential employers your resilience and aptitude for working in a team like regularly playing sport.
- If you're a long-distance runner, this may demonstrate you're persistent when it comes to pushing through challenge and frustration on projects at work. Participating in a hockey or netball competition might highlight an understanding of group dynamics, a level of healthy competition and a willingness to work together to reach a collective goal.
- When answering the question "What are your hobbies?" explain how regular sport or physical activity have enabled you to work well in group situations. There are few roles out there that don't require candidates to be exemplary at this.
- Exercising regularly also improves general health and stress management capacity, reducing the chance of employee illness and longer-term burn out, making you a more attractive candidate to prospective employers.

Talking about Your internship/ Projects/Part time/Full time job
(if these are mentioned in your resume)

Regardless of the phrasing, the most common question asked in interviews is focused on sussing out the candidate's experience:

1. How does your project experience prepare you for this role?
2. Do you think your experience matches the needs of the job?
3. Do you think you're qualified for this position?

How to answer these questions?

- Try using specific examples of how past work prepares you for the new role.
- The most effective response is to describe your responsibilities and accomplishments in detail and connect them to the job for which you are interviewing.
- Share an anecdote and related data, showcasing how you resolved a problem for the team you worked with
- Statistics work. Showing that you increased sales by X percent or saved the company Y amount of money provides a hiring manager compelling argument for offering you the job.
- You want to make sure that your examples are positive and end with what attracts you to THIS job.

Do's and Don't
in order to make a positive impression during interviews

Verbal

- Always start with "Hello", "Good morning." or any other formal form of greeting.
- Another important aspect of the interview greeting is your verbal salutation. Most people say something along the lines of: "Nice to meet you, Mr. Malhotra." Notice how you should state the name of the interviewer with the prefix "Mr." or "Ms." instead of saying the person's first name. Using a prefix is a way of showing respect.
- If you do not know the individuals' name at first, then say "Madam" or "Sir."
- If you and the interviewers are standing, extend a handshake firmly and repeat the person's name as you say, "Ms. _____, it's a pleasure to meet you. Thank you for taking time to participate in my interview."
- Speak loud and clearly, avoid gulping words.Use professional language and avoid slangs
- Be a Good listener. Stay attentive

Non-Verbal

- Modulate your vocal tone to express excitement. Wait until the person is done talking to respond.
- Avoid shaking only the tips of each one's fingers or barely gripping their hands. A firm handshake indicates that you are confident and can be trusted. Wash and dry your hands well before the interview. You do not want to have a wet, clammy handshake. Avoid rushing through the handshake, as doing so can make you appear nervous.
- Smile throughout the opening pleasantries and small talk. Relax your face muscles so that your eyebrows are not furrowed, which can make you appear upset or frustrated.
- Appear as relaxed as possible, keeping your arms uncrossed and your hands out of your pockets. Avoid looking at the floor, but instead look at each individual as you are introduced. Establish frequent but not continuous or piercing eye contact with interviewers. In a group interview, shift eye contact to the various members of the panel. Eliminate fidgeting and shaking of limbs.
- Sit down only when asked to do so by one of the interviewers.

Other

- Do extensive research about the job role and company
- Wear formal dress
- Carry your resume and important documents
- Be Punctual
- Keep your behavioural professional. Neither be rude nor too friendly
- Brush up the basics of your educational subjects and previous job skills
- Be clear about your career goals and future plans
- Last but not the least, prepare well for some pre planned questions like, "Tell me something about yourself, "Your strengths and weaknesses,'' "Walk us through your resume".

Meetings and Greetings at Interview

You:
"Hello, I'm _____ "
"I have an appointment with Ms. Malhotra at 3."

Receptionist:
"Hello Ms. _____. Please have a seat."
(The secretary walks towards you)

Secretary:
"Excuse me, are you Ms. _____?"

You:
"Yes, I'm _____. Hello."

Secretary:
"Ms. Malhotra is ready for you now. Please follow me."

You:
"Thank you."
(Showing you into the office)

Secretary:
"Ms. Malhotra, this is Ms. _____."

Interviewer:
"Hello Ms. _____, nice to meet you."

You:
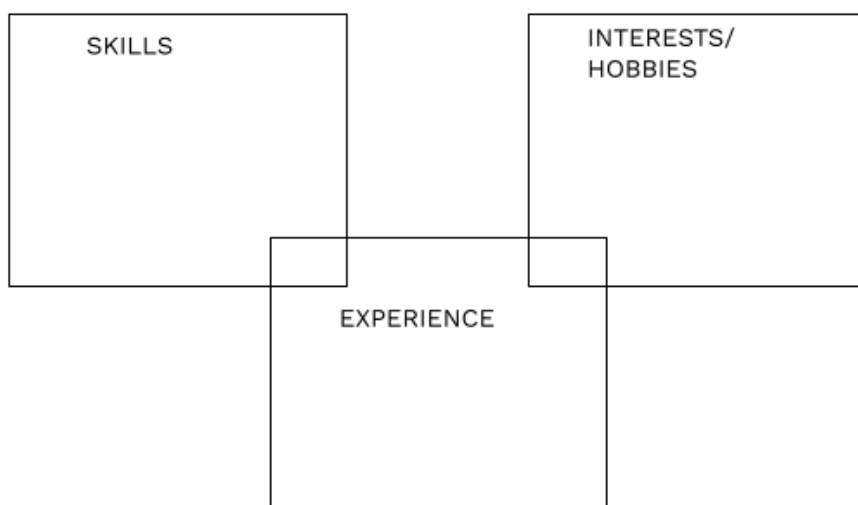"Hello, nice to meet you too."

Activity: An ideal candidate

When: during the session

How: create a list of skills, interests and experience for an ideal candidate and a candidate who is not suitable for the placement.

For an ideal candidate

SKILLS		INTERESTS/ HOBBIES
	EXPERIENCE	
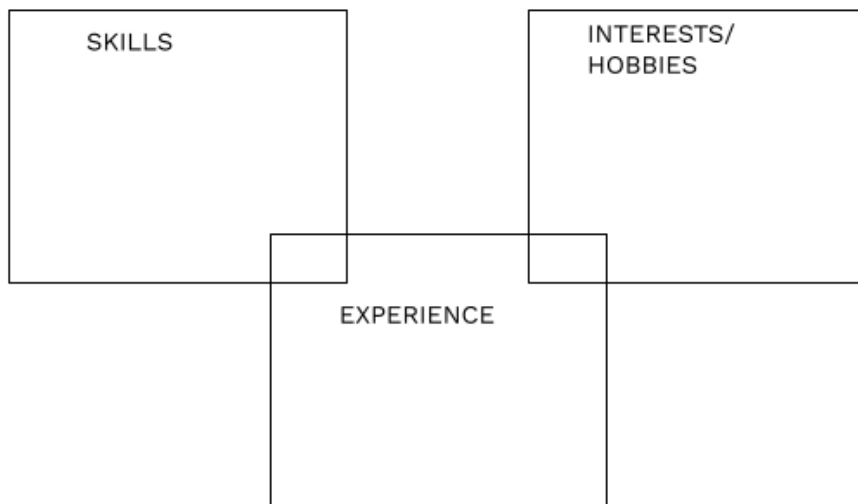
For an unsuitable candidate

SKILLS		INTERESTS/ HOBBIES
	EXPERIENCE	

Activity: Good and Bad Answers

When: during the session
How: write a good answer and a bad answer for the following questions:

	Good Answer	Bad Answer
Tell me about yourself?		
What are your qualifications?		
Tell me about a successful experience you had on a job/ internship?		
Can you walk me through your resume?		
What are you expecting in terms of your salary?		

Quiz: Choose the most suitable option

1) The one who interviews the candidate is called?

a) Interviewer
b) Interveiner
c) Judge
d) Master

2) The person who attends an interview (candidate) is called?

a) Interveiner
b) Interviewer
c) Interviewee
d) Intraviewer

3) Ananya is having her telephonic interview tomorrow. Which of the following skills should she practice more?

a) Grooming Skills
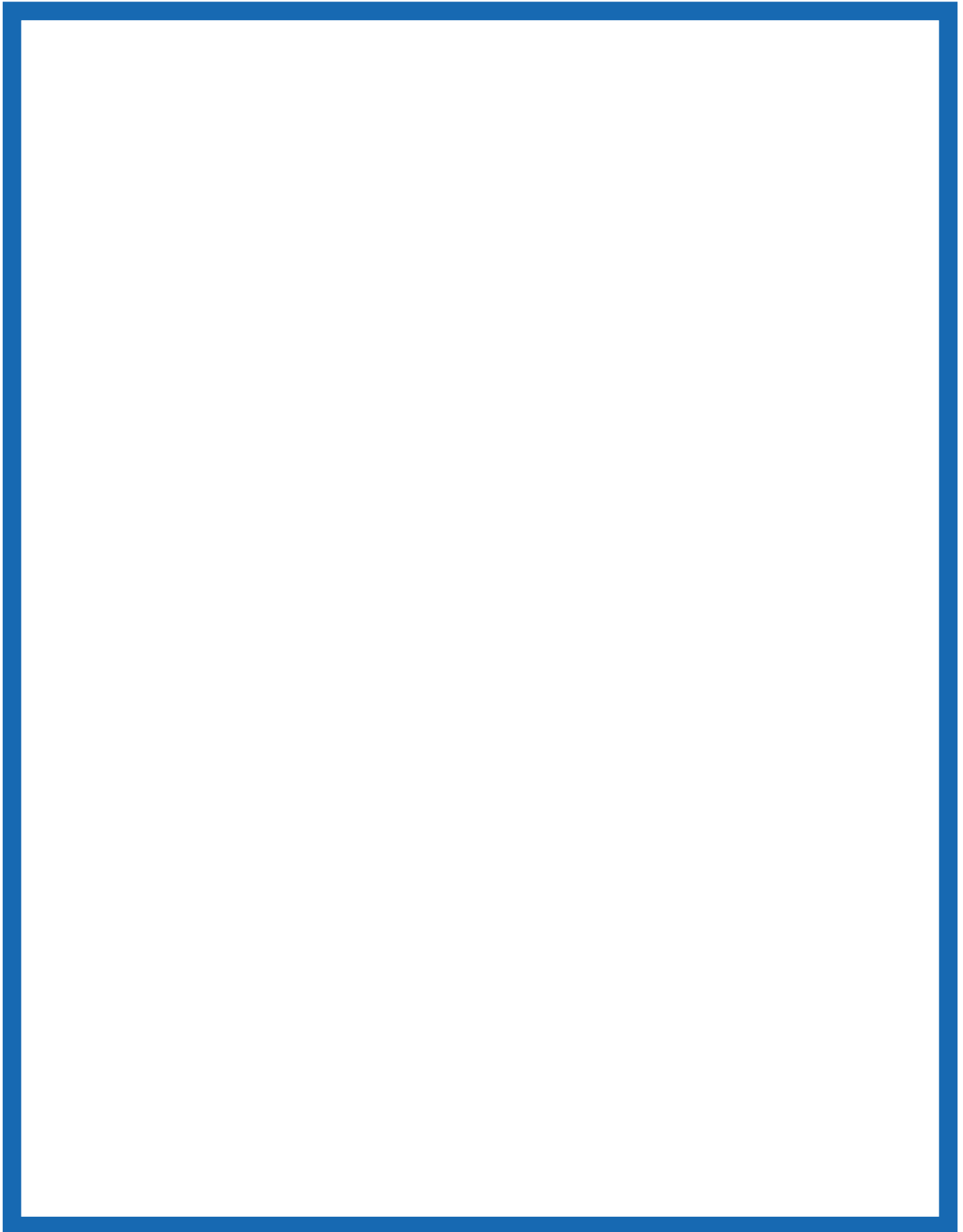b) Communication Skills
c) Presentation Skills
d) Research Skills

4) Which among the following is an appropriate dress code for a Face to Face Interview?

a) Casual
b) Western
c) Ethnic
d) Formal

5) Which among the following is not a step while preparing for an Interview?

a) Analyzing yourself
b) Being Negative
c) Listing your Skills
d) Subject basic revision

Answers: 1-a, 2-c,3-b,4-d,5-b

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Communication Skills
Telephonic Conversation

Telephonic Conversation

In this 21st century Telephonic Conversation has become an extended part of speaking.

Telephonic Conversation requires two basic skills:
* Good Listening Skills
* Good Comprehending Skills

Basic Professional Phrases for Telephonic Conversation:

1. **Greeting and Introducing Yourself**
* Hello, this is Pranay from (Company Name)
* Good Morning/Afternoon, this is Pranay. I am calling regarding (subject, enquiry, Information etc.)

2. **Asking to speak someone**
* Is _____ Available? (Name, Product, Appointment)
* May I speak to _____? (The Doctor, Concerned Person)
* I'd like to Talk to _____. (Mr. Singh)

3. **Asking for repetition**
* I'm sorry- I didn't catch that, could you please repeat yourself?
* I'm sorry- Do you mean to say _____ (Say what you have understood)
* Can you please pardon?

4. Ending your Call
- Thanks for calling and have a great day.
- Thank you for calling and giving your precious time.

Do's of Telephonic conversation
- Speak Clearly
- Use proper language and avoid slangs
- Keep the conversation crisp
- Avoid going off-topic
- Talk in a quiet place and try to avoid any background noise

Don'ts of Telephonic conversation
- Eating while talking
- Getting distracted
- Interrupting the other person
- Sounding bored and disinterested

Quiz:

1) The one who interviews the candidate is called?

a) Interviewer
b) Interveiner
c) Judge
d) Master

2) The person who attends an interview (candidate) is called?

a) Interveiner
b) Interviewer
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3) Ananya is having her telephonic interview tomorrow. Which of the following skills should she practice more?

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b) Western
c) Ethnic
d) Formal

5) Which among the following is not a step while preparing for an Interview?

a) Analyzing yourself
b) Being Negative
c) Listing your Skills
d) Subject basic revision

Answers: 1-a, 2-c,3-b,4-d,5-b

UNDP

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Session 40

Communication Skills
Virtual Interview

Virtual Interview

With the recent outbreak of Covid-19 a lot of processes and methods have shifted on online platforms. This has indeed helped us to avoid physical contact and meetings. One of the biggest affected domains due to global pandemic was Interviews.

Interview is something that cannot be ignored or removed from any process be it a Job Interview or College Admission Interview. Thankfully with advancement into digitization and technology the problem isn't daunting anymore.

Below are few widely used platforms to conduct Virtual Interviews:

- Zoom

- Google meets

- Microsoft Teams

- Webex

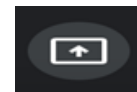## Some basic buttons to understand in Virtual Platform

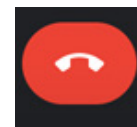1) The Mic button is often used to mute or unmute yourself.
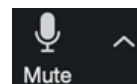
2) Camera image refers to the video, whether you wish to switch it on or off.

3) Screen share or presentation is usually shown with the following image.

4) When the meeting is concluded you can click on the following image to exit or leave the meeting.

Let's understand one of these platforms in detail

Other than the basic features covered above, there are some additional features that most of the video conferring platforms provide. These features can be paid or unpaid. Let's take the example of one platform to understand the interface and features better.

Zoom is the most widely used platform not only for interviews but also for sessions & meetings.

Below are the two interfaces first when you are a meeting attendee and second when you are a meeting host. Let us understand the basic features on both modes:

1) When you are a meeting attendee
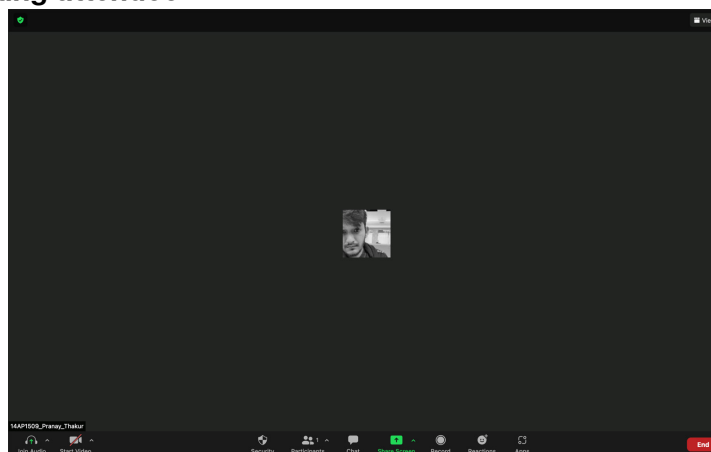
- When you attend a meeting or Interview, you see the above given interface. Starting from extreme left you'll see:
- Mute: This is mic, if you wish to speak something you unmute yourself and when you are done with your part you can again mute yourself.
- Stop Video: This feature gives access to your webcam, you can tap on the button it'll start and stop as per your requirement.
- Participants: Here you can see the total number of people in the meeting.
- Chat: This simply allows you to chat with everyone or any selected concerned person.
- Screenshare: This feature helps you to present things available on your device like PPT or document. This feature can also be used for document verification in case of Interview, you can simply share a screen and show the electronic copy of your documents or identification proof.
- Record: This feature will record the entire interview or session. However, there are low chances that you'll require this in an Interview. In meetings and sessions it sends a notification to everyone so take permission before recording.
- Reactions: In case of Group discussion, this is an additional feature where you can share reactions like clap, raise hand, emoji etc.
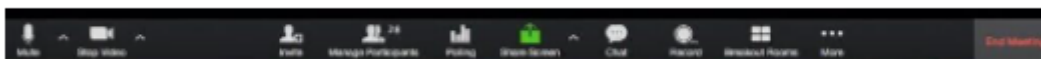
2) When you are a Host

You get several additional features if you are hosting a meeting.
- Manage Participants: You can manage participants, like keep everyone on mute etc. to avoid any inconvenience during the meeting.
- Polling: This feature helps us to get some basic insights via poll.
- Breakout Rooms: One of the biggest features that led to zoom's success. This helps you to create several rooms   to segregate participants of the same meeting   in various rooms for discussion or team work.
- As a host you get the feature of ending a meeting while as an attendee, you get the feature of leaving the meeting.

Basic Etiquettes on Virtual Interview:

- Always check your internet connection. Simply go on google and search "Internet Speed Check" and check your internet speed and stability.
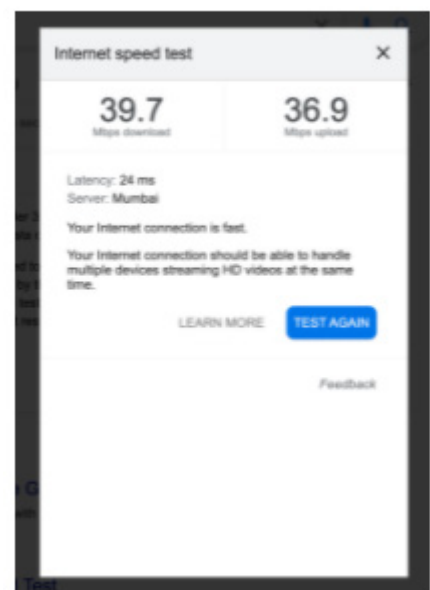
- Check your Audio and Video feature beforehand. A lot of platforms including Zoom give you this feature.
- Get comfortable with the Virtual interview platforms either by connecting with your friend and trying out the basic features.
- Virtual Interview gives you the liberty to connect from home yet you are supposed to be in a decent formal attire.
- Try to keep the background clean without any distraction or revelation. If this is not possible you can also use the artificial background (green screen) feature provided by Zoom.
- Try to practice eye contact by looking at the webcam and avoid looking at the screen.
- Stay in a quiet room, with minimum background noise.
- Switch on the camera as per the directions given during the interview but use the Mic option only when you are asked to do so.
- If you wish to ask any question, prefer a chat feature rather than speaking on Mic.
- Keep a backup option for internet connectivity (e.g. Mobile Hotspot) if there is power failure or wifi issue.
- Make sure your device is fully charged to avoid any power issue.
- Avoid using reaction features or any informal gestures during Virtual Interview.

Quiz:

1) Tick the correct meaning of Virtual.

a. Something that is not on a digital platform.
b. Something that is not physically existing

2) Virtual mode of conversation can help you in _____?

a. Interviews
b. Meetings
c. Trainings
d. All of the above

3) Which of the following features is not available in Virtual Interviews?

a. Chat
b. Screen Share
c. Audio & Voice
d. Friend Requests

4) What are Breakout rooms in Zoom ?

a. Segregation of participants in the same meetings to different rooms.
b. Banning other participants
c. Different meeting for people who couldn't attend the meeting

5) Is recording the virtual interview without permission ethical?

a. Yes
b. No

Ans:
1-d
2-b (We don't thank while initiating conversation on a call)
3-c (No matter what the context is, always introduce yourself
4-d (speak as clearly as possible)
5-b (Record calls of unknown people or your clients for future reference & safety).

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Session 43

Aptitude

Ratio, Proportion and Partnership

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Ratio, Proportion and Partnership

Concept 1: Ratio.

As we already know, that ratio is the comparison of two Quantities by division or the relation that one quantity bears to another with respect to magnitude.

If a and b are two numbers, then the ratio a to b is a/b or a÷b and is denoted by a:b. The two quantities that are being compared are called terms.

The first is called antecedent and the second term is called consequent.

As always, we would be focusing on the underlying concepts, rather than memorizing formulas, following are the types of ratios you would encounter.

i.) **Duplicate Ratio**: The ratio of squares of two numbers is called the duplicate ratio of

$\frac{2^2}{5^2} = \frac{4}{25}$ numbers. $\frac{2}{5}$

For example:

$\frac{2}{3}$ is called the duplicate ratio of $\frac{4}{9}$.

\# In the same way we can understand the Triplicate ratio in which the cubes of the two numbers are called the triplicate ratio of two numbers.

ii.) **Sub – Duplicate ratio**: The ratio of the square root of two numbers is called the sub-duplicate ratio of the numbers.

$\frac{2}{3}$ is sub-duplicate ratio of $\frac{4}{9}$.

Now, you guys give me an example of sub-triplicate ratio in the same way, as discussed here.

iii.) **Inverse ratio or Reciprocal ratio:** If the antecedent and consequent of a ratio are interchanged, the new ratio is called the inverse ratio of the first.
$\frac{2}{5}$ is the inverse ratio of $\frac{5}{2}$.

iv.) **Compound Ratio:** When we compound two or more ratios with each other through product or multiplication, the result is simply a compound ratio. Thus, the product of two or more ratios; i.e, ab:cd is a ratio compounded of the simple ratios a:c and b:d. Required compounded ratio = (2/3 x 6/11 x 11/2) = 2/1.

These terms are just for informative purposes, so that you do not get confused on not being familiar with the terminology.

Now, Let's see some examples and test our learning till now.

Ex.1.) The ratio of boys to girls in a class is 2:3. If total students are 120.Find the number of boys in the class.

Ans.) Here, we see that the ratio of boys to girls is 2:3. Therefore we can deduce that for every 2 boys in the class, we have 3 girls. So, if we consider 2 boys and 3 girls as a group, we have 5 students in total in that group.

Now, as per the question, since we need to calculate the number of boys present, we try to frame a new ratio of boys to the total students in the class.
For that, we get $\frac{Boys}{(Boys+girls)} = \frac{2}{2+3} = \frac{2}{5}$

That means, in 5 students we have 2 boys, hence in 120 students, we will have $\frac{2}{5}$ x 120 = 48 boys.

Ex.2.) The present ratio of ages of A and B is 4:5. 18 years ago, this ratio was 11:16. Find the sum of their present ages.

Ans.) Let the present ages are 4x:5x , then it is given that $\frac{a}{b} = \frac{c}{d}$

$\frac{4x-18}{5x-18} = \frac{11}{16}$

⇨ 64x-288=55x-198
⇨ 9x=90
⇨ X=10.
   Therefore, ages 40 and 50.
   Sum = 90.

Concept 2: Proportion:

As already discussed, the equality of two ratios is called proportion if $\frac{a}{b} = \frac{c}{d}$ then a,b,c and d are said to be in proportion and we write   a:b::c:d.

Now, let's discuss the terms related to proportion, and eventually we will see some examples at the end. But, an important concept, that needs to be discussed is as follows :
If four quantities are in proportion, then Product of means = Product of extremes, for example, in proportion a:b::c:d, we have b x c= a x d.
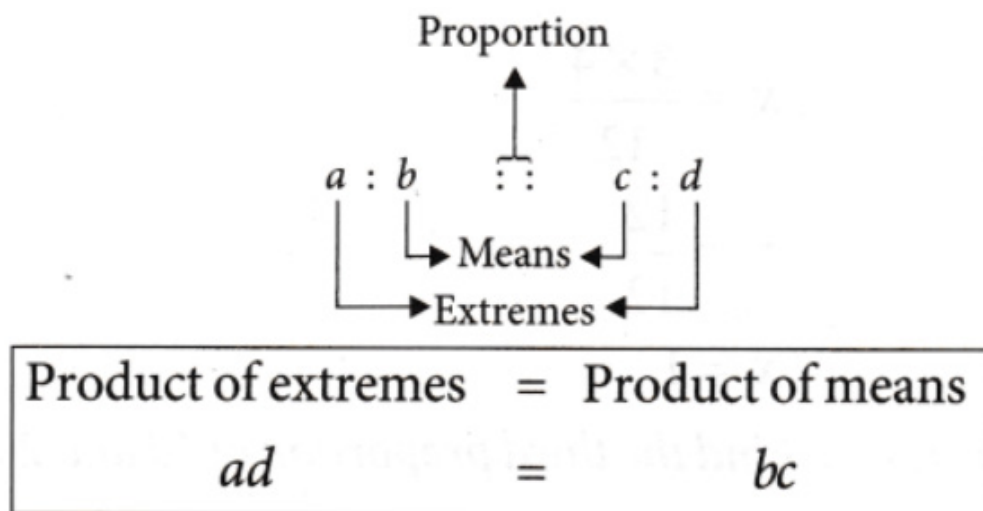
i.) **Mean proportional:** If a : x : : x : b , x is called the mean or second proportional of a & b.
We have
$\frac{a}{x} = \frac{x}{b}$ or x²=ab or x= $\sqrt{ab}$

Therefore, mean proportional of a and b is $\sqrt{ab}$

ii.) **Third proportional:** If a:b :: b:x , x is called the third proportional to a and b.
We have $\frac{a}{b} = \frac{b}{x}$ or x = $\frac{b^2}{a}$.
Suppose a:b :: c:d is a proportion of two ratios. We can write it as a:b = c:d. The quantity c is known as third proportional to the quantities a, b, and d.

iii.) **Fourth proportional**: If a:b :: c:x , x is called the fourth proportional of a, b and c.

$\frac{a}{b} = \frac{c}{x}$ or x = $\frac{b \times c}{a}$, thus fourth proportional of a, b and c is $\frac{b \times c}{a}$.

If $\frac{a}{b} = \frac{c}{d}$, then

1. Componendo:

$$\frac{a+b}{b} = \frac{c+d}{d}$$

2. Dividendo:

$$\frac{a-b}{b} = \frac{c-d}{d}$$

\# For componendo, we are just adding 1 to both sides of the equation, and for dividendo, 1 is being subtracted from both sides of the equation.

On combining the above two equations, we get the Componendo and Dividendo formula as:

$$\frac{a+b}{a-b} = \frac{c+d}{c-d}$$

Ex.1.) The sum of two numbers is 15, and their ratio is 2/3. Find the numbers.

Ans.) Let the numbers be x and y,
So, x+y=15, Now, x/y=2/3.
Applying Componendo, $\frac{x+y}{y} = \frac{2+3}{3}$

15/y= 5/3
Y = 9, x = 6 .

We have discussed already that partnership requires partners, whether it is cricket or partners in business.
To run a business or any organisation, we need to have partnerships. There are two types of partners.
i.) **Working partners:** Those partners who invest the money and manage the business or affairs of an organisation are called working partners.
ii.) **Sleeping partners:** Those partners who merely invest money and do not involve themselves in business affairs are called sleeping partners.

In partnerships, we have mainly three types of conditions related to distribution of profit in business.

Condition 1:
When time period of investment is constant, then profit of partners will be divided into ratio C1 : C2 : C3 : ......Cn,
Where, C1, C2, C3, ...Cn are investments of respective partners.

Condition 2 :
When amount invested is same for different partners but time period is different, then profit will be divided in the ratio of their time invested, that is
t1 : t2 : t3...... : tn .

Condition 3:
When the amount of investment and time period both are different for different partners, then profit will be divided into the following ratio.
        C1t1 : C2t2 : C3t3 : .... : Cntn.
In order to have a clear understanding of the above mentioned cases, lets take an example,

Ex.1.) Three partners undergo a partnership. Their investments are Rs.30000, Rs.45000 and Rs.50000 respectively for the time periods of 4 years, 2 years and 1 year respectively. Find the ratio of their profits.

Ans.) Here we see that the investments and time period of investments, both are different for all the partners, so we would are provide with Condition 3.

Using the same concept, the ratio of their profits would be,

> C1t1 : C2t2 : C3t3
> 30000 x 4 : 45000 x 2 : 50000 x 1
> 30 x 4 : 45 x 2 : 50 x 1
> 12 : 9 : 5

Ex.2.) A and B started a business with initial investments in the ratio 5:7 . If after one year their profits were in the ratio 1:2 and the period of A's investment was 7 months, B invested the money for ?

Ans.) Let investments of A and B respectively be 5x and 7x and period of B's investment be "t" months.

Then , 5x x 77x x t = 1

> Therefore, we get, t = 10.

Ex.2.) A and B started a business with initial investments in the ratio 5:7 . If after one year their profits were in the ratio 1:2 and the period of A's investment was 7 months, B invested the money for ?

Ans.) Let investments of A and B respectively be 5x and 7x and period of B's investment be "t" months.

Then , $\dfrac{(5x) \times 7}{(7x) \times t}$ $= \dfrac{1}{2}$

> Therefore, we get, t = 10.

PROBLEMS ON RATIO, PROPORTION AND PARTNERSHIP FOUNDATION

1. A and B together have Rs. 1210. If $\frac{4}{15}$ of A's amount is equal to $\frac{2}{5}$ of B's amount, how much amount does B have?

A. Rs. 460
B. Rs. 484
C. Rs. 550
D. Rs. 664

2. Two numbers are respectively 20% and 50% more than a third number. The ratio of the two numbers is:

A. 2 : 5
B. 3 : 5
C. 4 : 5
D. 6 : 7

3. A sum of money is to be distributed among A, B, C, D in the proportion of 5 : 2 : 4 : 3. If C gets Rs. 1000 more than D, what is B's share?

A. Rs. 500
B. Rs. 1500
C. Rs. 2000
D. None of these

4. Seats for Mathematics, Physics and Biology in a school are in the ratio 5 : 7 : 8. There is a proposal to increase these seats by 40%, 50% and 75% respectively. What will be the ratio of increased seats?

A. 2 : 3 : 4
B. 6 : 7 : 8
C. 6 : 8 : 9
D. None of these

5. In a mixture 60 litres, the ratio of milk and water 2 : 1. If this ratio is to be 1 : 2, then the quantity of water to be further added is:

A. 20 litres
B. 30 litres
C. 40 litres
D. 60 litres

MODERATE

1. The ratio of the number of boys and girls in a college is 7 : 8. If the percentage increase in the number of boys and girls be 20% and 10% respectively, what will be the new ratio?
A. 8 : 9
B. 17 : 18
C. 21 : 22
D. Cannot be determined

2. Salaries of Ravi and Sumit are in the ratio 2 : 3. If the salary of each is increased by Rs. 4000, the new ratio becomes 40 : 57. What is Sumit's salary?

A. Rs. 17,000
B. Rs. 20,000
C. Rs. 25,500
D. Rs. 38,000

3. If 0.75 : x :: 5 : 8, then x is equal to:

A. 1.12
B. 1.2
C. 1.25
D. 1.30

4. The sum of three numbers is 98. If the ratio of the first to second is 2 :3 and that of the second to the third is 5 : 8, then the second number is:
A. 20
B. 30
C. 48
D. 58

5. If Rs. 782 be divided into three parts, proportional to $\frac{1}{2} : \frac{2}{3} : \frac{3}{4}$, then the first part is:

A. Rs. 182
B. Rs. 190
C. Rs. 196
D. Rs. 204

HOTS- HIGH ORDER THINKING SKILLS

1. A and B invest in a business in the ratio 3 : 2. If 5% of the total profit goes to charity and A's share is Rs. 855, the total profit is:

A. Rs. 1425
B. Rs. 1500
C. Rs. 1537.50
D. Rs. 1576

2. A, B and C jointly thought of engaging themselves in a business venture. It was agreed that A would invest Rs. 6500 for 6 months, B, Rs. 8400 for 5 months and C, Rs. 10,000 for 3 months. A wants to be the working member for which, he was to receive 5% of the profits. The profit earned was Rs. 7400. Calculate the share of B in the profit.

A. Rs. 1900
B. Rs. 2660
C. Rs. 2800
D. Rs. 2840

3. A, B and C enter into a partnership in the ratio $\frac{7}{2} : \frac{4}{3} : \frac{6}{5}$ After 4 months, A increases his share 50%. If

the total profit at the end of one year be Rs. 21,600, then B's share in the profit is:

A. Rs. 2100
B. Rs. 2400
C. Rs. 3600
D. Rs. 4000

4. A, B, C subscribe Rs. 50,000 for a business. A subscribes Rs. 4000 more than B and B Rs. 5000 more than C. Out of a total profit of Rs. 35,000, A receives:

A. Rs. 8400
B. Rs. 11,900
C. Rs. 13,600
D. Rs. 14,700

5. Three partners shared the profit in a business in the ratio 5 : 7 : 8. They had partnered for 14 months, 8 months and 7 months respectively. What was the ratio of their investments?
A. 5 : 7 : 8
B. 20 : 49 : 64
C. 38 : 28 : 21
D. None of these

SOLUTIONS - FOUNDATION

$$\frac{4}{15}A = \frac{2}{5}B$$

$$\Rightarrow A = \left(2 \times \frac{1}{5} \times \frac{5}{4}B\right)$$

$$\Rightarrow A = \frac{3}{2}B$$

$$\Rightarrow \frac{A}{B} = \frac{3}{2}$$

$$\Rightarrow A : B = 3 : 2.$$

$$\therefore \text{B's share} = \text{Rs.} \left(1210 \times \frac{2}{5}\right) = \text{Rs. } 484.$$

2. **Answer:** Option **C**

Explanation:

Let the third number be x.

| Then, first number = 120% of x = | $\frac{120x}{100}$ | = | $\frac{6x}{5}$ |

| Second number = 150% of x = | $\frac{150x}{100}$ | = | $\frac{3x}{2}$ |

| Ratio of first two numbers = | $\left(\frac{6x}{5} : \frac{3x}{2}\right)$ | = 12x : 15x = 4 : 5. |

3. **Answer:** Option **C**

Explanation:

Let the shares of A, B, C and D be Rs. 5x, Rs. 2x, Rs. 4x and Rs. 3x respectively.

Then, 4x - 3x = 1000

x = 1000.

B's share = Rs. 2x = Rs. (2 x 1000) = Rs. 2000.

4. **Answer:** Option **A**

Explanation:

Originally, let the number of seats for Mathematics, Physics and Biology be 5x, 7x and 8x respectively.

Number of increased seats are (140% of 5x), (150% of 7x) and (175% of 8x).

$$\Rightarrow \left(\frac{140}{100} \times 5x \right), \left(\frac{150}{100} \times 7x \right) \text{ and } \left(\frac{175}{100} \times 8x \right)$$

$$\Rightarrow 7x, \frac{21x}{2} \text{ and } 14x.$$

$$\therefore \text{ The required ratio } = 7x : \frac{21x}{2} : 14x$$

$$\Rightarrow 14x : 21x : 28x$$

$$\Rightarrow 2 : 3 : 4.$$

5. **Answer:** Option **D**

Explanation:

$$\text{Quantity of milk } = \left(60 \times \frac{2}{3} \right) \text{litres} = 40 \text{ litres.}$$

Quantity of water in it = (60- 40) litres = 20 litres.

New ratio = 1 : 2

Let quantity of water to be added further be x litres.

Then, milk : water

$$= \frac{40}{20 + x}.$$

Now, $\frac{40}{20 + x} = \frac{1}{2}$

$\Rightarrow 20 + x = 80$

$\Rightarrow x = 60.$

$\therefore$ Quantity of water to be added = 60 litres.

MODERATE

1. **Answer:** Option **C**
Explanation:
Originally, let the number of boys and girls in the college be 7x and 8x respectively.
Their increased number is (120% of 7x) and (110% of 8x).

$$\Rightarrow \left(\frac{120}{100} \times 7x \right) \text{ and } \left(\frac{110}{100} \times 8x \right)$$

$$\Rightarrow \frac{42}{5}x \text{ and } \frac{44}{5}x$$

$$\therefore \text{ The required ratio } = \left(\frac{42}{5}x : \frac{44}{5}x \right) = 21 : 22.$$

2. **Answer:** Option **D**
Explanation:
Let the original salaries of Ravi and Sumit be Rs. 2x and Rs. 3x respectively.

Then,
$$\frac{2x + 4000}{3x + 4000} = \frac{40}{57}$$

$\Rightarrow 57(2x + 4000) = 40(3x + 4000)$
$\Rightarrow 6x = 68,000$
$\Rightarrow 3x = 34,000$

Sumit's present salary = (3x + 4000) = Rs.(34000 + 4000) = Rs. 38,000.

3. **Answer:** Option **B**
Explanation:

$$(x \times 5) = (0.75 \times 8) \Rightarrow x = \left(\frac{6}{5} \right) = 1.20$$

~~Explanation:~~

4. **Answer:** Option **B**
Explanation:
Let the three parts be A, B, C. Then,

$$A : B = 2 : 3 \text{ and } B : C = 5 : 8 = \left(5 \times \frac{3}{5}\right) : \left(8 \times \frac{3}{5}\right) = 3 : \frac{24}{5}$$

$$\Rightarrow A : B : C = 2 : 3 : \frac{24}{5} = 10 : 15 : 24$$

$$\Rightarrow B = \left(98 \times \frac{15}{49}\right) = 30.$$

5. **Answer:** Option **D**

Explanation:

Given ratio = $\frac{1}{2} : \frac{2}{3} : \frac{3}{4}$ = 6 : 8 : 9.

$$\therefore 1^{st} \text{ part} = \text{Rs. } \left(782 \times \frac{6}{23}\right) = \text{Rs. } 204$$

HOTS- HIGH ORDER THINKING SKILLS

1. **Answer**: Option **B**
Explanation:
Let the total profit be Rs. 100.

After paying to charity, A's share = Rs. $\left(95 \times \dfrac{3}{5} \right)$ = Rs. 57.

If A's share is Rs. 57, total profit = Rs. 100.

If A's share Rs. 855, total profit = $\left(\dfrac{100}{57} \times 855 \right)$ = 1500.

2. **Answer:** Option **B**
Explanation:
For managing, A received = 5% of Rs. 7400 = Rs. 370.
Balance = Rs. (7400 - 370) = Rs. 7030.
Ratio of their investments = (6500 x 6) : (8400 x 5) : (10000 x 3)
   = 39000 : 42000 : 30000
   = 13 : 14 : 10

∴ B's share = Rs. $\left(7030 \times \dfrac{14}{37} \right)$ = Rs. 2660.

3. **Answer:** Option **D**
Explanation:

Ratio of initial investments = $\left(\dfrac{7}{2} : \dfrac{4}{3} : \dfrac{6}{5} \right)$ = 105 : 40 : 36.

Let the initial investments be 105x, 40x and 36x.

∴ A : B : C = $\left(105x \times 4 + \dfrac{150}{100} \times 105x \times 8 \right)$: (40x x 12) : (36x x 12)

= 1680x : 480x : 432x = 35 : 10 : 9.

Hence, B's share = Rs. $\left(21600 \times \dfrac{10}{54} \right)$ = Rs. 4000.

4. **Answer:** Option **D**

Explanation:

Let C = x.

Then, B = x + 5000 and A = x + 5000 + 4000 = x + 9000.

So, x + x + 5000 + x + 9000 = 50000

3x = 36000

x = 12000

A : B : C = 21000 : 17000 : 12000 = 21 : 17 : 12.

$$\therefore \text{A's share = Rs.} \left(35000 \times \frac{21}{50} \right) = \text{Rs. } 14{,}700.$$

5. **Answer:** Option **B**

Explanation:

Let their investments be Rs. x for 14 months, Rs. y for 8 months and Rs. z for 7 months respectively.

Then, 14x : 8y : 7z = 5 : 7 : 8.

$$\text{Now, } \frac{14x}{8y} = \frac{5}{7} \Leftrightarrow 98x = 40y \Leftrightarrow y = \frac{49}{20}x$$

$$\text{And, } \frac{14x}{7z} = \frac{5}{8} \Leftrightarrow 112x = 35z \Leftrightarrow z = \frac{112}{35}x = \frac{16}{5}x.$$

$$\therefore x : y : z = x : \frac{49}{20}x : \frac{16}{5}x = 20 : 49 : 64.$$

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Session 44

Aptitude (Numeracy & Reasoning)-
21st century literacies

Percentage

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Percentage

CONCEPT 1:
Understanding Percentages.

•Percent comes from the Latin word "per centum". The Latin word "centum" means 100, so "per centum" means "for each hundred". Percent is denoted with a symbol "%". For instance, 1 percent can be written as 1%, and it is the same as the fraction 1/100, Ten percent can be written as 10%, which is the same as the fraction 10/100.
•When we say percent, we mean a part of the whole where whole is considered as hundred. Look at the grid below with 100 cells to understand better.
- Each cell is equal to 1% of the whole (the red cell is 1%).
- Two cells are equal to 2% (the green cells).
- Five cells are equal to 5% (the blue cells).
- Twenty-five cells (purple cells) are equal to 25% of the whole or one quarter (¼).
- Fifty cells (yellow cells) are equal to 50% of the whole or half (½).
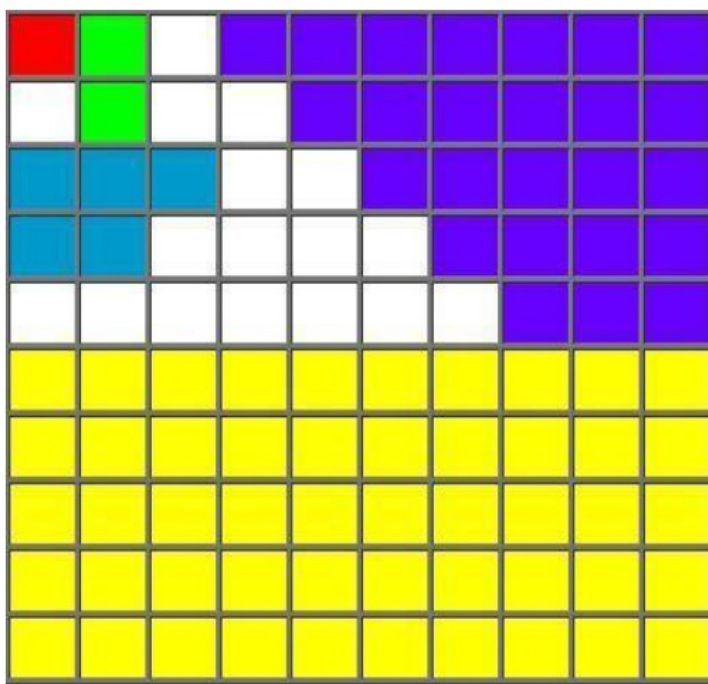
- Now, Can you calculate how many unshaded (white) cells are there? What is the percentage of unshaded cells? There are three ways to work this out. Look at the following ways:

- Count the white cells. There are 17 of them. Out of 100 cells, 17% are therefore white.

- Add up the number of other cells and deduct them from 100. There is one red cell, two green, five blue, twenty-five purple, and fifty yellow. That adds up to 83. So, (100–83) = 17. Again, out of 100 cells, 17 are white, or 17%.

- Divide the value of white cells by total value and then multiply the resultant to 100. Percentage= (Value of white cells/Total value) ×100 OR 17/100 × 100 = 0.17 × 100 = 17 or 17%.

• Percentage is textually written as, Percentage= (Part/Whole) × 100. Now, this part & whole can be any value, but when we convert this ratio in percentage, we mean to define the resultant out of every hundred. This gives us freedom to express complex calculations in simple form. For example, If I say 20% of my shirt was torn, a person listening to this will get an idea about portion of shirt that was torn without even knowing actual length of the shirt and length of the portion that was torn because when I said 20% of my shirt was torn, he considered the whole shirt as hundred cells and imagined that 20 cells out of it were torn. Therefore, we can easily communicate in terms of percentage without expressing detailed calculations.

CONCEPT 2:
Conversion of fraction into percentages and vice versa.

- To convert a fraction into percentage, just multiply the given ratio by 100, the result obtained will be in terms of percentage. Example: To express 2/3 in terms of percentage, we multiply the given ratio by 100 or (2/3) × 100 = 66.66%.
- Similarly, if we want to convert a number given in terms of percentage, we divide the number by 100. Example: To express 40% in terms of ratio, we divide 40 by 100 or (40/100) = 2/5.
- Now, look at the percentage-fraction conversion chart below. This will help you solve problems quickly.

Fraction	Percent
1/2	50 %
1/3	33.33 %
2/3	66.67 %
1/4	25 %
2/4	50 %
3/4	75 %
1/5	20 %
2/5	40 %
3/5	60 %
4/5	80 %
1/6	16.67 %
2/6	33.33 %
3/6	50 %
4/6	66.67 %
5/6	83.33 %
1/7	14.285714 %
2/7	28.571429 %
3/7	42.857143 %
4/7	57.142858 %
5/7	71.428571 %
6/7	85.714286 %
1/8	12.5 %
2/8	25 %
3/8	37.5 %
4/8	50 %
5/8	62.5 %
6/8	75 %
7/8	87.5 %
1/9	11.111111 %
2/9	22.222222 %
3/9	33.333333 %
4/9	44.444444 %
5/9	55.555556 %
6/9	66.666667 %
7/9	77.777778 %
8/9	88.888889 %

CONCEPT 3:
Percentage increase or decrease.

•Percentage increase is the ratio of value increased to the original value and multiplied by 100. It is expressed in percentage. If there is an increase in the value of anything, then there is an increase in percentage.

$$\frac{\text{Value Increased}}{\text{Original Value}} \times 100 = \text{Percentage Increase.}$$

- Let us understand this with an example. If your salary is Rs.50,000/- per month and one day your company's HR walks in and informs you that you are promoted to senior management and your new salary will be Rs.60,000/-. What is the percentage increase or hike on your salary?

- **Solution:** We can clearly see that there is an increase in your salary which is Rs.10,000/-. So, what will be the percentage increase? Percentage increase as defined above can be written as (10000/50000) * 100 which is equal to 20%. So, you received a 20% hike on your current salary.

•Percentage decrease is the ratio of value decreased to the original value and multiplied by 100. It is expressed in percentage. If there is a decrease in the value of anything, then there is a decrease in percentage.

$$\frac{\text{Value Decreased}}{\text{Original Value}} \times 100 = \text{Percentage Decrease}$$

- Let us understand this with an example. Last month your total expenditure was Rs.20,000/-. However, this month you have managed your expenses well and your total expenditure was Rs.15,000/-. What is the percentage decrease on your expenditure?

- **Solution:** We can clearly see that there is a decrease in your expenditure as compared to previous month which is Rs.5000/-. So, what percentage will be percentage decrease? Percentage decrease as defined above can be written as (5000/20000) * 100 which is equal to 25%. So, you reduced your expenses by 25%.

•An important point to note while calculating percentage increase or decrease is that the value increased or decreased is always calculated on original value and not on resultant value. This is a common mistake people do.

CONCEPT 4:
Understanding the concept of multiplying factor for quick calculations.

•Let's learn a unique approach to ease the calculation while solving percentage increase or decrease. This will also help you in solving general problems related to percentages very quickly.

- What do we mean when we say that a value has increased by 20%? As discussed earlier, we consider total value of anything or it's whole part as hundred or 100%. Now, if we say that this whole value is increased by 20%, we mean that a value which was 100% earlier has now increased by 20% or it has become 120% of the original value. 120% can be further written as 120/100 or 1.2. This "1.2" works out to be your multiplying factor. Multiplying 1.2 to your original value will give you the increased value.

- What do we mean when we say that a value has decreased by 20%? We mean that a value which was 100% earlier has now decreased by 20% or it has become 80% of the original value. 80% can be further written as 80/100 or 0.8. This "0.8" is your multiplying factor. Multiplying 0.8 to your original value will give you the decreased value.

• Using concept of multiplying factor will help you save time from lengthy calculations through formula. Let's us understand this through few examples.

- If the current salary of an employee working in ABC company is Rs.24000/-. What will be his new salary if he received a hike of 20% on his salary?

- **Solution:** According to given question, the employee gets hike of 20% on his salary. So, according to formula:

$\underline{\text{Value Increased }} \times 100 = \text{Percentage Increase}$
  Original Value

Value increased = (20 × 24000)/ 100 or Rs.4800/- or you could simply calculate 20% of 24000= 4800 (without using formula).
New salary of the employee will be 24000+4800 = Rs.28,800/-

• Can we make this simpler? Yes! By using concept of multiplying factor. Here you go.

24000 × 1.2 = 28,800

Did we just get the answer in single line? How did we do that? Simple! Salary of the employee was Rs.24000/- which can be considered has 100% of his salary as this amount represents the whole part of his salary. Now according to question, his salary increased by 20% which means now his salary is 120% of the original salary or we can express it as:
(120% of 24000) or 24000 × (120/100) or 24000 × 1.2.

•Let's quickly solve few problems.

- Increase 5000 by 23%.
- Increase 200 by 200%.
- Increase 17400 by 12%.
- Decrease 2800 by 13%
- Decrease 5000 by 20%.
- Decrease 12000 by 15%.
- Express ¾ in terms of percentage.
- Express 7/8 in terms of percentage.
- Express 15/14 in terms of percentage (round off the value)
- Express 125% in terms of fraction.
- Express 160% in terms of fraction.
- Express 285% in terms of fraction.

CONCEPT 5:
Few tricks to calculate faster.

• Splitting the percentage into parts.
Example: Find 51% of 128.
Solution: 51% of 128= (50+1) % of 128= 50% of 128 + 1% of 128 = 64 + 1.28 = 65.28

• Interchanging the percentage value and the number.
Example: Find 39% of 12.5.
Solution: 39% of 12.5 = 12.5% of 39 = 1/8 × 39 = 4.875

Situations for Negotiation

Situation 1

A fellow employee, Lalit, has not been contributing equally to complete the normal weekly work at hand. Lalit claims he is contributing, but that he is swamped with other work and the emotional aftermath of a bitter divorce. Some fellow workers are upset that he has been so lax and feel that they should take their complaints about Lalit to the supervisor. You are good friends with Lalit and know he's not lazy but feel that he may be overdramatizing his problems a bit. You brought up the topic with Lalit over coffee last night, but he was defensive and maintained his "innocence"…he even accused you of not sympathizing with him.

Question: What alternatives are there to the course of action your fellow employees want to take (filing a complaint with the supervisor)? How might your suggestions improve the situation without involving the administration or hurting Lalit's professional reputation?

Situation 2

Your work group is composed of two women and five men. The two women have brought up a problem to the group: They feel that the men are dominating the group process and, more importantly, the decision making. Three of the five men tell you privately that the women are "taking advantage of being women" to gain power". You know that the women are right and that they are following an ethical group process by bringing up the issue to the group, rather than running to the boss. You feel, however, that you might jeopardize your own reputation (and future with the company) by supporting them, especially since the corporation is dominated by men. One of the men in the group appears to be neutral, as far as you can tell.

Question: What are your possibilities?

Situation 3

Recently, you and three or four other members of your group have been increasingly aware of personal disagreements and unspoken resentments among the people with whom you work. There is no official procedure to handle such problems, and you realize that, not only is productivity (personal and collective) suffering, but that everyone appears to be unhappy in general with the declining working conditions these problems have created.

You feel the same way and would like to do something to improve the situation.

Question: Considering the fact that these three or four other individuals are also aware of the problem, what can you do?

Situation 4

Ishitha has worked as the executive assistant to Meenu for ten years. Ishitha has worked overtime on many occasions when Meenu had special projects to complete. Meenu has not given Ishitha a raise in her salary for three years and Ishitha is thinking about looking for a new position which could pay her more money. Meenu is concerned about losing Ishitha to another employer but is worried that her own company has not made a profit in the last two years. Ishitha and Meenu sit down in the conference room to negotiate a possible raise in salary for Ishitha.

Question: Considering the situation of the company, should Ishitha be given a salary hike?

Problems On Percentage Foundation

1. What is 15 % of Rs. 34?

a) Rs. 3.40
b) Rs. 3.75
c) Rs. 4.50
d) Rs. 5.10
e) None of these

2) What percent of Rs. 2650 is Rs. 1987.50?

a) 60 %
b) 75 %
c) 80 %
d) 85 %
e) None of these

3) If 35 % of a number is 12 less than 50 % of that number, then the number is:

a) 40
b) 50
c) 60
d) 80
e) None of these

4) A person's salary has increased from Rs. 7200 to Rs. 8100. What is the percentage increase in his salary?

a) 25 %
b) 18 %
c) 16 2/3 %
d) 12 1/2 %
e) None of these

5) 15 % of 10 % of 20 % of 1000 is?

a) 1.50
b) 67
c) 150
d) 3
e) None of these

Moderate

1. In an examination it is required to get 35 % of the aggregate marks to pass Rishu got 216 marks and declared failed by 5 % marks then what was the total marks?

a) 620
b) 720
c) 820
d) 710
e) None of these

2) The price of Petrol went up 20 %. In order to keep expenses same Ram must reduce travel by:

a) 25 %
b) 30 %
c) 33.33 %
d) 16.67 %
e) None of these

3) If the length and breadth of a rectangle field are increased. The area increased by 50 %. If the length increased by 20 %, by what percentage was breadth increased?
a) 25 %
b) 30 %
c) 20 %
e) Data inadequate
f) None of these

4) Aditya's salary is 80 % of Amit's salary and 120 % of Rajiv's salary. What is Amit's salary if Rajiv's salary is 30,000?

a) 40000
b) 45000
e) 50000
d) 55000
e) None of these

5) In a class 60 % of the students pass in Hindi and 45 % pass in Sanskrit. If 25 % of them pass in both subjects, what percentage of the students fails in both subjects?
a) 80%
b) 20%
c) 25%
d) 75%
e) None of these

Hots- High Order Thinking Skills

1. Ram borrowed Rs. 725 from Shyam at the beginning of a year at interest. After 8 months, he again borrowed Rs. 362.50 at a rate of interest double that the former sum bears. At the end of the year, the sum of interest on both loans is Rs. 43.50. Find the first rate of interest per annum?
    a) 4.5 %
    b) 4.75 %
    c) 6.25 %
    d) 7.2 %
    e) None of these

2. The cost price of goods with a bankrupt is Rs. 25500 and if the goods had realised in their full value, his creditors would have received 85 paise in the rupee. But 2/5 of the goods were sold at 17 % and the remainder at 22 % below their cost price. How many paise in a rupee was received by the creditors?
    a) 72 paise
    b) 68 paise
    c) 55 paise
    d) 52 paise
    e) None of these

3. A shopkeeper undertakes to supply 2000 tables at Rs. 1725 each. He estimates that if 10 % are defective which will be sold at 50 %, then the profit will be 15 % on his whole outlay. When the tables were supplied, 70 % of the tables were found defective. What loss did the shopkeeper incur?
    a) Rs. 607500
    b) Rs. 557500
    c) Rs. 550500
    d) Rs. 80680
    e) None of these

4. **Sweta invested Rs. 10000 in a scheme exactly three years ago. The value of the investment increased by 10 % during the first year, increased by 5 % during the second year, and decreased by 10 % during the third year. What is the value of the investment today?**

   a) Rs. 10500

   b) Rs. 10395

   c) Rs. 10342

   d) Rs. 10230

   e) None of these

5. **In Mumbai, 60 % of the registered voters are BJP supporters and the rest are Congress supporters. In a mayoral race, if 75 % of the registered voters who are BJP supporters and 20 % of the registered voters who are congress supporters are expected to vote for candidate X, what percent of the registered voters are expected to vote for candidate X?**

   a) 53 %

   b) 55 %

   c) 57 %

   d) 59 %

   e) None of these

Solutions
Foundation

(d)

(15 / 100) × 34 = Rs. 5.10

(b)

Required percentage = (252 / 270) × 100 = 93 1/3 %

(d)

Let the number is X

(50 / 100) X - (35 / 100) X = 12

» 15X / 100 = 12

» X = (12 × 100) / 15

» X = 80

(d)

Percentage increase in salary = (900 / 7200) × 100

= 100/8 = 12 ½ %

(d)

(15 / 100) × (10 / 100) × (20 /100) × 1000 = 3

Moderate

1.   (b)
If Rishu failed by 5 % marks which means he got 30 % marks.
30 % marks = 216
» 100% marks = (216/30) × 100
Total marks = 720

2.   (d)
If the price of petrol has increased by 20 %, it has gone up 1/5th of its earliest price.
.'. The % of reduction in petrol that will maintain the amount of money spent on petrol
= 1/ (1+5) = 1/6
= 16.67%
» Reduction in travel = 16.67%

3.   (a)
Let the increased breadth be X
» 20 + X + 20X/100 = 50   [% increase = m+n+mn/100]
» X + X/5 = 30
» 6X/5 = 30
» X = (30 × 5)/6
» X = 25%

4.   (b)
Let Amit's salary be X
Aditya salary = (120/100) × 30000 = Rs. 36000
(X × 80)/ 100 = 36000
» X = (36000 × 100)/80 =Rs. 45000

5.   (b)
The percentage of students fails in both subjects
= 100 – [(60 + 45) – 25] = 20 %

Hots- High Order Thinking Skills

1. (a)
    43.5 = (725 × R × 1)/100 + (362.5 × 4 × 2R)/ (12 × 100)
    43.5 × 300 = 2175R + 362.5 × 2R = 2900 R
    R = 4.5

2. (b)
    Total debt = 22500 × 100/85 = Rs. 30000
    Money received by selling the goods
    = 25500 [(2/5) × (83/100) +(3/5) × (78/100)]
    = 25500/500 × (166 + 234)
    = 51 × 400
    = Rs. 20400
    Therefore, money received by the creditors for a rupee
    = Rs. 20400/30000 = Rs. 0.68 = 68 paise
    Hence, the creditor received 68 paise in a rupee

3. (a)
    10% 0f 2000 = 200
    Selling price of 200 tables at 50%
    =Rs. 200 × 1725/ 2 = Rs. 172500
    Selling price of remaining 1800 tablet
    = Rs. 1800 × 1725 = Rs. 3105000
    Total revenue from selling 2000 tables
    = Rs. 172500 + 3105000 = Rs. 3277500
    Now, Rs. 3277500 includes 15 % profit.
    Therefore, cost price of 2000 tables
    = (100/115) × 3277500
    = Rs. 2850000
    Now the actual selling price
    = 2000 × (30/100) × 1725 + 2000 × (70/100) × (1725/2)
    = 2000 × 1725 [(30/100) + (35/100)]
    = 20 × 1725 × 65
    = Rs. 2242500
    ∴ Loss = Cost price – Selling price
    Hence, the shopkeeper incurs a loss of
    » Rs. 2850000 – Rs. 2242500 = Rs. 607500

4. (b)

The first year's increase of 10% can be expressed as 1.10;

the second year's increase of 5% can be expressed as 1.05;

and the third year's decrease of 10% can be expressed as 0.90.

Now, multiply the original value of the investment account by each of these yearly changes.

$10000 \times 1.10 \times 1.05 \times 0.90 =$ Rs. 10395

Hence, the value of the investment today is

= Rs. 10395.

5. (a)

Let Y be the number of registered voters in Mumbai. Then, the information that 60% of the registered voters are from BJP can be expressed as 0.60Y. From this, it can be stated that

1.00Y – 0.60Y = 0.40Y are from Congress.

The percentage of BJP supporters and the percentage of Congress supporters who are expected to vote for candidate X can be expressed as:

X = 0.75 × 0.60Y + 0.20 × 0.40Y

= 0.45Y + 0.08Y = 0.53Y

Hence, 53% of the registered voters are expected to vote for candidate X.

Profit and Loss

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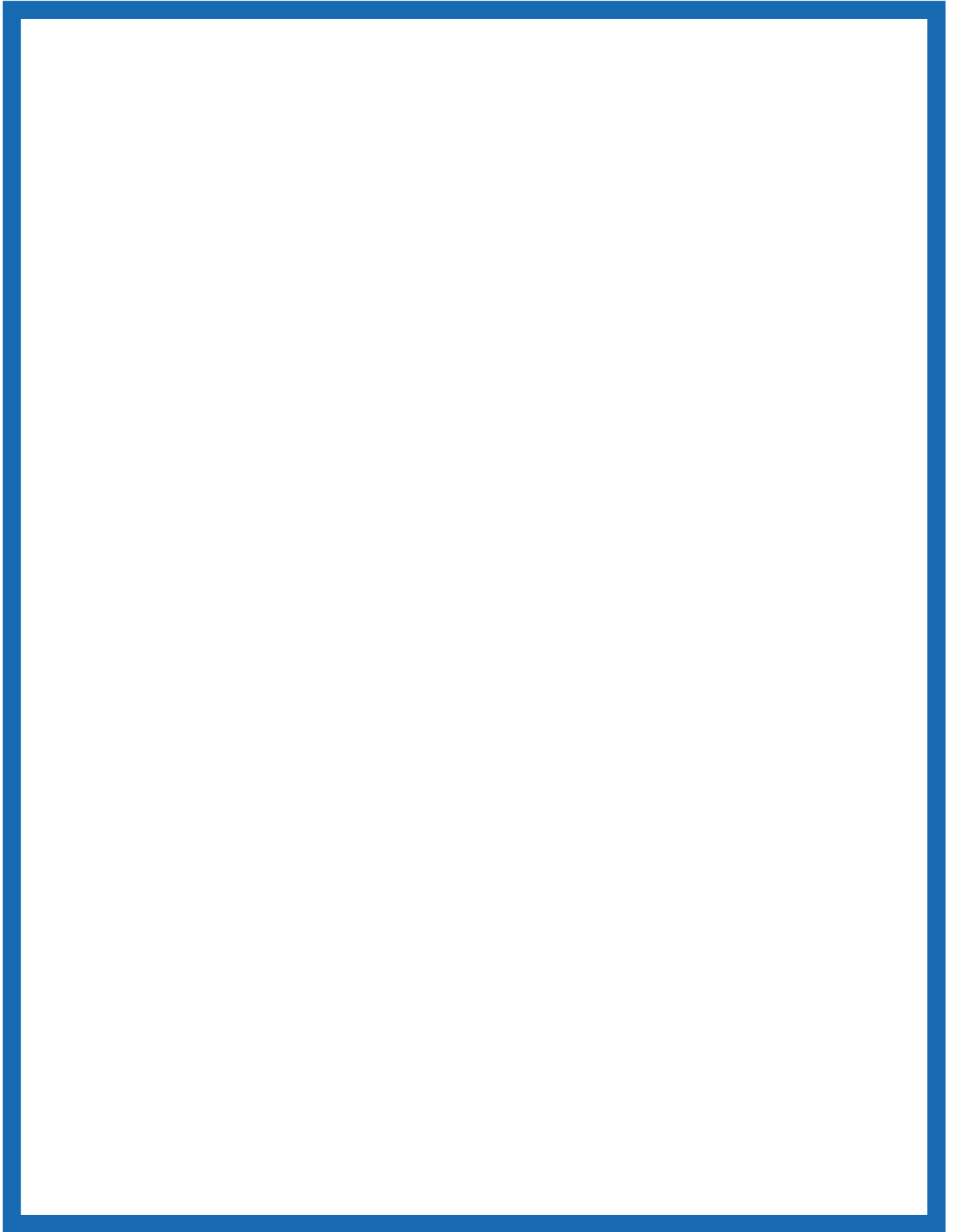
Aptitude
(Numeracy & Reasoning)
- 21st century literacies

Profit and Loss

Session 45

Lesson Plan
A teachers objectives for what students should accomplish and how they will better learn the material.

Profit and Loss

CONCEPT 1:
Introduction

• This unit would comprise of six main terms at large namely:

1. Cost Price (CP): Cost Price or CP in layman's term is the price at which an article has been purchased.
2. Selling Price (SP): Selling price or SP is the price at which the item has been sold.
3. Profit: Profit is the amount one has gained in carrying out a transaction, i.e., by selling an item.
4. Loss: Loss in the same way is the amount one loses in selling an item.
5. Marked Price (MP): Marked price or MP is the price that a shopkeeper or your shopping sites label for the item.
6. Discount: Discount is the term which we all want for everything we buy. Ok, Jokes apart, it is the amount that is provided we need not to pay of the MP.

Now, to explain the first four items above and to form a clearer picture I would like to tell you a story. Look at the picture below.

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• CASE 1: There was a trade fair, in which livestock was being sold. A farmer bought a cow from one   trader at Rs. 10000. In this transaction the trader earned a profit of Rs. 2000. So, from this transaction we could easily infer that the trader earned a profit on selling the cow to the farmer, so the cost price for the trader comes out to be Rs. 8000/-.

Now consider another case,

- CASE 2: The farmer sells the cow to his brother at Rs.12000, now the selling price of the previous transaction become the cost price of this transaction, since the seller and buyer have changed. Now CP here is Rs. 10000.

So, what we conclude is that we need to first chalk out the transaction that is being discussed before advancing towards any calculations.

Students, we would be analyzing the underlying concepts rather than relying on ready-made formulae, so that we could solve any problem related to this topic, and at the end of all this concept building, you would be in a position to write all the formulas on you own.

Just remember basic things like, if SP is greater that means profit is made, and if CP is greater than SP, loss is incurred.

Also, profit % or loss % would always be calculated by keeping CP as reference, as evident from the previous statement.

- This unit requires just basic arithmetic and knowledge of percentage to cover entire concepts.

Let's take an example and understand all the concepts one by one.

- Example 1: A boy sells his bicycle at Rs. 600, and in this situation, he gains 20%. Calculate profit, CP and SP.

Solution: Here we have a situation in which a boy is selling his bicycle.

We get the selling price that is given in the question itself, i.e., Rs. 600.

Now, as stated earlier we need to focus on the transaction involved, upon selling the bicycle at Rs.600, he gains 20%, so we get an idea that the SP is 20% more than the CP.

So, we easily calculate CP as Rs. 500, and profit as Rs. 100.

Till now, we have not discussed any formulae, rather solely relied on concepts and analysis of transaction involved.

- Example 2: Ram purchased a TV at Rs. 12000, and sold it at Rs. 15000, find the loss or profit involved.

Solution: Here, we have the purchase price, that is the CP = Rs.12000, also the selling price is 15000, so we see that the SP > CP, therefore we have profit involved here.

So, profit would be how higher the SP is than CP, so we get,

Profit = SP-CP.

So, Profit = 15000-12000= 3000

Now, bonus question, lets calculate profit % here, for that again concepts come into play, since profit is calculate by keeping the CP as the reference, therefore for calculating Profit %, we need to take CP as reference again and calculate that how much % more is SP than CP. Or in more simpler terms, Profit is what % of CP. Task done!!!!

So, Profit % = (Profit/CP) x100

OR Profit % = ((SP-CP)/CP) x100.

Now, calculate…

- Now, coming to the last two topics left, and as the customary approach that we have been following, I would be again telling you a story for perfect visualization.

- So, you visit a shopping complex and see your favourite watch out there, now you see the label on it that states Rs. 4000. Now, the salesman approaches you and starts telling you about the functions of it, but what is more important is the discount about which he tells you would be provided, being 25%. You find the deal nice and buy it.

Now, from the above case, we deduce that the MP of the watch is Rs.4000, and the discount provided is 25%.

Since discount is provided over the MP so, we calculate the value of discount as 25% of MP, i.e., Rs.1000.

And we get the SP as MP – Discount = Rs.3000.

NOTE: Since discount is provided on MP, therefore for calculating discount, using discount%, we would always use MP as the reference. As was the case with Profit or Loss %, in which we used CP as the reference.

Let's take a quick example to brush up the concepts discussed.

• Example 1: The price of one banana is Rs.5, Ram buys two dozen, when told that he would be getting a discount of Rs.6 per dozen of the bananas bought. Find the price Ram needs to pay and the discount % provided.

Solution: Here we see that one banana costs Rs.5, so for 24 bananas, Ram needs to pay Rs. 24x5 = Rs.120. But, for each dozen he gets a discount of Rs. 6, so the net discount comes out to be = Rs.12.

Therefore, the SP comes out to be Rs. 120-12= Rs.108 (This is the amount Ram need to pay to get 2 dozen of bananas).

Now, for discount %, as discussed earlier, we need to consider MP as the reference value for calculating the same. So, discount % = (Discount/MP) x100. Which comes out to be: (12/120) x100 = 10%.

• Everything discussed above employs only basic aptitude and the concepts underlying these terms. Having said that, it could be inferred now that we are in a position to work out any problem given to us.

• Here are the formulas, just for reference,

> **Profit or Gain = Selling price – Cost Price**
> **Loss = Cost Price – Selling Price**
>
> **Profit percentage = (Profit /Cost Price) x 100**
> **Loss percentage = (Loss / Cost price) x 100**

• When discount is given,

> **SP= MP-Discount**
> **Discount % = (Discount/MP)X100**
> **Discount % = ((MP-SP)/MP)x100**

Problems On Profit And Loss
Foundation

1. A man buys an article for Rs. 27.50 and sells it for Rs. 28.60. find the gain percent?
a. 4 %
b. 3 %
c. 5 %
d. 10 %
e. None of these

2. If a radio is purchased for Rs. 490 and sold for Rs. 465.50. Find the loss percent?
a. 6 %
b. 5 %
c. 4 %
d. 3 %
e. None of these

3. A person incurs 5 % loss by selling a watch for Rs. 1140. At what price should the watch be sold to earn 5 % profit?
a. Rs. 1380
b. Rs. 1160
c. Rs. 1260
d. Rs. 1400
e. None of these

4. A man sold two cows at Rs. 1995 each. On one he lost 10 % and on the other he gained 10 %. What his gain or loss percent?
a. 4 %
b. 2 %
c. 0.5 %
d. 1 %
e. None of these

5. A vendor bought toffees at 6 for a rupee. How many for a rupee must he sell to gain 20 %?
a. 3
b. 4
c. 5
d. 6
e. None of these

Moderate

1. The cost of an article including the sales tax is Rs. 616. The rates of sales tax is 10 %, if the shopkeeper has made a profit of 12 %, then the cost price of the articles is?
a. Rs. 350
b. Rs. 500
c. Rs. 650
d. Rs. 800
e. None of these

2. The profit earned by selling an article for Rs. 900 is double the loss incurred when the same article is sold for Rs. 450. At what price should the article be sold to make 25 % profit?
a. Rs. 400
b. Rs. 500
c. Rs. 700
d. Rs. 750
e. None of these

3. A trader Mixes 26 kg of rice at Rs. 20 per kg with 30 kg of rice of other variety at Rs. 36 per kg and sells the mixture at Rs. 30 per kg. His profit percent is:
a. No profit, No loss
b. 5 %
c. 8 %
d. 10 %
e. None of these

4. Aditya purchased 14 shirt & 25 pants at Rs. 45 and Rs. 55 respectively. What should be the Approximate overall average selling price of shirt and pant so that 40 % profit is earned?
a. Rs. 72.5
b. Rs. 71
c. Rs. 72
d. Rs. 70
e. None of these

5. An electric pump was sold at a profit of 15 %. Had it been sold for Rs. 600, the profit would have been 20 %. The former selling price is:
a. Rs. 500
b. Rs. 540
c. Rs. 575
d. Rs. 600
e. None of these

Hots- High Order Thinking Skills

1. Ravi purchases 90 pens and sells 40 pens at a gain of 10% and 50 pens at a gain of 20%. Had he sold all of them at a uniform profit of 15% he would have got Rs. 40 less. Find the cost price of each pen.
   a. Rs. 80
   b. Rs. 75
   c. Rs. 90
   d. Rs. 100
   e. None of these

2. At a cost of 60 paise per article, Sarika produces 750 articles. She puts the selling price such that if only 600 articles are sold, she would have made a profit of 40% on the outlay. However, 120 articles got spoilt and she was able to sell 630 articles at this price. Find her actual profit or loss percent as the percentage of the total outlay assuming that the unsold articles are useless.
   a. 47% profit
   b. 51% profit
   c. 36% loss
   d. 28% loss
   e. None of these

3. Kritika bought 25 i-pads and i-phone for Rs. 205000. She sold 80% of the i-pads and 12 i-phones for a profit of Rs. 40000. Each i-pad was marked up by 20% over cost and each i-phone was sold at a profit of RS. 2000. The remaining i-pads and 3 i-phones could not be sold. What is Kritika's overall profit/loss?
   a. Rs. 500 profit
   b. Rs. 1000 loss
   c. Rs. 1500 profit
   d. No profit, no loss
   e. None of these

4. APD printed 3000 copies of a magazine at a cost of Rs. 240000. It gave 500 copies free to different philanthropic institutions. It allowed a discount of 25% on the published price and gave one copy free for every 25 copies bought at a time. It was able to sell all the copies in this manner. If the published price is Rs. 325, then what is its overall gain or loss percentage in the whole transaction?
   a. 89% gain
   b. 120% loss
   c. 140% loss
   d. 143.75% gain
   e. None of these

5. A cab driver makes a profit of 20% on every trip when he carries 3 passengers, and the price of petrol is Rs. 30 a litre. Find the percentage profit for the same journey if he goes with four passengers per trip and the price of petrol reduces to Rs. 24 a litre? (Assume that revenue per passenger is the same in both the cases)
    a. 100%
    b. 76%
    c. 54%
    d. 43%
    e. None of these

Hots- High Order Thinking Skills

1. Ram borrowed Rs. 725 from Shyam at the beginning of a year at interest. After 8 months, he again borrowed Rs. 362.50 at a rate of interest double that the former sum bears. At the end of the year, the sum of interest on both loans is Rs. 43.50. Find the first rate of interest per annum?
   a) 4.5 %
   b) 4.75 %
   c) 6.25 %
   d) 7.2 %
   e) None of these

2. The cost price of goods with a bankrupt is Rs. 25500 and if the goods had realised in their full value, his creditors would have received 85 paise in the rupee. But 2/5 of the goods were sold at 17 % and the remainder at 22 % below their cost price. How many paise in a rupee was received by the creditors?
   a) 72 paise
   b) 68 paise
   c) 55 paise
   d) 52 paise
   e) None of these

3. A shopkeeper undertakes to supply 2000 tables at Rs. 1725 each. He estimates that if 10 % are defective which will be sold at 50 %, then the profit will be 15 % on his whole outlay. When the tables were supplied, 70 % of the tables were found defective. What loss did the shopkeeper incur?
   a) Rs. 607500
   b) Rs. 557500
   c) Rs. 550500
   d) Rs. 80680
   e) None of these

4. Sweta invested Rs. 10000 in a scheme exactly three years ago. The value of the investment increased by 10 % during the first year, increased by 5 % during the second year, and decreased by 10 % during the third year. What is the value of the investment today?
   a) Rs. 10500
   b) Rs. 10395
   c) Rs. 10342
   d) Rs. 10230
   e) None of these

5. **In Mumbai, 60 % of the registered voters are BJP supporters and the rest are Congress supporters. In a mayoral race, if 75 % of the registered voters who are BJP supporters and 20 % of the registered voters who are congress supporters are expected to vote for candidate X, what percent of the registered voters are expected to vote for candidate X?**

a) 53 %

b) 55 %

c) 57 %

d) 59 %

e) None of these

Solutions
Foundation

1. (a)
CP = Rs. 27.50, SP = Rs. 28.60
Then Gain = SP – CP = 28.60 – 27.50 = Rs. 1.10
Since, Gain % = (gain × 100/CP) %
» Gain % = (1.10 × 100/27.50) % = 4%

2. (b)
CP = Rs. 490, SP = Rs. 465.50
Loss = CP – SP = 490 – 465.50 = Rs. 24.50
Loss% = (loss × 100/CP) % = (24.50 × 100/490) % = 5%

3. (c)
Let the new SP be Rs. X then
100 – loss%/1st SP = 100 + gain%/2nd SP
» 100 – 5/1140 = 100 + 5/X
» X = 105 × 1140/95 = Rs. 1260

(d)
Here, since both gain and loss percent is same, hence the resultant value would be loss percent only.
» Loss % = a2/100 [where a = 10 %]
 = 1 %
4. (c)
CP of 6 toffees = Rs. 1, CP of 1 toffee = Rs. 1/6
SP of X toffee = Rs. 1 [where X is no. of toffees to sell]
SP of 1 toffee = Rs. 1/X
Gain % = 20/100 = {(1/X) – (1/6)}/ (1/6)
» 1/5 × 1/6 = 1/X – 1/6
» X = 5

Moderate

1. (b)
110 % of SP = 616 (Rate of sales tax = 10 %)
SP = 616 × 100/110 = Rs. 560
CP = (100 × SP) / (100 + gain %)
= (100 × 560) / (100 + 12) = Rs. 500

2. (d)
Let CP be Rs. X
then, 900 − X = 2(X − 450) [Profit = 2 Loss]
3X = 1800
X = Rs. 600
CP = Rs. 600, gain required = 25 %
SP = (100 + gain %) × CP/100
SP = (100 + 25) × 600/100 = Rs. 750

3. (b)
Total CP of mixture = 26 × 20 + 30 × 36
520 + 1080 = Rs. 1600,
SP = 30 × 56 = Rs. 1680
% profit = 80/1600 × 100 = 5 %

4. (c)
Price of 14 shirts = 14 × 45 = Rs. 630
25 pants = 25 × 55 = Rs. 1375
Total price of 39 items = Rs. 2005
Price = (2005/39) × 1.40 [Overall profit = 40 %]
= 71.97 = Rs. 72 (Approx.)

5. (b)
Old Profit % = 15/100 = {(SP)1 − CP}/CP …(i)
New Profit % = 20/100 = {(SP)2 − CP}/CP …(ii) [Here, (SP)2 = Rs. 600]
From (ii), we get CP = Rs. 500
Divide (i) and (ii):
¾ = {(SP)1 − 500}/ (600 − 500)
Hence, (SP)1 = Former Selling price = Rs. 575

Hots- High Order Thinking Skills

1. (a)
Let the CP of each pen be Rs. 100
At the profit of 10 %, SP of 40 pens
= (100 + 10) × 40 = Rs. 4400
At the profit of 20 %, SP of 50 pens
= (100 +20) × 50 = Rs. 6000
SP of 90 pens = Rs. (4400 + 6000) = Rs. 10400
CP of 90 pens = Rs. (90 × 100) = Rs. 9000
At the profit of 15 %, SP of 90 pens
= Rs. (90 × 115) = Rs. 10350
Difference in SP = Rs. (10400 − 10350) = Rs. 50
If the difference is Rs. 50, then CP = Rs. 100
If the difference is Rs. 40, then CP
= (100 × 40) / 50 = Rs. 80
Hence, the cost price of each pen is Rs. 80

2. (a)
Total CP of articles = 750 × 0.6 = Rs. 450 [CP of 1 article = Rs. 0.6]
By selling 600 articles, Sarika should make a 40 % profit on the outlay. This means that the selling price for
600 articles should be
1.4 × 450 = Rs. 630
Thus, selling price per article
= 630/600 = 63/60 = Rs. 1.05 [SP of 1 article]
Since, Sarika sells only 630 articles at this price, her total recovery
= 1.05 × 630 = Rs. 661.5
Hence, actual profit percent
= {(661.5 − 450) / 450} × 100
= 47 %
Thus, Sarika earns 47 % profit on her total investment.

3. (b)
Total number of i-phones = 15
.'. Total number of i-pads = 25-15 = 10
Total CP = Rs. 205000
Since, Kritika sells 80 % of both goods at a profit of Rs. 40000,
therefore, cost of 80 % of the goods = 0.8 × 205000 = Rs. 164000
Total amount recovered (or SP)
= Rs. (164000 + 40000) = Rs. 204000

Hence, loss = Rs. (205000 − 204000) = Rs. 1000
Hence, Kritika's overall loss is Rs. 1000

4. (d)
Cost price = Rs. 240000 [Total 3000 copies]
Published price = Rs. 325 [Published price]
Content Powered by Leap Skills https://www.leapskills.in/
Selling price = (75/100) × 325 = Rs. 243.75
No. of free copies = 500 + (2500/25) = 500 + 100 = 600
So, total selling price = 2400 × 243.75 = Rs. 585000
Hence, percentage gain = {(585000 − 240000) / 240000} × 100
= (345000/240000) × 100 = 143.75 %
Hence, the overall gain is 143.75 %

5. (a)
Let CP of cab driver be price of petrol = Rs. 30 per litre
His, SP would be to carry 3 passengers
Let cost of 1 passenger be Rs. X
Initially he made profit of 20 %
» P% = 20/100 = (SP − CP) / CP
» 20/100 = (3x − 30) / 30
» X = Rs. 12
Now, CP of petrol = Rs. 24 per litre
SP = 4 (cost of 1 passenger) = Rs. 48
= profit % = {(48 − 24) / 24} × 100 = 100 %

30

Aptitude(Numeracy & Reasoning)- 21st century literacies

Simple Interest And Compund Interest

Simple Interest and Compound Interest

Concept 1: Understanding important terms.

- **Interest:** Interest is payment from a borrower or deposit-taking financial institution to a lender or depositor of an amount above repayment of the principal sum, at a particular rate.
- **Rate of Interest:** An interest rate is the percentage of principal charged by the lender for the use of its money.
- **Principal:** Principal refers to the original sum of money borrowed in a loan or put into an investment.
- **Final Amount:** Final amount refers to total amount (Principal amount and Interest) to be paid back to the lender.

- Let's identify these terms in a problem. An amount of Rs.20000 was lend to a borrower for two years at an interest rate of 3% SI. The borrower paid back Rs.21200 to the lender after two years. Here, amount Rs.20000 refers to the principal amount, Two years refers to time by which loan amount along with interest is to be paid back, 3% refers to the percentage of principal charged by the lender and Rs.21200 refers to final amount liable to be paid back to the lender.

- **Concept 2: Understanding Simple interest & Compound interest.**

Simple Interest: Simple interest is the method of calculating the interest amount for some principal amount of money. Simple interest is calculated on the principal, or original, amount of a loan.

Simple interest formula is given as:

$$SI = (P \times R \times T) / 100$$

Where SI = simple interest

P = principal

R = interest rate (in percentage)

T = time duration (in years)

In order to calculate the total amount, the following formula is used:

$$\text{Amount (A)} = \text{Principal (P)} + \text{Interest (I)}$$

Where,

Amount (A) is the total money paid back at the end of the time period for which it was borrowed.

- **Compound Interest:** Compound interest is the method of calculating the interest amount for some principal amount of money. Compound interest (or compounding interest) is the interest on a loan or deposit calculated based on both the initial principal and the accumulated interest from previous periods. It is different from the simple interest where interest is not added to the principal while calculating the interest during the next period. Compound interest finds its usage in most of the transactions in the banking and finance sectors and also in other areas as well. Some of its applications are:

Increase or decrease in population.

The growth of bacteria.

Rise or depreciation in the value of a product.

Compound interest formula is given by:

Compound interest = (Amount – Principal) Where the amount is given by,

$$A = P\left(1 + \frac{R}{100}\right)^t$$

Where,

A= Amount, P= Principal, R= Rate of interest and T= Time (in years)

Derivation of compound interest formula:

Let, Principal amount = P, Time = n years, Rate = R

Simple Interest (S.I.) for the first year:

$$SI_1 = \frac{P \times R \times T}{100}$$

Amount after first year = $P + SI_1 = P + \frac{P \times R \times T}{100} = P\left(1 + \frac{R}{100}\right) = P_2$

Simple Interest (S.I.) for second year:

$$SI_2 = \frac{P_2 \times R \times T}{100}$$

Amount after second year = $P_2 + SI_2 = P_2 + \frac{P_2 \times R \times T}{100} = P_2\left(1 + \frac{R}{100}\right) = P\left(1 + \frac{R}{100}\right)\left(1 + \frac{R}{100}\right)$

$= P\left(1 + \frac{R}{100}\right)^2$

Similarly if we proceed further to n years, we can deduce:

$$A = P\left(1 + \frac{R}{100}\right)^n$$

$$CI = A - P = P\left[\left(1 + \frac{R}{100}\right)^n - 1\right]$$

Concept 3: Compound Interest VS Simple Interest:

- As we know that, the major difference between simple interest and compound interest is that in simple interest, interest is calculated on the principal or original sum every year whereas in compound interest, interest is calculated on the principal and also on the interest earned over the years also called interest on interest. Let's understand the difference between two interests through below example:

		Under Simple Interest	Under Compound Interest
First year	Principal	₹ 100.00	₹ 100.00
	Interest at 10%	₹ 10.00	₹ 10.00
	Year-end amount	₹ 110.00	₹ 110.00
Second year	Principal	₹ 100.00	₹ 110.00
	Interest at 10%	₹ 10.00	₹ 11.00
	Year-end amount	₹(110 + 10) = ₹ 120	₹ 121.00
Third year	Principal	₹ 100.00	₹ 121.00
	Interest at 10%	₹ 10.00	₹ 12.10
	Year-end amount	₹(120 + 10) = ₹ 130	₹ 133.10

Concept 4: Understanding calculation of SI & CI though percentages:

In your previous sessions you have studied concept of percentages, about multiplying factor etc. now its time to utilise those concepts in solving SI and CI problems. Let us see some examples.

- Example 1: What is SI of Rs.800 on 5% per annum for 3 years?

We can either put formula and calculate as below:

SI= (800*5*3)/100 = 120

Or,

As we know that in simple interest, interest is always calculated on principal so we can just calculate 15% (5% for 3 years) of 800 which is 120. Thus, in this way we don't have to remember the formula and we can simply get answers by using concept of percentages.

- Example 2: What will be the CI obtained on an amount of Rs.4800 at the rate of 5% for 3 years?

We can either put formula and calculate as below:

Amount= 4800[1+ (5/100)]^3 = 5556.6 ; CI= (5556.6 – 4800)= 756.6

Or,

We can simply use concept of multiplying factor learnt in percentages, since 4800 is increasing by 5% every year for constant 3 years, we can write it as 4800* (1.05)^3 = 5556.6 ; CI = (5556.6-4800) = 756.6.

Thus, in this way we don't have to remember the complex formula of CI and we easily solve problems based on CI through concept of multiplying factor learnt in session of percentage.

Problems On Profit And Loss
Foundation

1. A sum of money at simple interest amounts to Rs. 815 in 3 years and to Rs. 854 in 4 years. The sum is:
A. Rs. 650
B. Rs. 690
C. Rs. 698
D. Rs. 700

2. Mr. Thomas invested an amount of Rs. 13,900 divided in two different schemes A and B at the simple interest rate of 14% p.a. and 11% p.a. respectively. If the total amount of simple interest earned in 2 years be Rs. 3508, what was the amount invested in Scheme B?
A. Rs. 6400
B. Rs. 6500
C. Rs. 7200
D. Rs. 7500
E. None of these

3. A sum fetched a total simple interest of Rs. 4016.25 at the rate of 9 p.c.p.a. in 5 years. What is the sum?
A. Rs. 4462.50
B. Rs. 8032.50
C. Rs. 8900
D. Rs. 8925
E. None of these

4. How much time will it take for an amount of Rs. 450 to yield Rs. 81 as interest at 4.5% per annum of simple interest?
A. 3.5 years
B. 4 years
C. 4.5 years
D. 5 years

5. Reena took a loan of Rs. 1200 with simple interest for as many years as the rate of interest. If she paid Rs. 432 as interest at the end of the loan period, what was the rate of interest?

A. 3.6
B. 6
C. 18
D. Cannot be determined
E. None of these

Moderate

1. A sum of Rs. 12,500 amounts to Rs. 15,500 in 4 years at the rate of simple interest. What is the rate of interest?
A. 3%
B. 4%
C. 5%
D. 6%
E. None of these

2. An automobile financier claims to be lending money at simple interest, but he includes the interest every six months for calculating the principal. If he is charging an interest of 10%, the effective rate of interest becomes:
A. 10%
B. 10.25%
C. 10.5%
D. None of these

3. A bank offers 5% compound interest calculated on half-yearly basis. A customer deposits Rs. 1600 each on 1st January and 1st July of a year. At the end of the year, the amount he would have gained by way of interest is:
A. Rs. 120
B. Rs. 121
C. Rs. 122
D. Rs. 123

4. The difference between simple and compound interests compounded annually on a certain sum of money for 2 years at 4% per annum is Re. 1. The sum (in Rs.) is:
A. 625
B. 630
C. 640
D. 650

5. There is 60% increase in an amount in 6 years at simple interest. What will be the compound interest of Rs. 12,000 after 3 years at the same rate?
A. Rs. 2160
B. Rs. 3120
C. Rs. 3972
D. Rs. 6240
E. None of these

Hots- High Order Thinking Skills

1. What is the difference between the compound interests on Rs. 5000 for 1 years at 4% per annum compounded yearly and half-yearly?
A. Rs. 2.04
B. Rs. 3.06
C. Rs. 4.80
D. Rs. 8.30

2. The compound interest on Rs. 30,000 at 7% per annum is Rs. 4347. The period (in years) is:
A. 2
B. 212
C. 3
D. 4

3. What will be the compound interest on a sum of Rs. 25,000 after 3 years at the rate of 12 p.c.p.a.?
A. Rs. 9000.30
B. Rs. 9720
C. Rs. 10123.20
D. Rs. 10483.20
E. None of these

4. At what rate of compound interest per annum will a sum of Rs. 1200 become Rs. 1348.32 in 2 years?
A. 6%
B. 6.5%
C. 7%
D. 7.5%

5. The least number of complete years in which a sum of money put out at 20% compound interest will be more than doubled is:
A.3
B.4
C.5
D.6

Solutions
Foundation

1. Answer: Option C

Explanation:

S.I. for 1 year = Rs. (854 - 815) = Rs. 39.

S.I. for 3 years = Rs.(39 x 3) = Rs. 117.

Principal = Rs. (815 - 117) = Rs. 698.

2. Answer: Option A

Explanation:

Let the sum invested in Scheme A be Rs. x and that in Scheme B be Rs. (13900 - x).

Then, $\left(\dfrac{x \times 14 \times 2}{100} \right) + \left(\dfrac{(13900 - x) \times 11 \times 2}{100} \right) = 3508$

$\Rightarrow 28x - 22x = 350800 - (13900 \times 22)$

$\Rightarrow 6x = 45000$

$\Rightarrow x = 7500.$

So, sum invested in Scheme B = Rs. (13900 - 7500) = Rs. 6400.

3. Answer: Option D

Explanation:

$$\text{Principal} = \text{Rs.} \left(\dfrac{100 \times 4016.25}{9 \times 5} \right)$$

$$= \text{Rs.} \left(\dfrac{401625}{45} \right)$$

$$= \text{Rs. } 8925.$$

4. Answer: Option B

Explanation:

$$\text{Time} = \left(\dfrac{100 \times 81}{450 \times 4.5} \right) \text{years} = 4 \text{ years.}$$

5. Answer: Option B

Explanation:

Let rate = R% and time = R years.

Then, $\left(\dfrac{1200 \times R \times R}{100} \right) = 432$

$\Rightarrow 12R^2 = 432$

$\Rightarrow R^2 = 36$

$\Rightarrow R = 6.$

MODERATE

1. **Answer**: Option **D**

Explanation:

S.I. = Rs. (15500 - 12500) = Rs. 3000.

Rate $= \left(\dfrac{100 \times 3000}{12500 \times 4} \right)\% = 6\%$

2. **Answer:** Option **B**

Explanation:

Let the sum be Rs. 100. Then,

S.I. for first 6 months = Rs. $\left(\dfrac{100 \times 10 \times 1}{100 \times 2} \right) = $ Rs. 5

S.I. for last 6 months = Rs. $\left(\dfrac{105 \times 10 \times 1}{100 \times 2} \right) = $ Rs. 5.25

So, amount at the end of 1 year = Rs. (100 + 5 + 5.25) = Rs. 110.25

$\therefore$ Effective rate = (110.25 - 100) = 10.25%

3. Answer: Option **B**
Explanation:

Amount = Rs.	$\left[1600 \times \left(1 + \dfrac{5}{2 \times 100}\right)^2 + 1600 \times \left(1 + \dfrac{5}{2 \times 100}\right)\right]$
= Rs.	$\left[1600 \times \dfrac{41}{40} \times \dfrac{41}{40} + 1600 \times \dfrac{41}{40}\right]$
= Rs.	$\left[1600 \times \dfrac{41}{40}\left(\dfrac{41}{40} + 1\right)\right]$
= Rs.	$\dfrac{1600 \times 41 \times 81}{40 \times 40}$
	= Rs. 3321.

∴ C.I. = Rs. (3321 - 3200) = Rs. 121

4. Answer: Option **A**
Explanation:
Let the sum be Rs. x. Then,

$$\text{C.I.} = \left[x\left(1 + \dfrac{4}{100}\right)^2 - x\right] = \left(\dfrac{676}{625}x - x\right) = \dfrac{51x}{625}.$$

$$\text{S.I.} = \left(\dfrac{x \times 4 \times 2}{100}\right) = \dfrac{2x}{25}.$$

$$\therefore \quad \dfrac{51x}{625} - \dfrac{2x}{25} = 1$$

$$\Rightarrow x = 625.$$

5. Answer: Option C
Explanation:

Let P = Rs. 100. Then, S.I. Rs. 60 and T = 6 years.

$$\therefore R = \left(\frac{100 \times 60}{100 \times 6}\right) = 10\% \text{ p.a.}$$

Now, P = Rs. 12000. T = 3 years and R = 10% p.a.

$$\therefore \text{C.I.} = \text{Rs.} \left[12000 \times \left\{\left(1 + \frac{10}{100}\right)^3 - 1\right\}\right]$$

$$= \text{Rs.} \left(12000 \times \frac{331}{1000}\right)$$

$$= 3972.$$

HOTS- HIGH ORDER THINKING SKILLS

1. Answer: Option A
Explanation:

C.I. when interest compounded yearly	$= \text{Rs.} \left[5000 \times \left(1 + \frac{4}{100}\right) \times \left(1 + \frac{\frac{1}{2} \times 4}{100}\right)\right]$
	$= \text{Rs.} \left(5000 \times \frac{26}{25} \times \frac{51}{50}\right)$
	$= \text{Rs. } 5304.$
C.I. when interest is compounded half-yearly	$= \text{Rs.} \left[5000 \times \left(1 + \frac{2}{100}\right)^3\right]$

$$= \text{Rs.} \left(5000 \times \frac{51}{50} \times \frac{51}{50} \times \frac{51}{50} \right)$$

= Rs. 5306.04

- Difference = Rs. (5306.04 - 5304) = Rs. 2.04

2. Answer: Option A

Explanation:

Amount = Rs. (30000 + 4347) = Rs. 34347.

Let the time be n years.

Then, $30000 \left(1 + \frac{7}{100} \right)^n = 34347$

$$\Rightarrow \left(\frac{107}{100} \right)^n = \frac{34347}{30000} = \frac{11449}{10000} = \left(\frac{107}{100} \right)^2$$

∴ n = 2 years.

3. Answer: Option C

Explanation:

Amount $= \text{Rs.} \left[25000 \times \left(1 + \frac{12}{100} \right)^3 \right]$

$$= \text{Rs.} \left(25000 \times \frac{28}{25} \times \frac{28}{25} \times \frac{28}{25} \right)$$

= Rs. 35123.20

- C.I. = Rs. (35123.20 - 25000) = Rs. 10123.20

4. Answer: Option **A**

Explanation:

Let the rate be R% p.a.

Then, $1200 \times \left(1 + \frac{R}{100}\right)^2 = 1348.32$

$\Rightarrow \left(1 + \frac{R}{100}\right)^2 = \frac{134832}{120000} = \frac{11236}{10000}$

$\therefore \left(1 + \frac{R}{100}\right)^2 = \left(\frac{106}{100}\right)^2$

$\Rightarrow 1 + \frac{R}{100} = \frac{106}{100}$

$\Rightarrow R = 6\%$

5. Answer: Option **B**

Explanation:

$P\left(1 + \frac{20}{100}\right)^n > 2P \Rightarrow \left(\frac{6}{5}\right)^n > 2.$

Now, $\left(\frac{6}{5} \times \frac{6}{5} \times \frac{6}{5} \times \frac{6}{5}\right) > 2.$

So, $n = 4$ years.

31
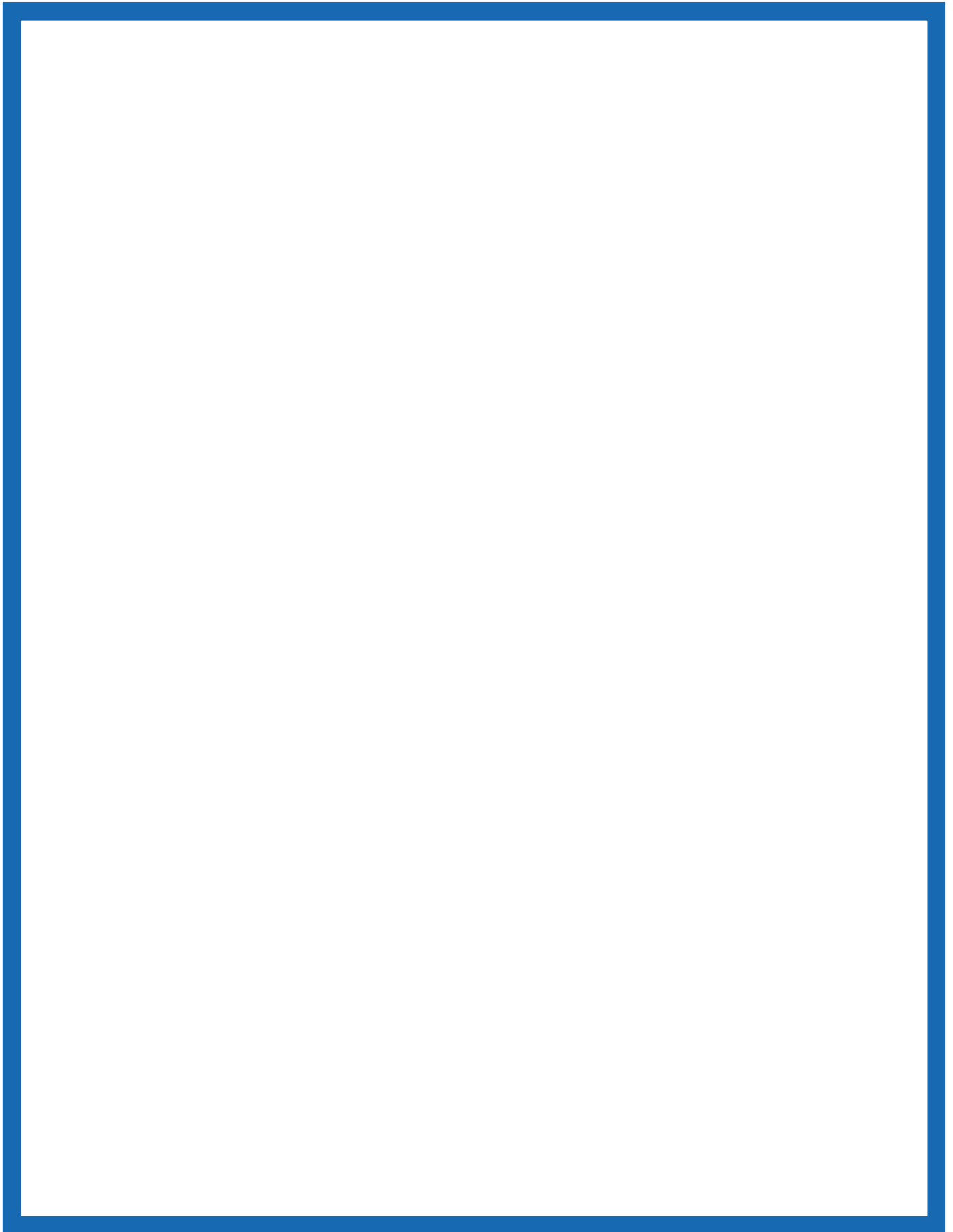
Aptitude (Numeracy & Reasoning) - 21st century literacies

Average

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Conflict Management

CONCEPT 1:
Let's understand the concept of averages with an example.

- Case I: If there are three rooms such that A has 20 students, B has 10 students and C has 15 students.
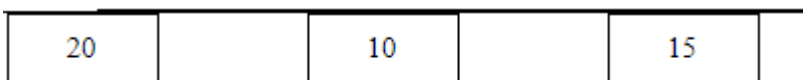
Then the average number of students in the rooms is calculated as [(20+10+15)/3] = 15.
So, average refers to the sum of observations divided by the number of observations.
We got 15 as the average number of students in three rooms, what does that mean? What is "15" trying to say? Let's have a look.
We had three numbers (20,10,15) whose average is 15. Let's say below is a line representing "15" (Average value).

In this figure you can see that 20 is above the average, 10 is below the average and 15 is on the average line. Let us see how much deviation 20 & 10 has from the average number.

20 has +5 deviation (Positive deviation)

10 has -5 deviation (negative deviation)

$$\text{Net deviation} = \text{Positive deviation} + \text{Negative deviation i.e. } [(+5) + (-5)] = 0$$

Oh! Did we get a zero? Isn't that interesting? Yes, it is! Average of an observation is such a number which equals the net deviation of the whole observation to "zero".

So, if there is no deviation in any of the numbers in an observation, then what does that mean? It means that the whole set of observation has same value. So, in above case when you got 15 as average number of students in three rooms, you can consider that each room has 15 students. This statement can also be represented as:

Now, if I tell you to calculate the sum of observations in the above figure, what will you do?

Since you have to sum 15 three times so you will directly write 15*3=45 or you can rearrange this equation to 15=45/3. Can you observe this equation? This is exactly what you write as formula:

Average = Sum of observations/total number of observations

Now did you get an idea that if you know the concept, there is no need to memorize formula because ultimately these formulas were derived from the concepts. Also, average has many practical applications in our daily life, so if we understand the concept, we can utilize them

CONCEPT 2:
Let's understand approach towards solving a problem on average.

- Case 2: The average of five numbers is 29. If one number is excluded, the average becomes 27. What is the excluded number?

- Solution: According to the question, the average of five numbers is 29. Now, using the concepts learnt above, Let's suppose that value of all five numbers is 29 as shown in below figure.
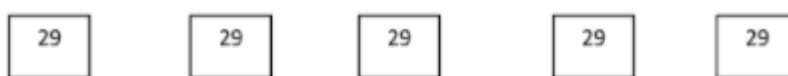
Now, if one number is excluded, the average becomes 27 (or 4 numbers, all 27!), or like –

Now in the second arrangement, the numbers become 27. Originally, they were 29, now how do we calculate the lost/excluded number?

Here is our observation: Looking at both figures we can clearly deduce that initially we had five boxes with value 29 and now we have four boxes with value 27, so we have clearly lost a number/box with value "29". But Is 29 my excluded number? No, try to find other changes between two arrangements. Can you see that apart from one missing box of value "29", now every box has lost two units each. So, total number of units lost from all the four remaining boxes will be 4*2=8. So, now you can say that total number excluded/lost is 29+8=37.

What is the textual method to solve above problem by using formula?

Average of five numbers =29, Let us consider five numbers be A, B, C, D, E. Now according to formula, Average= Sum of observations/Total number of observations. Applying formula, we can write

$(A+B+C+D+E)/5=29$
or
$A+B+C+D+E= 145$---Eq-1,
Since one number is excluded, we can write
$(A+B+C+D)4=27$
or
$A+B+C+D=108$--- Eq-2.

Putting value of Eq-2 in Eq-1
we get $A= (145-108) = 37$.

Now, tell me, is it required to perform above mathematical operation to reach out to solution? Leave back your traditional approaches and start visualizing these problems. This will help you solve real life problems based on averages quickly without using pen & paper.

CONCEPT 3:

- How to visualize solutions to a problem related to average? Let's solve a problem to learn this.

- Case 3: The average weight of the teacher and six students is 12 kg which is reduced by 5 kg if the weight of the teacher is excluded. How much does the teacher weigh?

- Solution: Just visualize along. There are 7 people whose average weight is 12 kg, so we can consider that each of them weighs 12 kg. If the weight of teacher is excluded, average weight is reduced by 5 kg, so now there are 6 people who weigh 7 kg each. Now, let's calculate total weight lost= [12 kg (teacher's weight which was excluded)] + [30kg (5kgs each of 6 students)]. So, the excluded weight was 30+12=42 kg and whose weight were excluded? It was of the teacher. Thus, the teacher weighed 42 kg.

PROBLEMS ON AVERAGE
FOUNDATION

1. Find the average of the following set of scores 253, 124, 255, 534, 836, 375, 101, 443, 760.
a) 427
b) 413
c) 141
d) 490
e) None of these

2. What will be the average of even numbers between 11 to 63?
a) 37.5
b) 47
c) 42
d) 37
e) None of these

3. A, B, C, D & E are five consecutive even numbers. Average of A and E is 46. What is the largest number?
a) 52
b) 42
c) 50
d) 48
e) None of these

4. Find the average of first 25 multiples of 5.
a) 65
b) 60
c) 75
d) 80
e) None of these

5. 10 kg of rice priced at Rs. 12 per kg is mixed with 6 kg of rice priced at Rs. 16 per kg. Find the average price of the whole mixture?
a) Rs. 14 per kg
b) Rs. 14.50 per kg
c) Rs. 13 per kg
d) Rs. 13.50 per kg
e) None of these

MODERATE

1. The average speed of cyclist who covers first, second and third km at 20, 16 and 12 km/hr respectively (in km/hr) is:
a) 16.24
b) 16
c) 15.66
d) 15.32
e) None of these

2. Five years ago, the average age of P and Q was 15 years. Now, average of P, Q and R is 20 years. What would be the age of R after 10 years?
a) 35 year
b) 40 year
c) 30 year
d) 50 year
e) None of these

3. The average age of 24 boys and their teacher is 15 years. When the teacher's age is excluded, the average age decreased by 1 year. The age of the teacher is?
a) 38 year
b) 39 year
c) 40 year
d) 41 year
e) None of these

4. The average salary of the entire staff in an office is Rs. 500 per day. The average salary of officer is Rs. 750 and that of non-officers is Rs. 250. If the number of officers is 15, then find number of non-officers in the office.
a) 25
b) 10
c) 15
d) 20
e) None of these

5. Three years ago, the average age of family of five members was 27 years. The present average age is also 27 years after the inclusion of a child into family. Find the age of the child.
a) 16 years
b) 12 years
c) 24 years
d) 20 years
e) None of these

HOTS- HIGH ORDER THINKING SKILLS

1. The average weight of A, B and C is 84 kgs. If D joins, the average weight now is 80 kgs. If another person E who is 3 kgs heavier than D replaces A then the average weight of B, C, D and E becomes 79 kgs. What is the weight of A?

a) 70 kg

b)75 kg

c) 65 kg

d) 55 kg

e) None of these

2. A batsman has an average of 30 runs in his 42 innings. The difference between his maximum and minimum score is 100. If these two innings are removed his average for 40 innings are removed his average for 40 innings comes down to 28. What is his minimum score?

a) 20

b) 30

c) 45

d) 40

e) None of these

3. There were 35 students in a hostel. If the number of students increase by 7, the expenses of mess increase by Rs. 42 per day while the average expenditure per head decreases by Rs. 1. Find the original expenditure of the mess.

a) Rs. 420

b) Rs. 520

c) Rs. 450

d) Rs. 550

e) None of these

4. The average salary per head of all the workers in a company in Rs. 95. The average salary of 15 officers is RS. 525 and the average salary per head of the rest is Rs. 85. Find the total number of workers in the workshop.

a) 660

b) 580

c) 650

d) 460

e) None of these

5. The average age of a group of persons going for a picnic is 16.75 years. 20 new persons with an average age of 13.25 years join the group on the spot due to which the average of group becomes 15 years. Find the number of persons initially going for the picnic?

a) 24

b) 20

c) 15

d) 18

e) None of these

SOLUTIONS
FOUNDATION

1. (e)
 Average = (253+124+255+534+836+375+101+443+760)/9
　　　= 409

2. (d)
Total even number = (63 - 11)/2
　　　　　　　= 52/2
　　　　　　　= 26
Sum of the even number between 11 to 63
= 26/2 [2×12+(26-1) ×2]
= 13 [24+50]
= 13 × 74
= 962
Average of even number between 11 to 63
= 962/26
= 37

3. (c)
Let A is x
∴. Then E = x + 8
According to the question
(x + x + 8)/2 = 46
» 2x = 48
» x = 42
largest number is 42 + 8 = 50

4. (a)
Sum of first 25 multiples of 5
= 5 (1+2+3….25)
= 5 × {(25 × 26)/2}
= 1625
Average = 1625/25 = 65

5. (d)
Total price of 10 kg Rice = 12 × 10
　　　　　　　　　= 120
Total price of 6 kg Rice = 16 × 6
　　　　　　　　　= 96
∴. Average = (120 + 96)/16
　　　　　= 216/16
　　　　= 13.50 kg

MODERATE

1. (d)
Let the average speed of a cyclist = x
Total distance = 3 km
∴ 1/20 + 1/16 + 1/12 = 3/x
» (12 + 15 + 20)/240 = 3/x
» 47/240 = 3/x
» x = 15.32 km/hr

2. (c)
Total present age of P and Q = 15 × 2 + 10 = 40 years
Total present age of P, Q and R = 20 × 3 = 60 years
P + R + Q = 60 years
(present age) R = 20 years
R age after 10 year = 20 + 10 = 30 years

3. (b)
Total age of 24 boys and teacher = (24 + 1) × 15 = 375 years
Total age of all boys excluding teacher = 24 × (15 – 1) = 336 years
Age of teacher = 375 – 336 = 39 years
SHORTCUT: Age of teacher = 15 + 24 × 1 = 39 years

4. (c)
Let the total no. of non-officer staff in an office = x
According to the question
750 × 15 + 250x = 500 (x + 15)
» 500x – 250x = 11250 – 7500
» 250x = 3750
» x = 3750/250 = 15
Hence no. of non-officer staff = 15

5. (b)
Total present age of family of 5 members
= 27 × 5 + 3 × 5 = 135 + 15 = 150 years
Total present age of family including child
= 27 × 6 = 162 years
Age of a child = 162 – 150 = 12 years.

HOTS- HIGH ORDER THINKING SKILLS

1. (b)
Total weight of A + B + C = 84 × 3 = 252 Kgs
A + B + C + D = 80 × 4 = 320 Kgs
D = 68, E = 68 + 3 = 71 kgs
B + C + D + E = 79 × 4 = 316 kgs
B + C + D = 316 – 71 = 245 kgs
A = 320 – 245 = 75 kgs

2. (a)
Total runs of 42 innings = 42 × 30 = 1260
Total run excluding min and max inning
= 40 × 28 = 1120
max + min = 1260 – 1120 = 140
max – min = 100
On solving (i) and (ii)
max = 120, min = 20
Hence, minimum score is 20.

3. (a)
Let the average expenditure of a man = x Rs.
∴. According to the question
∴. 35 × x + 42 = 42 (x – 1)
∴. 7x = 84
» x = 12 Rs.
Original expenditure = 35 × 12 = 420 Rs.

4. (a)
Let the total number of workers = x
∴. 15 × 525 + (x – 15) 85 = x ×95
∴. 15 × 525 – 15 × 85 = 10x
∴. 7875 – 1275 = 10x
» 10x = 6600
» x = 660

5. (b)
Let the person initially going for picnic is x
∴. 16.75 × x + 20 × 13.25 = 15 (x + 20)
1.75x = 15 × 20 – 20 × 13.25
1.75x = 35
x = 20

32

Session 48

Aptitude(Numeracy & Reason-ing)- 21st century literacies

Statement, Assumption & Conclusion

Statement, Assumption & Conclusion

Concept 1: What is reasoning?

- Reasoning is defined as a process of critical thinking that evaluates a situation in a logical manner to come to a conclusion.

Examples:

- An HR uses reasoning skills to find out the cause of dissent in a team.
- A team lead uses reasoning skills to allocate and prioritize work in the team.
- A common man uses his reasoning skills to plan his day.
- A businessman uses his reasoning skills to close a deal in his favor.

Concept 2: What is critical thinking?

- Critical thinking involves looking at different perspectives of a situation, observing the situation and its effect and then coming up with a solution. Critical thinking is closely related to problem solving and decision making. The reason critical thinking is a skill and not just an automatic thought process is because most people think "uncritically", making decisions based on personal biases, self-interest or irrational emotions.

Examples of critical thinking:

- A financial planner uses his critical thinking skills while assessing the budget and projecting the costs for the next financial year.
- A manager analyzing client's feedback to prepare quality metrics or process training

program uses his critical thinking skills.
- A business analyst uses his critical thinking to analyze data and make informed decisions regarding a company's performance.

- How to think critically? Here are some ways to improve your critical thinking skills:
- Keep the goal in mind.
- Know your biases and try to look past them.
- Ask questions and gather information.
- Evaluate the facts of the situation and all available data.
- Collaborate and get feedback from others- especially people with different
  backgrounds to your own.
- Generate possible solutions, particularly out of the box ideas.
- Consider the short and long term consequences of implementing each solution.

Concept 3: What is Statement and assumptions?

- Statement: Statement is variously understood to mean either a meaningful declarative sentence that is true or false or the assertion that is made by a true or false declarative sentence.
- Assumption: An assumption is that hidden part of the statement which is assumed/supposed and taken for granted. Something that is not clearly mentioned, but is an integral part of it. For example: Let's take an example of a four storey building made of glass and steel pillars. Now, the glass, the steel pillars can be clearly seen, but the foundation or base of the building is hidden or not clearly seen. This analogy can be used to explain the question type. The glass, pillars which can be clearly seen are parts of the building. This building is the statement of the question. On the other hand, the foundation is the hidden part, not clearly seen, which is the assumption. So, the assumption is the hidden or the implicit part of the statement without which the statement cannot exist.

Concept 4: Examples on statements and assumptions:

- Statement: Amitabh Bachchan says "Today, I have money, fame, property, bank balance. What do you have?" Shashi Kapoor says, "I have mother."
- Assumption: Mother is above all materialistic pleasures of life. This assumption is valid as without assuming it, Shashi Kapoor wouldn't have concluded what he said.

- Statement: "If you trouble me, I will slap you." - A mother warns her child.
Assumption: The mother warns her child with the expectation that after warning, the child may stop troubling her.

- Statement: "All the sweets available in our shop are made from pure ingredients." The banner outside a sweet shop.
- Assumption-1: "People can spend any amount of money to buy sweets made from pure ingredients". Now this assumption is invalid because the owner of the sweet shop may have thought about the money factor associated with the sweets, but the assumption cannot be accepted as it is not mentioned in the statement.

Any assumption can be accepted if it is:
- Root cause of a statement, or
- Desired effect of a statement. For the statement discussed above.

- Assumption-2: "People want sweets made from pure ingredients". This assumption is the root cause of the statement. People want sweets made from pure ingredients, that is why banner was put up. Thus, this is a valid statement.
- Assumption-3: "The owner of the shop expected that people would get attracted from the banner and his sales would increase". This is a valid assumption because that is the desired effect of the statement.

- Statement: The country's overall development has struggled since independence. Government should make every possible step to eradicate corruption.
- Assumption-1: Eradicating corruption is the only solution for country's overall development.
- Assumption-2: Eradicating corruption is the best solution for country's overall development.
- Assumption-3: Eradicating corruption is the definite solution for country's overall development.
- Assumption-4: Eradicating corruption would probably help in overall development.

- In 1,2,3 the words only, best, definite are extreme words with no proof from statement. Whereas "probably" is acceptable in context of the statement.

Important Notes:
- Always check whether an assumption is implicit or not, by "keeping yourself in the shoes of the subject". Think from the perspective of the person saying the line in the statement.
- Always be careful of the extreme words used in the sentence, such as, most, only, all, best, definitely etc. Such statements are supposed to be read very carefully to pick the right assumption.

Important points to remember:
- Always remember that assumption is always indefinite and positive.
- Some words like only, each, any, every, all, Questions indicating words like why, these, what, Answers indicating words like therefore, definitely, but, certainly exist in the assumption and that assumption will always be explicit (false).
- Some words like some, to large extent, many, much exist in the assumption and that assumption will always be implicit (True).
- Any assumption that is conveying the message of advertisement, notice and appeal, that assumption will always be implicit (True).
- Any assumption that is talking about the social welfare (positive), govt. policies that assumption will always be implicit (True).
- If any assumption is talking about past and future that assumption will always be explicit (False).
- If any assumption showing the word like suggestion, order, request that will always be implicit (True).
- Remember that restatement is never implicit.
- Comparison are always wrong
- By keeping all above points in mind you can solve questions of assumptions easily.

Concept 5: What is statement and conclusion?
- Conclusion: Dictionary meaning of conclusion is "a proposition concluded or inferred from the premises of an argument." Conclusions rely on the facts of a situation to make a determination that is not implicitly stated or implied by the information. Essentially, a conclusion is the next logical step in an information series. A statement requires two conditions to serve as a conclusion. First, it must be a logically derived statement from the available information. Second, it must not be stated or inferred from the available information.

- Process of drawing a conclusion:

- Collect information
- Evaluate information
- Evaluate logical conclusions
- Draw conclusions (using logic)

- **Getting facts:** This step includes asking question like "who", "how", "when", "what", "where".
- **Evaluating facts:** This step includes asking questions like "Is the fact relevant or significant? Does it support the conclusion"?
- **Drawing a conclusion:** To avoid error ask questions like "Is the conclusion valid or consistent with the given information" and "Are there any logical flaws in the conclusion?"
- **Evaluating a conclusion:** This step includes asking question "Is the conclusion drawn is fair and logical?"

Concept 6- Examples on statement and conclusion:

- Statement: The sale of television sets of company X has increased.
Conclusion: 1. The sale of television sets of other companies has decreased 2. The sale of television sets of company X was nil in the past
Explanation: In the given statement, nothing is given about the sale of television sets of other companies. Hence, conclusion 1 is not valid while the second conclusion is not related to the statement. Hence, it is also not a valid conclusion.

- Statement: If you are skilful IT engineer, we want to engage you in our organization - An advertisement of company X.
Conclusion: 1. The company X thinks that an engineer is a good worker.
         2. The company X is in need of engineers.
Explanation: Both the conclusion are valid because the company thinks that an engineer is a good worker and also they are in need of engineers, because it is given in advertisement.

Important points to remember:

- Consider only the matter which is given in the statement. Do not add anything in the statement from your side.
- You should avoid the presumption and it should be minded that the conclusion may not be converted into a course of action.
- Generally the past statement is not valid.
- If some law or any correction is talked about in the statement then things related to it will be taken as conclusion because the idea of making a law or correction is that people will follow it. But always remember that conclusion should be directly connected to the statement.
- If in the conclusion words like: definitely, quickly, cent-percent, only one, only forever, all, always, every etc. are linked then those are not considered. But if the conclusion is the direct result of the statement, then it is considered.
- By keeping all above points in mind you can solve problems based on statement and conclusions easily.

Problems On Statement, Assumption
And Conclusion
Foundation

Directions to solve:

In each question below is given a statement followed by two conclusions numbered I and II. You have to assume everything in the statement to be true, then consider the two conclusions together and decide which of them logically follows beyond a reasonable doubt from the information given in the statement.
Give answer:
(A) If only conclusion I follows
(B) If only conclusion II follows
(C) If either I or II follows
(D) If neither I nor II follows and
(E) If both I and II follow.

1. Statements: In a one day cricket match, the total runs made by a team were 200. Out of these 160 runs were made by spinners.
Conclusions:
80% of the team consists of spinners.
The opening batsmen were spinners.
A. Only conclusion I follows
B. Only conclusion II follows
C. Either I or II follows
D. Neither I nor II follows
E. Both I and II follow

2. Statements: The old order changed yielding place to new.
Conclusions:
Change is the law of nature.
Discard old ideas because they are old.
A. Only conclusion I follows
B. Only conclusion II follows
C. Either I or II follows
D. Neither I nor II follows
E. Both I and II follow

3. Statements: Government has spoiled many top ranking financial institutions by appointing bureaucrats as Directors of these institutions.
Conclusions:
Government should appoint Directors of the financial institutes taking into consideration the expertise of the person in the area of finance.
The Director of the financial institute should have expertise commensurate with the financial work carried out by the institute.
A. Only conclusion I follows
B. Only conclusion II follows
C. Either I or II follows
D. Neither I nor II follows
E. Both I and II follow

4. Statements: Population increase coupled with depleting resources is going to be the scenario of many developing countries in days to come.
Conclusions:
The population of developing countries will not continue to increase in future.
It will be very difficult for the governments of developing countries to provide its people decent quality of life.
A. Only conclusion I follows
B. Only conclusion II follows
C. Either I or II follows
D. Neither I nor II follows
E. Both I and II follow

5. Statements: Prime age school-going children in urban India have now become avid as well as more regular viewers of television, even in households without a TV. As a result there has been an alarming decline in the extent of readership of newspapers.
Conclusions:
Method of increasing the readership of newspapers should be devised.
A team of experts should be sent to other countries to study the impact of TV on the readership of newspapers.
A. Only conclusion I follows
B. Only conclusion II follows
C. Either I or II follows
D. Neither I nor II follows
E. Both I and II follow

Moderate

Directions to Solve:

In each question below is given a statement followed by two assumptions numbered I and II. You have to consider the statement and the following assumptions and decide which of the assumptions is implicit in the statement.
Give answer
(A) If only assumption I is implicit
(B) If only assumption II is implicit
(C) If either I or II is implicit
(D) If neither I nor II is implicit
(E) If both I and II are implicit.

1. Statement: "You are hereby appointed as a programmer with a probation period of one year and your performance will be reviewed at the end of the period for confirmation." - A line in an appointment letter.
Assumptions:
The performance of an individual generally is not known at the time of appointment offer.
Generally an individual tries to prove his worth in the probation period.
A. Only assumption I is implicit
B. Only assumption II is implicit
C. Either I or II is implicit
D. Neither I nor II is implicit
E. Both I and II are implicit

2. Statement: It is desirable to put the child in school at the age of 5 or so.
Assumptions:
At that age the child reaches appropriate level of development and is ready to learn.
The schools do not admit children after six years of age.
A. Only assumption I is implicit
B. Only assumption II is implicit
C. Either I or II is implicit
D. Neither I nor II is implicit
E. Both I and II are implicit

3. Statement: "In order to bring punctuality in our office, we must provide conveyance allowance to our employees." - In charge of a company tells Personnel Manager.
Assumptions:
Conveyance allowance will not help in bringing punctuality.
Discipline and reward should always go hand in hand.
A. Only assumption I is implicit
B. Only assumption II is implicit
C. Either I or II is implicit
D. Neither I nor II is implicit
E. Both I and II are implicit

4. Statement: Unemployment allowance should be given to all unemployed Indian youth above 18 years of age.
Assumptions:
There are unemployed youth in India who needs monetary support.
The government has sufficient funds to provide allowance to all unemployed youth.
A. Only assumption I is implicit
B. Only assumption II is implicit
C. Either I or II is implicit
D. Neither I nor II is implicit
E. Both I and II are implicit

5. Statement: The State government has decided to appoint four thousand primary school teachers during the next financial year.
Assumptions:
There are enough schools in the state to accommodate four thousand additional primary school teachers.
The eligible candidates may not be interested to apply as the government may not finally appoint such a large number of primary school teachers.

A. Only assumption I is implicit
B. Only assumption II is implicit
C. Either I or II is implicit
D. Neither I nor II is implicit
E. Both I and II are implicit

Hots- High Order Thinking Skills

Directions to Solve:

In each question below is given a statement followed by two assumptions numbered I and II. You have to consider the statement and the following assumptions and decide which of the assumptions is implicit in the statement.

Give answer

(A) If only assumption I is implicit

(B) If only assumption II is implicit

(C) If either I or II is implicit

(D) If neither I nor II is implicit

(E) If both I and II are implicit.

1. Statement: If it is easy to become an engineer, I don't want to be an engineer.

Assumptions:

An individual aspires to be professional.

One desires to achieve a thing which is hard earned.

A. Only assumption I is implicit

B. Only assumption II is implicit

C. Either I or II is implicit

D. Neither I nor II is implicit

E. Both I and II are implicit

2. Statement: The concession in rail fares for the journey to hill stations has been cancelled because it is not needed for people who can spend their holidays there.

Assumptions:

Railways should give concession only to needy persons.

Railways should not encourage people to spend their holidays at hill stations.

A. Only assumption I is implicit

B. Only assumption II is implicit

C. Either I or II is implicit

D. Neither I nor II is implicit

E. Both I and II are implicit

3. Statement: "The bridge was built at the cost of Rs.128 crores and even civil bus service is not utilizing it, what a pity to see it grossly underutilized." - A citizen's view on a new flyover linking east and west sides of a suburb.

Assumptions:

The building of such bridges does not serve any public objective.

There has to be some accountability and utility of money spent on public projects.

A. Only assumption I is implicit

B. Only assumption II is implicit

C. Either I or II is implicit

D. Neither I nor II is implicit

E. Both I and II are implicit

Directions to Solve

In each question below is given a statement followed by two conclusions numbered I and II. You have to assume everything in the statement to be true, then consider the two conclusions together and decide which of them logically follows beyond a reasonable doubt from the information given in the statement.

Give answer:

(A) If only conclusion I follows

(B) If only conclusion II follows

(C) If either I or II follows

(D) If neither I nor II follows and

(E) If both I and II follow.

4. Statements: In Japan, the incidence of stomach cancer is very high, while that of bowel cancer is very low. But Japanese immigrate to Hawaii, this is reversed - the rate of bowel cancer increases but the rate of stomach cancer is reduced in the next generation. All this is related to nutrition - the diets of Japanese in Hawaii are different than those in Japan.

Conclusions:

The same diet as in Hawaii should be propagated in Japan also.

Bowel cancer is less severe than stomach cancer.

A. Only conclusion I follows

B. Only conclusion II follows

C. Either I or II follows

D. Neither I nor II follows

E. Both I and II follow

5. Statements: The Government run company had asked its employees to declare their income and assets but it has been strongly resisted by employees union and no employee is going to declare his income.

Conclusions:

The employees of this company do not seem to have any additional undisclosed income besides their salary.

The employees union wants all senior officers to declare their income first.

A. Only conclusion I follows

B. Only conclusion II follows

C. Either I or II follows

D. Neither I nor II follows

E. Both I and II follow

Solutions
Foundation

1. Answer: Option D

Explanation:

According to the statement, 80% of the total runs were made by spinners. So, I does not follow. Nothing about the opening batsmen is mentioned in the statement. So, II also does not follow.

2. Answer: Option A

Explanation:

Clearly, I directly follows from the given statement. Also, it is mentioned that old ideas are replaced by new ones, as thinking changes with the progressing time. So, II does not follow.

3. Answer: Option E

Explanation:

According to the statement, Government has spoiled financial institutions by appointing bureaucrats as Directors. This means that only those persons should be appointed as Directors who are experts in finance and are acquainted with the financial work of the institute. So, both I and II follow.

4. Answer: Option B

Explanation:

The fact given in I is quite contrary to the given statement. So, I does not follow. II mentions the direct implications of the state discussed in the statement. Thus, II follows.

5. Answer: Option D

Explanation:

The statement concentrates on the increasing viewership of TV. and does not stress either on increasing the readership of newspapers or making studies regarding the same. So, neither I nor II follows.

Moderate

1. Answer: Option E

Explanation:

The performance of the individual has to be tested over a span of time as the statement mentions. So, I is implicit. The statement mentions that the individual's worth shall be reviewed (during probation period) before confirmation. So, II is also implicit.

2. Answer: Option A

Explanation:

Since the statement talks of putting the child in school at the age of 5, it means that the child is mentally prepared for the same at this age. So, I is implicit. But nothing about admission after 6 years of age is mentioned in the statement. So, II is not implicit.

3. Answer: Option B

Explanation:

Assumption I goes against the statement. So, it is not implicit. The allowance will serve as a reward to the employees and shall provoke them to come on time. So, II is implicit.

4. Answer: Option A

Explanation:

I directly follows from the statement and so is implicit. Also, the statement is a suggestion and does not tell about a government policy or its position of funds. So, II is not implicit.

5. Answer: Option A

Explanation:

Such decisions as given in the statement are taken only after taking the existing vacancies into consideration. So, I implicit while II isn't.

Hots- High Order Thinking Skills

1. Answer: Option B

Explanation:

Clearly, nothing is mentioned about the professional nature of the job. So, I is not implicit. The statement hints that one rejects a thing that is easy to achieve. So, II is implicit.

2. Answer: Option A

Explanation:

The statement mentions that concessions should not be given to people who can afford to spend holidays in hill stations. This means they should be given only to needy persons. So, I is implicit. But, II does not follow from the statement and is not implicit.

3. Answer: Option B

Explanation:

Clearly, the statement expresses grave concern over a newly-built flyover not being utilized by public. This implies that such projects need to be taken up only after working out their utility and that the huge expenditure incurred on building such structures is worthwhile only if they prove useful for the public. Thus, only II is implicit.

4. Answer: Option D

Explanation:

The statement neither propagates the diet of any of the countries nor compares the two types of cancer. So, neither I nor II follows.

5. Answer: Option D

Explanation:

Nothing about the details of the employees' income or the cause of their refusal to declare their income and assets, can be deduced from the given statement. So, neither I nor II follows.

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Session 50

Collaboration Skills

Empathy

Empathy

Read the following Story: Empathy

Once upon a time there was a farmer who wanted to sell a few puppies. He was nailing a board written "Puppies for Sale".
As he punched his last nail, he saw a boy peeking at him through a barbed wire. The boy said, " Do you have Puppies?"
To this, the farmer replied,
"Yes Boy. I have puppies. But let me tell you. They belong to a good breed so they are costly."
The innocent boy's hand slowly went into his pocket and he gave 100 Rupees to the farmer. "Will this be enough?" the boy asked.
The farmer agreed.
To this the boy said, "Can I have a look at the puppies?"
The farmer smiled and went to his dog kennel and shouted Lucy! Lucy the mother dog jumped out and behind her were tiny little balls of fur. All small and cute puppies jumping, running and rolling down the wedge. Behind them was another puppy. Small, slow and weak. The boy had a glance at all the puppies and finally decided to take the small & weak puppy.
The farmer was perplexed and said, " Dear child, I don't think that's a good choice. The little puppy you chose is small and weak. He'll never be able to run or play with you.
The boy took a moment and then slowly lifted his trouser to reveal that he has an amputated leg which is supported with a steel rod to balance with another leg.
The boy politely replied, "I want the weak puppy because he'll understand me.

He won't run before me but rather walk with me.

This made the farmer very sad. He gifted the puppy to the kid, without any cost.

What is Empathy?
It is an ability to understand another person's thoughts and feelings. It is a set of skills that involves the practice of relating to others with acceptance, understanding and sensitivity. Essentially being in others' shoes and feeling what they feel.

Steps for practising Empathy
Watch and Listen—Listen and observe feelings.
Remember—Connect with the person by recalling a moment where you experienced a similar situation or felt the same emotion.
Imagine—Put yourself in other people's shoes and think about how you would feel in that Situation.
Ask—Ask the person, "How are you feeling?"
Show—Demonstrate your support through encouraging words or simple actions.

Activity: Let's empathise

When: during session

How: As per the trainer's instructions, pick one scenario and create a role play displaying the unsympathetic behaviour (as mentioned in the role play scenario) and empathetic behaviour (what you would do in that situation)

• Go through the following scenarios:

• Scenario 1:

Rahul is a 15 year boy who got his hair coloured. He goes to school the next day thinking his classmates will be very excited about his new hairdo. When he enters the class a boy called Manek and his two friends start making fun of him. Rahul ignores them and attends the first lesson then he goes out for the break. Those boys surround him alone on the playground and make fun of his haircut.They beat him and make him feel bad about his looks. Another couple of children are watching from a short distance away but they don't come to help Rahul.

• Scenario 2:

Romana has recently joined a new college. She is a very enthusiastic basketball player and hopes to join the college team. When he goes to register her name in the team, she finds out that there are no girls in the college team. The boys and the coach make fun of her. They tell her "Sports are not for girls. Go learn to braid your hair!"

• Scenario 3:

A new child, named Siva, comes to school from the southern state of Kerala. His Hindi is not very good and he has a strong accent of a South indian . When the teacher introduces him to the students and he says 'hello, my name is ____ " , a few of the other children laugh quietly.

• Scenario 4:

Radha lives in a remote community of Bhimgarh. She has recently joined a new school in the city. Her father is a vegetable vendor and her mother sells tea. When her friends in the new school got to know about her, they started ignoring her. No one wants to be friends with her or share the seat. She sits alone during lunch time and has no friends.

Quiz:

1. If your friend is angry at you. Are you able to sense it?

a. Yes
b. No

2. Do you get emotional when you see someone crying?

a. Yes
b. No

3. Your family member has got a promotion in Job. Does that make you happy?

a. Yes
b. No

4. Two people are having an unrestrained laughter. Does that make you Smile/Laugh?

a. Yes
b. No

5. You have not met your boyfriend/ girlfriend for 3 months due to a lockdown. Does that make you feel sad?

a. Yes
b. No

If you have ticked 5 or 4 yes, you are highly empathic. 3 yes makes you moderately empathetic and below 3 yes defines you less empathetic.

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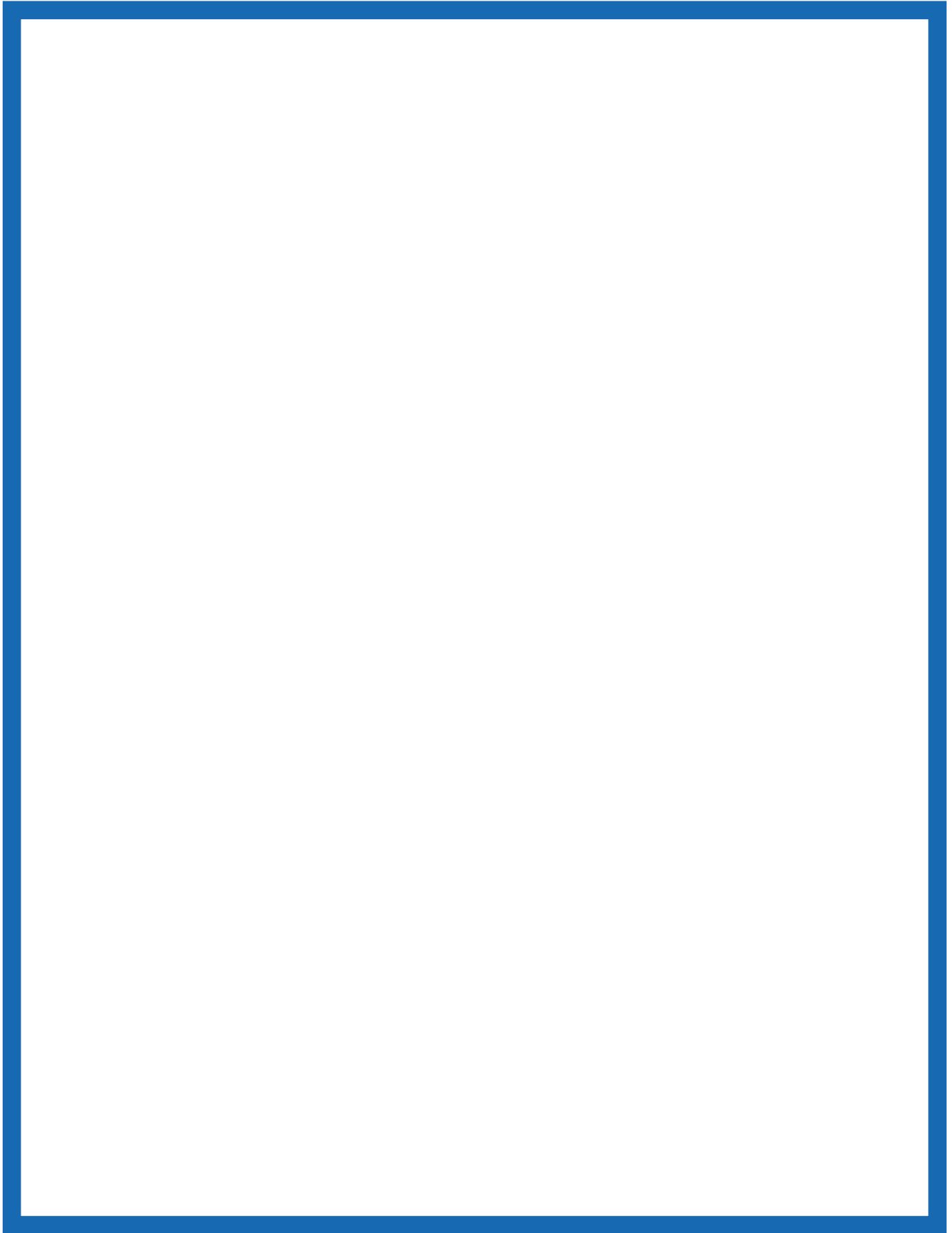
Collaboration Skills

Team Work

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Team Work

Story: The Football Game

It was a bright sunny morning and the football ground was shining with yellow
rays from the sun.
Seeing this, a group of boys nearby decided that we will play a football match
and each one of us can bring something used for the matches. One can bring
a football, another the corner flag, others the goalkeeper gloves, marking chalk,
goalposts, etc.,
After some time everyone gathered on the ground and started picking the teams.
Soon there was a slight argument about who would pick the team. They decided
that the person who had bought the most important object to play the game
would pick the team.
 Time passed by and they couldn't decide which was the most important thing.
Then they decided, they will start playing the game with all the objects the boys
have bought and one by one will get rid of objects and finally see which is more
important for playing the game.
When the game started, the first thing they got rid of was the whistle, because
they thought the referee could shout instead of whistling. Then the goalkeeper
removed his gloves and started saving the ball
without the gloves. Then they replaced the goalpost
with a couple of bins on each side.
 And finally, they replaced football with old tin and
kept playing.
While they were playing the game, a father and

son were passing nearby. Seeing this, the father said to his son **"Son, see the boys, and learn from the kids. Without football, they were managing to play football, even though they were never going to be able to improve the game by playing with those objects".**

The boys nearby heard him saying this and soon realized that because of their personal ego and individual pride they were not able to enjoy themselves and play a proper football match even though they had all the necessary kits for playing.

At that moment all the boys decided that we will push their ego and selfishness aside and start playing the match again with proper football kits.

The match really went well, with each one of them concentrating on enjoying and improving their game.

Moral:

"In our life, everyone has an individual goal which we want to achieve but what is more important is the team's goal. When you work as a team, it's very important to set aside your individual pride and ego and work towards the team goals. In this process, you will also achieve your individual goal like improving your game, promotion in office, learning a new process, etc.,"

What is team:

1. A number of people
2. With complementary skills
3. Who share a common purpose and goal
4. A commitment with a common vision of progress
5. And mutual responsibility

What is teamwork:

The ability to cooperate and communicate effectively with others to achieve a common goal.

Guidelines for teamwork in a professional setting

1. Effective communication

- Communicate openly & supportively
- Listen openly
- Interpret nonverbal messages
- Give useful feedback
- Receive feedback effectively

2. Teamwork Agreement

What is it?

- Effectively a contract which all team members sign up to… each team member is expected to abide by that contract
- Expectations each team has for its members
- Designed specifically for your team

Key points:

- Tailored to meet the specific needs of your team members
- Each team member needs give inputs
- A chance for all members to voice their opinions
- All members will be accountable for statements in the agreement

Sample:

- EVERY member is responsible for the team's progress and success
- Attend all team meetings; be on time
- Listen to & show respect for the views of members
- Criticize ideas, not people
- Use & expect constructive feedback
- Resolve conflicts constructively
- Always strive for win-win situations
- Avoid destructive behaviour
- Ask questions when you do not understand

3. Effective meetings

- Project meetings will be held every   .
- Meetings will be called by   .
- Meetings will begin and end on time.
- Decisions will be made by consensus/ majority rule/anarchy.
- The role of scribe will rotate.
- Minutes will be issued by e-mail within 24 hours of each meeting.

4. Project management

Start with consensus on the **project GOAL**

Then work to a **project PLAN** with clear responsibilities, timelines and milestones

5. Conflict management

People typically fear and avoid conflict

Most people believe conflict does not belong in the workplace

Mutually find a solution for win-win situation

Activity: Teamwork- Advantages and Disadvantages

When: during session

How: as per trainer's instructions, write benefits and challenges of working in teams

Benefits	Challenges

Quiz:

1) Rajesh, Seema and Aditya are preparing for a presentation. But Rajesh is the one who is making the presentation & practising while Seema and Aditya are doing nothing productive. This is an example of _____?

a) Poor Teamwork
b) Good Teamwork
c) One man work
d) Ideal Teamwork

2) Shanta, Rohan and Sumit are making a group project. Shanta is researching for the topic, Rohan is making the presentation while Sumit is working on content. This is an example of _____?

a) Unique Work
b) Good Teamwork
c) Bad Teamwork
d) No Teamwork

3) Which of the following forms of Nature gives us a perfect example of teamwork?

a) Snakes
b) Birds
c) Cow
d) Ants

4) Mark among the following, the correct benefit of Teamwork.

a) Less Work Pressure
b) More work distribution
c) Extra time to complete the task
d) Less Efficiency

5) Good team work leads to _____?

a) Increased Tension
b) Increased Workload
c) Increased stress
d) Increased Productivity

Answers

1. a (A poor teamwork is when all the members of a team are not dedicated equally towards a common goal)
2. b (Good teamwork is when all the team members are aware of their responsibilities, they take ownership of the task and work in collaboration)
3. d (From nature the best example and motivation towards Teamwork can be seen in Ants. They are tiny but with teamwork they can lift a way more weight than their own)
4. a (Teamwork has many benefits and one such benefit is that it helps us to reduce the work pressure.
5. d (If a team is working efficiently, this directly impacts the productivity of the work)

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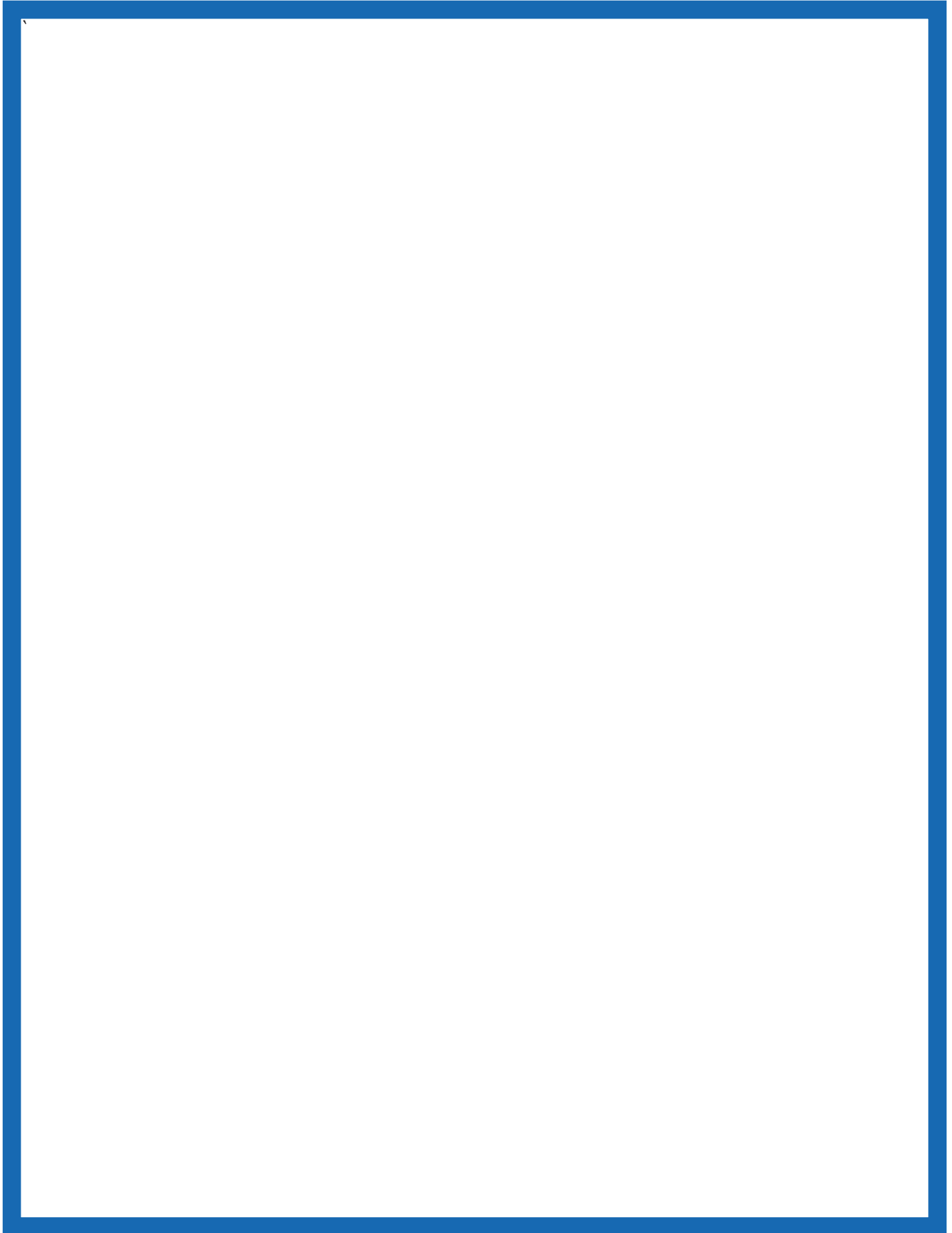
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Session 52

Collaboration Skills

Conflict Management

Conflict Management

Having strong feelings about something can drive passion, advocacy, and a willingness to work hard. On the other hand, strong feelings can also lead to conflicts with others, especially with friends or peers who have different views. If we don't know how to resolve a conflict, conflicts with others can lead to arguments, fighting, and breaks in relationships.

So, let's understand how we can manage the conflicts well.
Conflict Management is an Art and Science of limiting negative aspects of a Conflict and increasing the positive outcome.

The 7 Steps to Resolve a Conflict

Step 1: Agree to talk and establish ground rules for the discussion
There won't be any resolution if those involved don't agree to talk. This needs to be the first step. However, by establishing ground rules then the conversation has a chance of being productive. Examples of ground rules might be:
- no interrupting
- staying respectful
- no yelling
- no cursing
- no insults

Step 2: Take turns in explaining your feelings and thoughts about the situation
Once you've established the ground rules, then you can begin talking about what happened. It is best to have one person share their point of view, experiences, thoughts, and feelings. Then, the other person(s) involved can do the same. It is important that each person continue to follow the guidelines discussed and agreed upon because it is here where emotions might still be intense. If each person can explain their position while staying calm and respectful, it will support finding a resolution.

Step 3: Identify the conflict
Although this sounds simple, identifying the conflict will facilitate finding a solution. This step can get easily overlooked, but it is an important part of the process. After each person has taken turns, articulate what you are arguing about. Stating the conflict in simple terms keeps everyone focused on the problem. You might even state the conflict aloud and get everyone's consent before proceeding.

Step 4: Take turns in exploring options to resolve the conflict
In this step, everyone brainstorms. You're trying to think of ways that might resolve the conflict. You might have ideas, thoughts, or possibilities for resolving the conflict, some of which might require compromise. However, it's not yet time to agree on a solution. For now, stay open to possibilities. At this stage, simply have each person clarify what they would like to see happen.

Step 5: Agree on a solution
After brainstorming, it's time to find an agreement. First, discuss which idea might make the most sense given the circumstances. Or you might identify the solution that everyone involved can agree upon. At this stage, review all the possibilities and then come to an agreement on the solution.

Step 6: State the solution
Once you've made an agreement, state the solution aloud. Just like you did when identifying the problem, stating the solution aloud can help everyone remember what came of this discussion.

Step 7: Decide when to evaluate the solution
Before you end the discussion, decide on whether you will need to reconvene. You may want to do this to evaluate whether the solution is working or if it needs some improvements. Depending upon the circumstances, you may need to revisit this discussion again in the future to make changes to what you agreed upon. Before everyone leaves, decide upon a time in which you will talk again to discuss how this particular solution is working out for each of you.

Activity: Case study- KM NANAVATI V STATE OF MAHARASHTRA (1959)

The premise
Kawas Manekshaw Nanavati, a Naval Commander, was tried for the murder of Prem Ahuja, his wife's lover. During the long periods when Nanavati stayed away from home for work, his wife, Sylvia Nanavati, fell in love with her husband's friend, Prem Ahuja.

The build-up
Nanavati, however, was mostly in the dark about this affair. All the letters written by his wife to him, during his travels, expressed complete commitment towards him. Meanwhile, as would be revealed by Prem's sister during the trials, the lovers had planned for marriage after Sylvia got divorced from Nanavati. Whether this equation between the lovers changed (or was marred with mutual doubts) is still unknown.

The shooting
On April 27, 1959, Nanavati, returning home from one of his assignments, confronted Sylvia. She confessed about the affair. Nanavati dropped his family at the Metro Cinema, for a show he had promised to take them to, but excused himself and headed straight to confront Prem Ahuja. Nanavati went to the Naval base, collected his pistol on a false pretext from the stores along with six cartridges, completed his official duties and proceeded to Prem Ahuja's office. On not finding him there went straight to his flat. At Ahuja's residence, Nanavati confronted him and asked him whether he intended to marry Sylvia and accept their children. After Prem replied in the negative, Nanavati killed Prem Ahuja, firing three close-range shots at him. Nanavati headed straight to confess to the Provost Marshal of the Western Naval Command and on his advice, turned himself in to the Deputy Commissioner of Police.

The Jury trial
The crux of the case was whether Nanavati shot Ahuja in the "heat of the moment" or whether it was a premeditated murder. In the former scenario, Nanavati would be charged under the Indian penal code, for culpable homicide, with a maximum punishment of 10 years. This is because he could have invoked exceptions 1 and 4 of section 300 of IPC (which defines murder). In the latter scenario (i.e. premeditated murder), Nanavati would be charged with murder, with the sentence being death or life imprisonment. Nanavati pleaded not guilty and his defense team argued it as case of culpable homicide not amounting to murder, while the prosecution argued it was premeditated murder.

The Jury verdict (last jury verdict in India)
The jury in the Greater Bombay sessions court pronounced Nanavati as not guilty, with an 8–1 verdict. Hon'ble Mr. Justice Ratilal Bhaichand Mehta (the sessions judge) considered the acquittal as perverse and referred the case to the high court.

The high court intervention and reversal of Jury verdict
The prosecution argued that the jury had been misled by the presiding judge on four crucial points:

One, the onus of proving that it was an accident and not premeditated murder was on Nanavati.
Two, was Sylvia's confession the grave provocation for Nanavati, or any specific incident in Ahuja's bedroom or both.
Three, the judge wrongly told the jury that the provocation can also come from a third person.
And four, the jury was not instructed that Nanavati's defense had to be proved, to the extent that there is no reasonable doubt in the mind of a reasonable person.

The court accepted the arguments, dismissed the jury's verdict and the case was freshly heard in the high court

Abolition of Jury trials
Since the jury had also been influenced by media and public support for Nanavati and was also open to being misled, the Indian government abolished jury trials after this case.

Retrial
The high court agreed with the prosecution's argument that the murder was premeditated and sentenced Nanavati to life imprisonment for culpable homicide amounting to murder. On November 24, 1961, the Supreme Court of India upheld the conviction.

Early Release
The case also was marred with regional colors. Among the jurists, Ram Jethmalani, a Sindhi, conducted the prosecution, while Karl Khandavala, a Parsi, represented Nanavati. Prem Ahuja, the deceased, was a Sindhi and Nanavati was a Parsi. But there was unprecedented support for Nanavati among the public, not limited to Parsis alone. The media scrutiny brought about Nanavati as a victim of foul play, who even in his worst hours, stood for the honour and well being of his family.

Nanavati spent 3 years in prison. Prem's sister Mamie Ahuja was persuaded to forgive Nanavati. She gave her assent for his pardon in writing. Vijaya Lakshmi Pandit, then governor of Maharashtra, pardoned Nanavati.
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Activity: Case study- KM NANAVATI V STATE OF MAHARASHTRA (1959)

When: during the session
How: as per trainer's instructions, answer the following questions

1. Your opinion about someone with whom you have a conflict

2. Is that annoying you?

3. What is the base of your opinion?

4. Point out:what makes you think so certain about that opinion?

5. Point out: what are not so certain about that opinion?

6. How does this opinion impact your relationship with this person?

7. What kind of actions can disabuse your current opinion?

8. What opinion do you have on yourselves about the relationship with that person?

9. How helpful is your opinion in your decision making?

10. If you don't have this particular opinion about that person, imagine how your relationship will be?

Activity: My conflict resolution strategy

When: during session
How: as per the instructions from the trainer, answer the following questions:

Do you have a conflict with someone? It can be a recent conflict or a conflict that was started long back. Explain that conflict here:

_____
_____
_____
_____
_____
_____
_____
_____

_____

What are you going to do to resolve this conflict? Make a specific and time-bound plan.

_____
_____
_____
_____
_____
_____
_____

_____

Quiz:

Help!!! Try to resolve conflicts in the following situations

1) Your friend approached you for help at work but you were unable to solve it due to a tight schedule. This led to tension between you two. Now you need his help. What will you do?

a) Ignore him and do your work.
b) Don't help at any time in future either.
c) Go and talk to him about the last time why you weren't available to help.
d) Lodge a complaint to the boss.

2) You are made school captain for which your friend was also trying. Now things have turned very awkward between you. What will you do?

a) Ignore him as you are the school captain now.
b) Make new friends.
c) Approach him and say that things are awkward but let's try to make it normal.
d) Give up your position for him.

3) Your girlfriend/boyfriend is in the delusion that you are double dating. What measure will you take?

a) Ask him/her to stay in their dreams
b) Ask them why they think so.
c) Find a new partner
d) Walk out of the relationship.

4) You are preparing for government exams but you demotivate yourself by overthinking. What will you do?

a) Meditate
b) Change your goal
c) Do something else to divert your mind
d) Stay demotivated

5) You are leading a team but the team members are not in good books with each other. How will you solve the problem?

a) Ignore, as you don't own them.
b) Have regular team and personal meetings to know their thinking.
c) Be strict and ask them to work together.
d) Make a new team.

Answer:

1) C (here you know the reason that has annoyed your friend. Tell him your situation so that he can understand. Maybe you can promise him to help in future to build a sense of trust.)

2) C (in awkward situations between any two people. It is always best to speak your heart out)

3) B (To avoid conflict one of the most followed steps is to know the origin/source of conflict. Ask them why they think so and justify it if you are innocent).

4) A (This is a scenario of self conflict, where we aspire for something but our thoughts let us down. Option B can be a solution but remember it is only for the temporary basis. Meditation will permanently help to avoid overthinking).

5) B (Ignorance or forceful strict actions will certainly ruin the team. make sure you hold regular team & personal meetings maybe supported with some activities to dethrone team conflicts)

Note: Conflicts are an integral part of life. You can't avoid or divert them. Everyone has to face it but your approach will define whether you'll succeed or not. Most of the time your conflicts can be resolved with peaceful talks and steps suitable for the situation.

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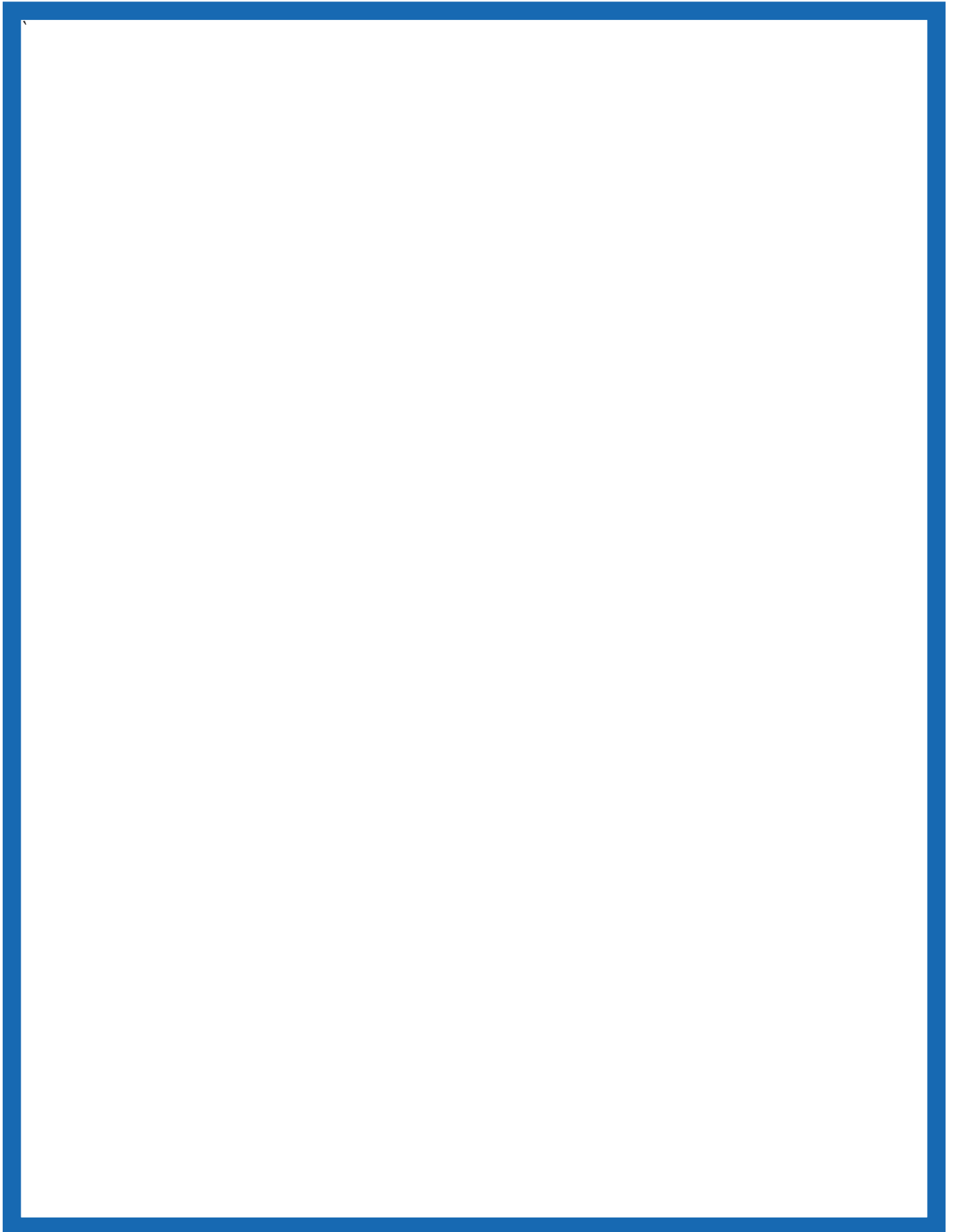
Collaboration Skills

Negotiation

Lesson Plan

A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Negotiation

What are Negotiation Skills?

It is the ability where two or more groups or individuals reach a common objective.

You must have the below mentioned Skills to Ace the Negotiation Skills:

- Communication
- Persuasion
- Planning
- Strategizing

Types of Negotiations:

Distributive Negotiation: This form of negotiation occurs when there is a limited amount of resources and each party assumes if they lose something, the other party will gain something.

Integrative Negotiation: An integrative negotiation occurs when everyone benefits from the agreement. Also termed as Win-Win.

Management Negotiation: This type of negotiation often comes during Hiring , Job Seeking and during working. Where you have to negotiate regarding Salary, Benefits and more with the management.

Co-worker Negotiation: Many job positions require close teamwork and without strong negotiation skills, you may face imbalances in work distribution.

4 Ps of Negotiation

1. **Purpose:-** Each negotiation has a specific purpose. Without aim, negotiations will lead to wastage of resources in terms of manpower, money and time. The purpose also may be further split into various sub-purposes.

2. **Plan:-** Plan will discuss the agenda on which the negotiation takes place. Even each step in the process of negotiation is planned.

3. **Pace:-** It should be kept in mind that people's concentration drops rapidly after about twenty minutes.The negotiator should try to achieve agreement on points of the negotiations before their concentration diminishes.

4. **Personalities:-** Negotiation process involves personalities. Two interest groups sit together to arrive at an agreement. Their personal characteristics like age, status, position, temperament, communication skill, experience in negotiation, etc. influence the whole process of negotiation.

Do's and Don'ts of Negotiation

DO'S

- Be a silent listener of the other speaker's argument
- Use searching questions to verify the correctness of factual information offered by the other party such as dates, figures, etc.
- Use adjournments during the discussion; it gives a chance to consider new points or proposals before the final commitments
- Use concession and compromise as it helps in moving the discussion toward the final outcome
- Summarize all that has been discussed and the final agreement reached. Use written summaries at the end of the discussion.
- Be hopeful, even in a situation of deadlock; remain positive of reaching a mutual agreement ultimately

DON'TS

- Do not state the whole case in the beginning; develop the case as the discussion proceeds
- Do not interrupt:- It may annoy the other person, instead of encouraging cooperation
- Avoid a confrontational tone during the negotiation to encourage cooperation throughout the discussion, as the strategy should be to allow the discussion to move towards agreement.
- Do not make personal criticisms; use impersonal terminology to point out corrections
- Do not allow the discussion to go on too long without bringing in concessions/compromises necessary for reaching an agreement
- In case of a deadlock, no further concessions should be made.

Qualities of a good Negotiator

- Patience
- Empathy
- Communication skills
- Self-confidence
- Mindfulness
- Strong competitive spirit
- Mastery of details

AGREEMENT   SKILLS   COMMUNICATE   TACTIC   CONTRACT   COLLABORATION   GOAL

Phrases you can use while negotiating

Suggesting

Another	possible	option is…
Could you	possibly/ perhaps/ maybe	accept…?
I	'd like to/ 'd probably	suggest…
Would it be	at all	possible for you to…?

Insisting/ Rejecting

I	**may/ might/will probably**	have to back out of this deal unless…
I don't think we would benefit	**enough/ much/ at all**	from that.
I think that's asking	**a bit/ far**	too much.
I think we've already been	**fairly/ quite/ very**	flexible on this.
I was hoping for something	**a bit/ considerably/ quite a lot/ a lot/ much/ far**	better.
That wasn't	**quite/ really/ at all**	what I was hoping for.
That wouldn't go down	**very**	well at the head office.
That's	**a bit/ much/ far**	too high.
We would find this	**somewhat/ rather/ very/ extremely**	difficult to agree to

Softening your position/ Comprising

That doesn't sound like a	**very/ sufficiently**	good deal.
There is just one	**small/ minor/ very important**	thing that I have a problem with.
We seem to have come to	**some kind of**	a decision.

Moving the discussion on

I don't think we're making	**any/ much/ a lot of**	progress here.
Why don't we		
Right, well the first thing we need to consider is...	do is......	

Summarising

Can I	**just**	go over what we've discussed?

Ending

Hopefully our next meeting will be	**a bit/ much/ a lot**	more productive.
I think we've	**almost/ more or less**	covered everything.

Activity: Role Play- Negotiation

When: during session

How: under trainer's guidance, read the following situations and plan how you will negotiate in the given scenario

1: You want to change the furniture and curtains for your office. Instead of wooden, you want them in glass and curtains should be as per latest trend in the market. You have to convince your team members to appeal together to make this change happen

A1: Your head wants to have a meeting with you regarding a change in furniture and curtains for your room but you have to stick to your point that you want it to stay like the way it is. You have to convince your head that wooden furniture is more durable than glass.

2: You interviewed a candidate for a job at your company last week. She didn't get the job. Now, you are at your office and she has come in to talk to you.

A2: You had an interview last week at a textile company. Although you were the perfect person for the job, you didn't get the job. You are very angry. You think that you didn't get the job because of discrimination (for example, because you are a woman, a foreigner, etc). You have decided to go to the company today. Talk with the hiring manager (the interviewer), and find out why you weren't hired!

3: You are a boss. Tell your employees that because of the economic crisis, they will be taking a 20% pay cut. This pay cut actually started last month, but you forgot to tell them. Also, you will need them to come in on the weekends for the next few months until things get better.

A3: You are at work. Your boss has an announcement.

4: You are immigrating to Australia in two weeks and urgently want to sell your car. You haven't had much interest until today, when you have arranged to meet a potential buyer who sounds very interested. The car dates from 2010 and should cost around 7,50,000; however, for a quick sale, and cash payment, you would accept 4,00,000. The car is in good condition and has no problems.

A4: You are negotiating to buy a car (2010 model). The car is in excellent condition and worth at least 7,50,000. You are a bit suspicious as to why it is advertised at 4,00,000. Maybe there is something wrong with it? Your budget is 4,50,000 but obviously you'd prefer to pay even less if the car seems to be without problems.

Situations for Negotiation

Situation 1

A fellow employee, Lalit, has not been contributing equally to complete the normal weekly work at hand. Lalit claims he is contributing, but that he is swamped with other work and the emotional aftermath of a bitter divorce. Some fellow workers are upset that he has been so lax and feel that they should take their complaints about Lalit to the supervisor. You are good friends with Lalit and know he's not lazy but feel that he may be overdramatizing his problems a bit. You brought up the topic with Lalit over coffee last night, but he was defensive and maintained his "innocence"…he even accused you of not sympathizing with him.

Question: What alternatives are there to the course of action your fellow employees want to take (filing a complaint with the supervisor)? How might your suggestions improve the situation without involving the administration or hurting Lalit's professional reputation?

Situation 2

Your work group is composed of two women and five men. The two women have brought up a problem to the group: They feel that the men are dominating the group process and, more importantly, the decision making. Three of the five men tell you privately that the women are "taking advantage of being women" to gain power". You know that the women are right and that they are following an ethical group process by bringing up the issue to the group, rather than running to the boss. You feel, however, that you might jeopardize your own reputation (and future with the company) by supporting them, especially since the corporation is dominated by men. One of the men in the group appears to be neutral, as far as you can tell.

Question: What are your possibilities?

Situation 3
Recently, you and three or four other members of your group have been increasingly aware of personal disagreements and unspoken resentments among the people with whom you work. There is no official procedure to handle such problems, and you realize that, not only is productivity (personal and collective) suffering, but that everyone appears to be unhappy in general with the declining working conditions these problems have created.

You feel the same way and would like to do something to improve the situation.

Question: Considering the fact that these three or four other individuals are also aware of the problem, what can you do?

Situation 4

Ishitha has worked as the executive assistant to Meenu for ten years. Ishitha has worked overtime on many occasions when Meenu had special projects to complete. Meenu has not given Ishitha a raise in her salary for three years and Ishitha is thinking about looking for a new position which could pay her more money. Meenu is concerned about losing Ishitha to another employer but is worried that her own company has not made a profit in the last two years. Ishitha and Meenu sit down in the conference room to negotiate a possible raise in salary for Ishitha.

Question: Considering the situation of the company, should Ishitha be given a salary hike?

Quiz:

1) When people communicate to reach a solution, it is called?

a) Discussion
b) Termination
c) Negotiation
d) Conflict

2) Which of the following skills is not required for Negotiation?

a) Memorising
b) Planning
c) Persuasion
d) Communication

3) When people negotiate for salary or hike, this type of negotiation comes under which category?

a) Integrative Negotiation
b) Management Negotiation
c) Distributive Negotiation
d) Co-worker Negotiation

4) Which of the following is not a part of 4P's of Negotiation?

a) Purpose
b) Plan
c) Pace
d) Product

5) A good negotiator must be _____?

a) Collaborator
b) Communicator
c) Goal Oriented
d) All of the above

Ans: 1-c, 2-a, 3-b, 4-d, 5-d

Being Resilent

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Session 59

Learning Agility & Grit

Being Resilent

Being Resilent

Resilience - How to Deal with Failure

Let's go through an exciting story

One beautiful afternoon, a young man was walking in his garden when he saw a butterfly cocoon on a leaf. Thrilled to witness an amazing transformation of nature, he sat and watched the butterfly for several hours as it struggled to force its body through a small hole in its cocoon. After a while, it seemed that the butterfly had stopped making any progress. It took a lot of effort to get out! It seemed that it could not be freed. It sounded desperate! It seemed that it could go as far as it could, and could not go any further.

The kind man decided to help the butterfly. He took a pair of scissors and twisted the cocoon to make a large opening for the butterfly. The butterfly came out easily without any struggle. But unlike any other butterflies in her garden, she had a swollen body with short and withered wings.

The man was happy that he pulled the butterfly out of its cocoon without much struggle. He continued to watch the butterfly, hoping that, at any moment, the wings would dry up, enlarge and spread out to support the swollen body, which would shrink in time.

Unfortunately, neither its wings expanded nor the swollen body decreased. The butterfly crawled around with shriveled wings and a swollen body, never being able to fly for the rest of its life.

However, with good intentions, the man hindered the development of the butterfly. The constant effort of the butterfly to come out of its cocoon forced the fluid accumulated in the body to be converted into wings. The man, in his haste to help the butterfly, did not understand that the limited cocoon and struggle were the key to the beautiful body and wings of the butterfly. Sometimes struggles and challenges are exactly what we need to grow in our lives. Like, the struggle to break out of the cocoon gives butterflies their beautiful wings, the struggle in our lives makes us strong and gives us wings to fly.

Write down what you learned from the story

_____

_____

_____

_____

_____

What is Flexibility? Think and write your own definition in simple words.

_____

_____

_____

_____

_____

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

How to become more Resilient

Section 1: Advising others
**Write examples of people who hold back from adverse or difficult situations you see around them
(could be your friend, neighbor, relative, or anyone you know)**

_____
_____
_____
_____

**What do you learn from their example? Or would you like to give them some tips to deal with their
problems in a better way?**

_____
_____
_____
_____

Part 2: Giving yourself advice
**Have you ever faced any failure in life? If yes, then write your experience and how did you react to
it.**

_____
_____
_____
_____

If you had a chance to deal with that situation again, what would you do?

_____
_____
_____
_____

What would you do to make yourself more resilient for the future?

_____
_____
_____
_____

- **How to move on from failure?**

Failure is nothing to worry about. Cultivating the ability to handle the situation is a challenge. Why is it that sometimes people can go through a really tough time and come back again? The difference is that those who bounce back are using the skill of resilience. Resilience is the ability to get out of difficult situations. How do you deal with failures? Here are some tips for becoming resilient in difficult situations. Please note that each person's journey on the road to resilience will be different - what works for you may not work for your friends.

- **Take care of yourself:**

Make yourself a priority. Invest in your physical and mental health. Spend time doing the things that make you happy. Have a purpose in life and enjoy working for that purpose.

- **Support System:**

Build a group of people who will always support you in your difficult times. Share your feelings with family or friends to feel better. Connect with your support system regularly and express yourself.

- **Have different options:**

Don't stick to one thing or one decision. Keep your mind and mind open to new ideas, places, people, and decisions. The more open you think, the better you feel

- **Asking for help when needed:**

When it feels like you're breaking up, it's better to go to a psychologist or someone you trust to share your feelings. It's totally okay to seek help whenever you feel emotionally weak or when you face a difficult situation.

- **Positive thinking:**

Stay positive and always believe that things change with time. Don't overthink about problems, keep looking for solutions, and this will be possible only if you believe that things will get better.

Assignment: Quotations

When: Before or after the session
How: Read the quotes below and write your opinion

Quotation 1 by Oprah Winfrey
"Challenges are gifts that force us to discover a new center of gravity. Don't fight them. Just find a different way to stand."

_____

_____

_____

_____

Quotation 2 by Albert Einstein
"He who never made a mistake never tried anything new."

_____

_____

_____

_____

Quotation 3 by Thomas Edison
"Many failures in life are people who didn't realize how close they were to success when they gave up."

_____

_____

_____

_____

Quotation 4 by Steve Jobs
"Getting fired from Apple was the best thing that could ever happen to me. The heaviness of being successful was replaced by the lightness of a restart. It allowed me to enter one of the most creative periods of my life."

_____

_____

_____

_____

Quotation 5 by Steve Jobs
"You cannot connect the dots looking ahead; You can only connect them while looking backward. So you have to trust that the dots will connect in some way or the other in your future. You have to rely on something—your gut, luck, life, karma, whatever. This approach has never let me down, and it has made all the difference in my life."

_____

_____

_____

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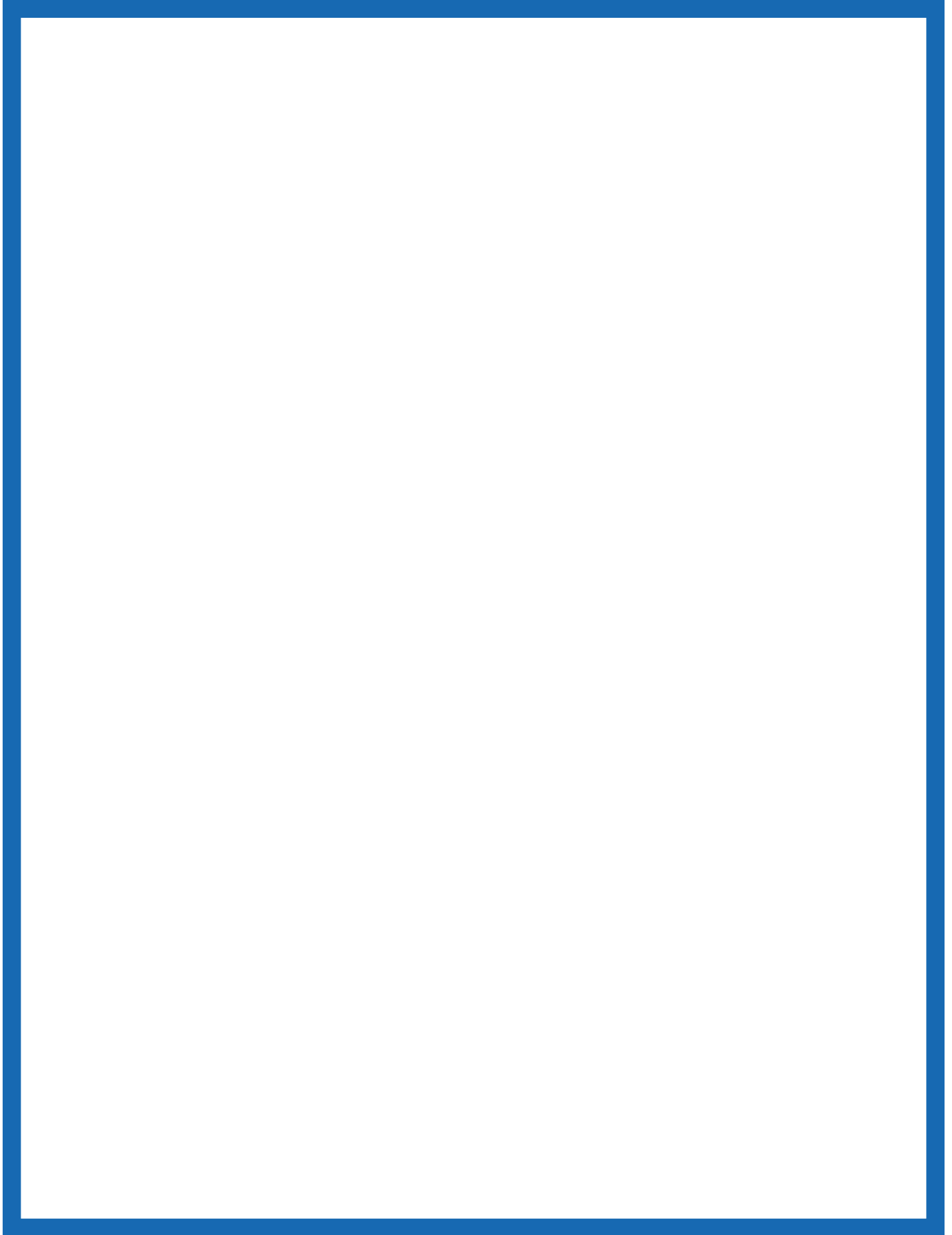
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Session 60

Learning Agility & Grit

Stress and Anger Management

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Stress and Anger Management

What is Stress and Stress Management

Stress is the feeling of being overwhelmed or unable to cope with mental or emotional pressure. Work related stress is a specific type of stress that relates to the demands, opportunities, and constraints in the work environment. Anger is nothing but an emotional state of frustration & rage. Stress management is a person's response to stressors.

Types of stressors

External Stressors	Internal Stressors
Physical Environment	Lifestyle choices
Social Interactions	Negative self-talk
Organisational	Mind traps
Major Life Events	Personality traits
Daily Hassles	

Activity:
Understanding and Managing our stress

When: during session

How: discuss and decide some common causes of stress that you or your group members may face, their symptoms and possible solutions

Reasons	Symptoms	Solutions

How to manage stress: Four A's of Stress Management

1) Avoid unnecessary stress
- Learn how to say no
- Avoid people who give you stress
- Avoid topics that can invite negative thoughts

2) Alter the situation
- Express your feelings instead of bottling them up
- Be willing to compromise
- Manage your time better

3) Adapt to the stressor
- Look at the big picture
- Adjust as per situation
- Focus on the positives

4) Accept the things you can't change
- Don't try to control the uncontrollable
- Share your feelings
- Learn to forgive

How to prevent Stress

- **Exercise**

Go for a walk/run, work out, or go play a sport. Lots of research has shown that exercise is a great way to improve your mood and decrease negative feelings.

- **Listen to music**

Music has also been shown to change a person's mood pretty quickly. And if you dance, then you're exercising and it's a two-for-one.

- **Write down your thoughts and emotions regularly**

You can write things in lots of ways; for example, in a journal or as your own poetry or song lyrics. After you've written it down, you can keep it or throw it away — it doesn't matter. The important thing is, writing down your thoughts and feelings can improve how you feel. When you notice, label, and release feelings as they show up in smaller portions, they don't have a chance to build up inside.

- **Draw**

Scribbling, doodling, or sketching your thoughts or feelings might help too.

- **Meditate or practice deep breathing**

This one works best if you do it regularly, as it's more of an overall stress management technique that can help you use self-control when you're mad. If you do this regularly, you'll find that anger is less likely to build up.

- **Talk about your feelings with someone you trust**

Lots of times there are other emotions, such as fear or sadness, beneath anger. Talking about them can help.

- **Distract yourself**

If you find yourself stewing about something and just can't seem to let go, it can help to do something that will get your mind past what's bugging you — watch TV, read, or go to the movies.

Quiz:

1) Ramesh is an aspiring Guitarist, however he is a bit stressed with his board exams. Choose the best guidance for him?

a) Break his guitar

b) Ignore, there is nothing like stress

c) Cry and get depressed

d) Play guitar whenever stressed

2) Arjun is a short-tempered (one who gets angry easily) guy. Select the best alternative for him.

a) Ignore, anger is normal

b) Meditate

c) Fight with people

d) Become sad as it is opposite to anger

3) Smita is working day and night for an office project. She is deprived of sleep. Which of the following problems should she be most concerned about?

a) Stress

b) Dark Circles

c) Office Project

d) Social Life

4) Which of the following is not among the 4 A's of Management?

a) Alter

b) Avoid

c) Adapt

d) Adore

5) Prisha is an introverted person. She is facing a lot of stress in her life. Help her to fight with it.

a) Socialize

b) Give up

c) Ignore, stress is common

d) Turn extrovert

Answer:
1) d (Doesn't matter if you are a guitarist, painter or dancer. Whenever you are stressed it is best advised to follow your hobby)
2) b (The best alternative for all short tempered people and also to manage anger is Meditation)
3) a (Sleep deprivation can directly lead to stress)
4) d (The 4 A's of management are Accept, Alter, Adore, Avoid)
5) a (For all the introvert person socializing is the best alternative to fight stress)
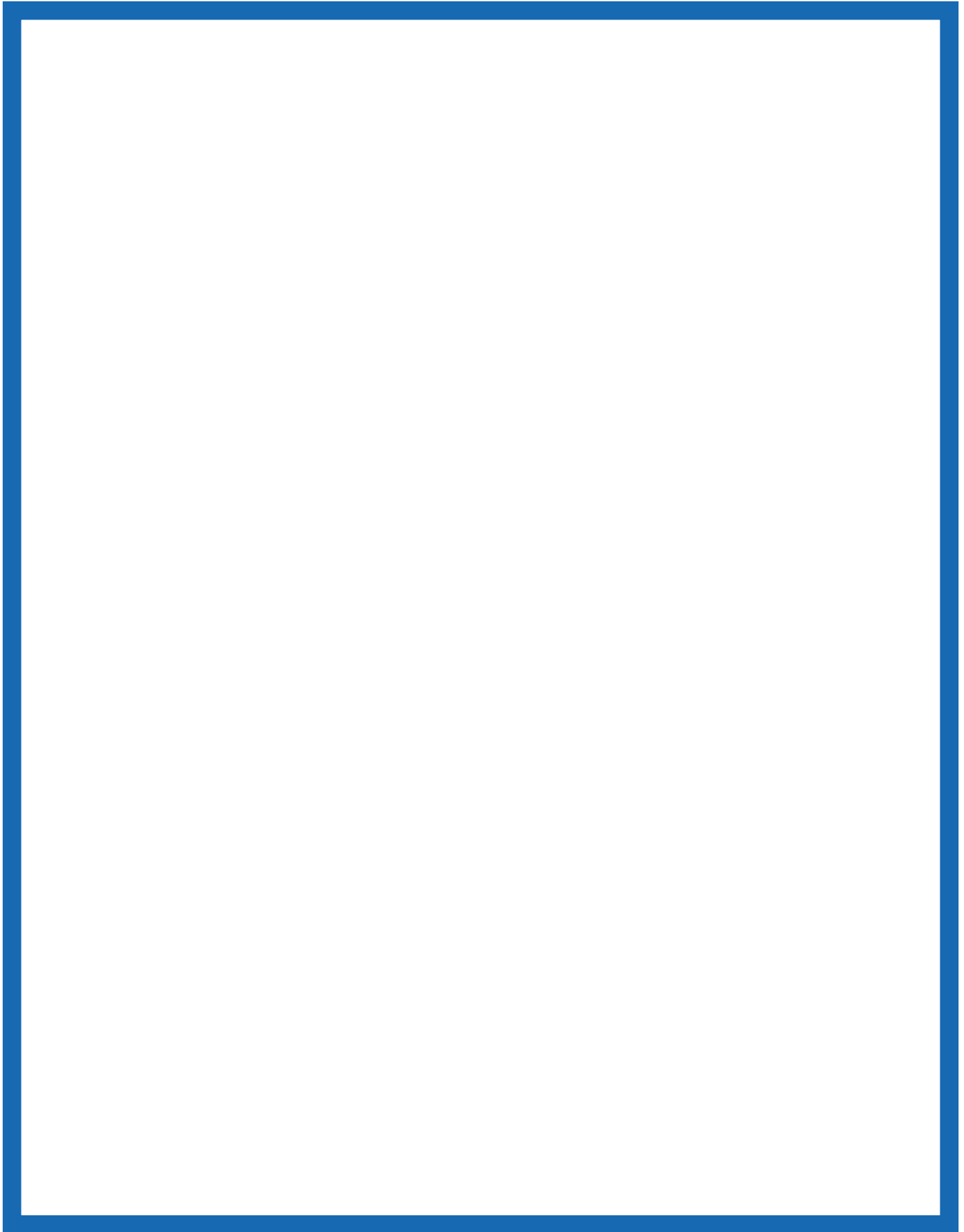
Time Management

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Session 61

Professional
Reliability

Time Management

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Time Management

Time Management

Have you ever used the "Because I don't have time" excuse? It's the most common and most irrelevant excuse people make when they fail to do something. Why is it irrelevant? Because we all have 24 hours a day with us. How we use those 24 hours is all that matters. So, let's learn more about Time Management which is the Art & Science of planning and controlling the time you invest in various activities.

Important Time Management Skills

- Scheduling: To arrange for something to happen or be done at a particular time
- Goal setting: It involves the development of an action plan designed in order to motivate and guide a person or group toward a goal.
- Prioritizing: To put tasks, problems, etc. in order of importance, so that you can deal with the most important first
- Multi-tasking: The ability of a person to do more than one thing at the same time
- Strategizing: Skills that enable you to use critical thinking to solve problems and plan for the future

Effective Time Management Tips:

- Plan in advance
- Segregating your priority & non priority tasks
- Making a daily morning To-do list
- Make highest use of your golden hours or the most productive hours
- Add Time frame/limit to your tasks
- Stick to the deadlines
- Get sufficient breaks wherever required

Difference between Urgent vs Important

Urgent : Urgent means a task requires immediate attention, putting you in a reactive mode, You become defensive, negative, hurried, and narrowly-focused.

Important: Important tasks contribute to your long-term mission. Sometimes important tasks are also urgent, but typically they're not. Focusing on important tasks puts you in a responsive mode, which keeps you calm, collected, and inventive.

Eisenhower Matrix

The Eisenhower Box, also called the Eisenhower matrix, is used by people to organize their duties and tasks based on their categories of Urgent and Not Urgent as well as Important & Not Important.

It will help you to place your tasks and evaluate them on the basis of urgency and importance:

	URGENT	NOT URGENT
IMPORTANT	**DO** Do it now.	**DECIDE** Schedule a time to do it.
NOT IMPORTANT	**DELEGATE** Who can do it for you?	**DELETE** Eliminate it.

Quadrant I (Urgent and Important)

Example:-Family member is hospitalized from a car accident and you need to pick up their children and care for them overnight

Quadrant II (Not urgent but important)

Example:-You need to get a wellness check up. Items in this quadrant allow you to be proactive. You should spend most of the time working on this quadrant.

Quadrant III (Urgent but not important)

Example: - Your boss wants information for a report that is due tomorrow. Or, you want to clean the house before your extended family arrives for dinner. These are usually someone else's important items.

Quadrant IV (Not urgent and not Important)

Example: - You are reading junk mail or surfing the web. These items are considered "busy work". You may use these items as an escape.

Some important concepts related to Time Management

Sisyphus Effect:

It is often suggested to have a to-do list for better time management. But the list shouldn't be extremely long making it unachievable. This is called   the Sisyphus effect of an endless to-do list. This helps us to learn about prioritizing work and not to accept new commitments if you have a fixed to-do list.
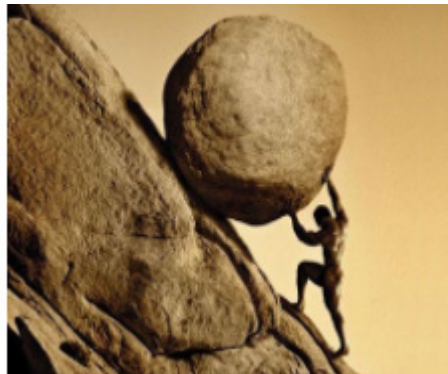
Pareto Principle: 80-20 Rule

The Pareto principle was named after an Italian economist and sociologist Vilfredo Fedrico Pareto. The Principle states that 80% of our work can be achieved in 20% of the time. In effective time management we must observe that the 20% of our activities and work are so crucial that they directly affect our 80% of output.

Example: In a typical meeting, 80% of decisions are usually taken in 20% of the time spent in the meeting. Rest is usually discussion, talks, achievements, etc.

The 80-20 Rule

"For many events, roughly 80% of the effects come from 20% of the causes." - Pareto
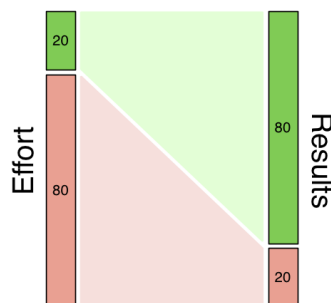
Therefore 20% of the effort produces 80% of the results but the last 20% of the results consumes 80% of the effort.

Handout

A Handout is written material given to inform or provide students with additional information.

Activity:
My Matrix

When: During session
How: Following the instructions of your trainer, make a "To-Do" list and arrange that in the matrix

Quiz:

1) Which of the following Google apps can be best for you to practice Time Management?
a) Google Docs
b) Google Calendar
c) Google Notes
d) Google Drawing

2) Anamika has been given the authority of 2 office projects, Project A on 21st of a particular month and Project B on 28th of the same month. Mark the correct order of the project Anamika must work on.
a) Project B and then Project A
b) Both projects at the same time
c) Choose any random Project
d) Project A and then Project B

3) According to Eisenhower Box, you will delete a task which is _____?
a) Important & Urgent
b) Not Important & Urgent
c) Not Important & Not Urgent
d) Important & Not Urgent

4) Which of the following is not a Time Management tip?
a) Random Start
b) Stick to deadline
c) Organize
d) Plan

5) According to Eisenhower Box, you will immediately do a task which is _____?
a) Not Urgent & Important
b) Urgent & Not Important
c) Urgent & Important
d) Not Urgent & Not Important

Answer: 1-b, 2-d, 3-c, 4-a, 5-c

UNDP

40

Financial Literacy - 21st Century Literacies

Opening a Bank Account

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Opening a Bank Account

What is Financial Planning?

It offers high liquidity since you can withdraw your money anytime you want to. Banks offer a number of useful services like debit card facility, cheque facility etc.You can also choose a nominee who will claim the money after your death. Do you know that even the banks have their own bank who saves them in a financial crisis. Can you name it? It is RBI commonly called a bankers bank.

Advantages of using a Bank account

Savings

It builds a habit of setting aside money. There are various types of bank accounts like fixed deposit, current deposit etc which a customer can choose based on his/her need.

A savings account can offer you a small profit on deposit for allowing a bank to use your money to make investments. In exchange, the bank will compensate you by paying you a small rate of interest.

In certain kinds of accounts, your money is placed in liquid money market funds, generating higher revenues.

Liquidity

In simple language, Liquidity is how easily cash is accessible to you from your account. Eg: You want some cash from your account, simply go to a nearby ATM established by banks and withdraw the amount. This makes the bank a high liquidity entity.

It provides high liquidity especially when a person needs a ready pool of money for the emergency purpose. You can deposit or withdraw your money whenever you need and also send remittances through the bank.

Identity

It provides an identity which is recognized by various government institutions.

Transparency

The bank transactions are very transparent in nature and you can keep a track of your transactions through your Passbook.

Safety

The money kept in a bank account is safe and is well regulated. Money that is kept safely in your home or on your person can be lost in a disaster, such as a fire or stolen. By contrast, up to a certain amount placed in a bank account is automatically insured against loss by the government. Even if the bank where you hold the account goes bankrupt or is robbed, your money is still safe.

Some Banking Jargons:

Deposit: Put money in bank
Withdrawal: Take money out of the bank
Balance: Money available in the account
Fees: Money charged for any service
Overdraft: Withdrawing more money than you have in your account

Which bank should I go to?

Your bank should meet your needs, so ask yourself:

• What services does it offer?
• Is it near my home?
• Where are its ATMs (Automated Teller Machine)?
• What are the fees for different accounts?
• Is it insured by the RBI?

Steps to Open a Bank Account:

- Choose your desired bank where you wish to have an account.
- Visit the bank, and contact the customer service officer. (You can also apply for bank account through their app)
- Submit account opening form where you give all your details.
- Attach the required documents while submitting the form.
- Bank officials will verify your details and documents.
- Once your application is approved you'll receive your debit card and internet banking credentials via post.

Let's understand various bank job roles & their responsibilities in a Bank

Job Title	Roles & Responsibilities
Clerk	Data entry, various paperwork.
Customer Service Officer	Look after all the customers' issues, problems and provide banking services.
Cashier	Look after the money
Relationship Officer	Look after the premium card holders.
Loan Officer	Helps to facilitate loan
Probationary Officer (PO)	Overall banking management
Branch Manager	The one who handles the operations of the bank.

Note: Various banks have various counters and job roles. It may differ from bank to bank and branches as well.

Savings vs Current Account

There may be times when you need to make multiple payments, receipts and other transactions, similar to traders and entrepreneurs. They need to access their accounts frequently and prefer using a Current Account for this. But what is a Current Account and how does it differ from a Savings Account? Here is a list to help you understand the difference between Current Account and saving account:

	Savings	Current
Owner	An individual	Usually an entity like a company, enterprise businesses & firms.
Interest	You	No
Minimum Balance	Low minimum balance	High minimum balance
Overdraft facility	No	Yes
Withdrawal	There is a limit	No Limit
Transaction	Limited transaction	Unlimited Transaction

- **Meaning**

A savings account is a deposit account which allows limited transactions, while a Current Account is meant for daily transactions.

- **Suitability**

A savings account is most suitable for people who are salaried employees or have a monthly income, whereas, Current Accounts work best for traders and entrepreneurs who need to access their accounts frequently.

- **Interest**

Savings accounts earn interest at a rate of around 4%, while there is no such earning from a Current Account. A Current Account is actually a no interest-bearing deposit account.

- **Overdrawing**

When you withdraw more money from the account, than is actually there, then your account is said to be overdrawn. In the case of a savings account, banks neither offer nor allow overdraft facilities, whereas, this facility is provided with a Current Account.

- **Minimum balance**

The minimum balance required to maintain a savings account is usually low, but for a Current Account it is much higher in comparison..

This should clarify the differences in the purpose and function of Current Account and Savings Account.

- **Ownership**

Mostly individuals make a savings account & companies, businesses make Current Account. E.g Ramesh will have a savings account(personal use) but his business Ramesh Hardware will have a current account.

Cash Deposit Slip:

(Note: Yes Bank's format is being used only for reference purpose)

A cash deposit slip tells the bank the amount you wish to add in which account.

It is divided in two parts, one is kept by the bank and the other is a receipt given to you.

You add simple details like Acc. Number, Cash Details, date, Denominations etc. and submit it along with the cash in deposit section at the Bank.

Cheque:

(Note: HDFC Bank's format is being used only for reference purpose)
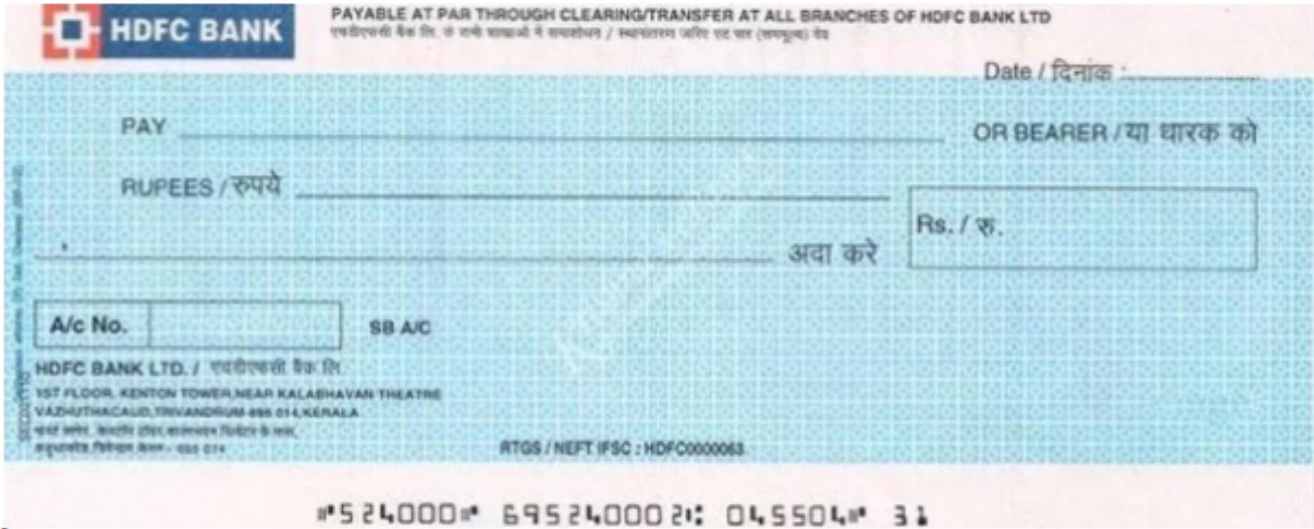
You get a Cheque book along with your debit card via post after successfully opening an account.
Cheque is often used for payments, withdrawing cash or transferring amounts to another account.
If someone issues you a cheque, you can deposit it in your bank and money will be credited in 2-3 working days.

You have to sign a cheque for it to be honored. But make sure your signature is the same as you did while opening a bank account.

Understand the various parts of Cheque:
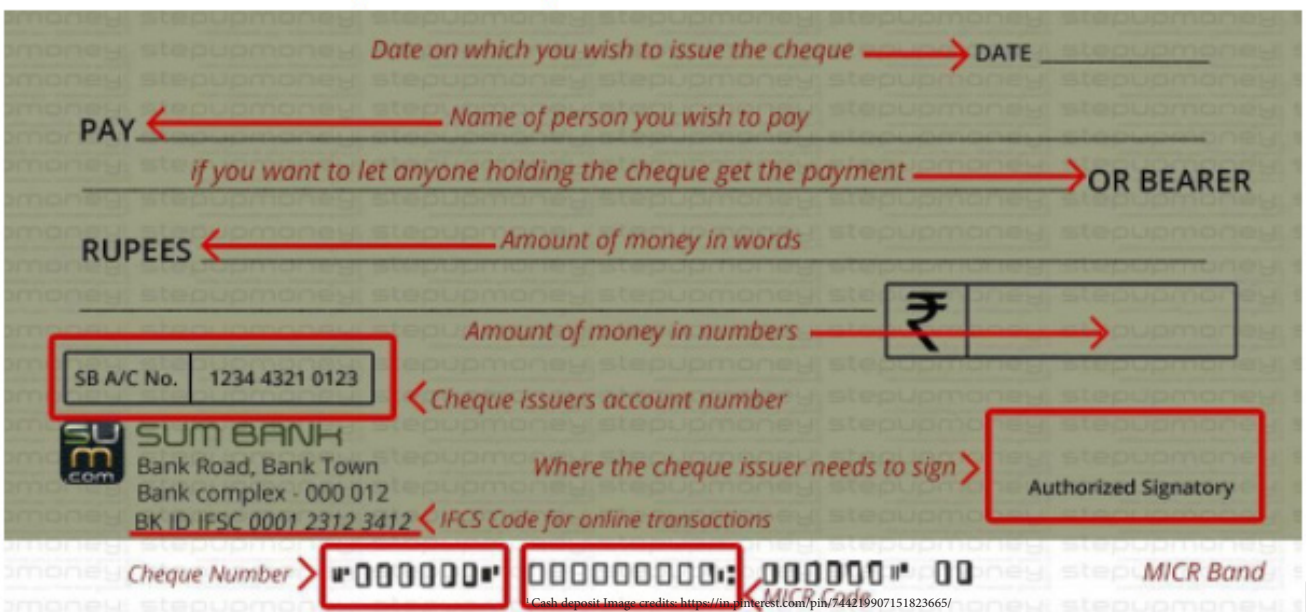
Theft & Protection

Banking is a process to ease our burden and financial transactions. But it is also backed with variety of scams and fraud

It is by the duty of the financial institutions to keep your personal details safe and it is mandated by Law. If there is any breach of security from the bank, they are liable for loss or compensation.

Identity Theft: Identity theft is the crime where someone uses your personal & financial information to commit fraud. Eg. Like unauthorised transactions etc.

Phishing: Fake emails of lottery or various new stories where they ask you for your personal information.

Pharming: Fake websites that look real and take your personal information.

Few Things to remember:
• Never share your personal information.
• If your aadhar card is linked to your bank, avoid sharing the aadhar number.
• Never share your account number with anyone except family members.
• Keep your passbook and other essential documents safely.
• Be cautious even in banks.

Quiz:

1) Who is a Nominee?
a) The person who will claim your bank account after your death.
b) The person who will claim your money in a bank account after your death.
c) The person who will pay your EMI after your death.
d) The person who will repay your debt after your death.

2) Who among the following is called a Bankers Bank?
a) SBI
b) SEBI
c) Financial Institution
d) RBI

3) Which of the following is most likely to make a Current Account?
a) Anuj Realtor Pvt. Ltd.
b) Radha
c) Aman
d) Gautam

4) Which of the following is not a benefit of Current Account?
a) Overdraft
b) No Withdrawal Limit
c) Limit on Deposit
d) Internet Banking

5) Which of the following is not a benefit of a savings account?
a) Availability for Kids
b) Interest Rate
c) Bill Payment
d) Unlimited Withdrawal

Ans: 1-b, 2-RBI (RBI regulates the banks in India), 3-a (Generally companies & businesses make a current account), 4-c (There is no limit on deposit), 5- d (In savings accounts the withdrawals are limited).

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Session 64

Financial Literacy - 21st Century Literacies

Financial Planning

Financial Planning

Shyam is a 10 year old kid living in the rural part of Bihar. His father is a daily wage labourer and mother works in a local mill. Shyam has a younger sister, she is 7 years old. He puts his coins and notes at regular intervals from various sources in his piggy bank. This is the basic level of Financial Planning Shyam is doing. We hope everyone of you has done the same in your childhood.

Go back to your memory lane and feel the sense of savings you used to do.

Ask yourself:-
- How do your Family members practice Financial Planning?
- What are the modes of saving?
- What are the sources of funds in case of a medical & financial emergency?

What is Financial Planning?

A financial plan creates **a roadmap for your money and helps you achieve your goals.** Financial planning can be done on your own or with a professional. Good financial planning should include details about your cash flow, savings, debt, investments, insurance and any other elements of your financial life.

As a youth it is very important for you to save today so that your tomorrow is secured.
Few Good habits to develop early:
You have always heard these famous equations,
Income - Spending = Saving BUT try to follow a more sensible approach of
Income - Saving = Spending.

This simply means that first you allocate your savings and then spend what is left (after basic requirements of Rent, Food, Bills etc.)

Understand this with a following example:
*   A 23-year old who puts away Rs 6,000 a year for 10 years at an annual return of 8%, will have around Rs 87,000. If after those 10 years, he stops contributing and does nothing else till he is 60 years old, the portfolio will have grown to around Rs 694,000.
*   The person who waits until he is 33 to begin investing will need to invest Rs 7,950 for 27 years (till he reaches 60 years of age) in order to have around Rs 694,000.
*   In total, the 23-year old had invested Rs 60,000 out of pocket (to reach Rs 694,000 at age 60) versus Rs 215,000 for the 33-year old.
*   As these calculations show me, there are great costs of starting late on the saving and investing path.
*   So you must start early. **Are you going to save this month?**

Process of Financial Planning:

1. Knowing the current Financial Situation
2. Developing Financial Goal
3. Identifying Alternatives
4. Evaluating Alternatives
5. Creating a financial plan
6. Implementing the financial plan
7. Revising the financial plan

Emergency Fund:

Always have an emergency fund. This fund must be 6 to 8 times your monthly expenses.
Make sure that you never use these emergency funds to get gadgets and other luxuries.
Consider it as sacred money and use it only during emergencies.
With the outbreak of covid -19, the value of the emergency fund has been validated. Future is uncertain and during tough times of lockdown, being jobless or any medical emergency. These funds are your only saviour.

Insurance

Why Is Insurance Important?

Buying insurance ensures that you are financially secure to face any type of problem in life, and this is why insurance is a very important part of financial planning. A general insurance company offers insurance policies to secure health, travel, motor vehicle, and home. The convenient part of it is that you can purchase all these insurance policies online nowadays. Few insurance depends on the person's choice (Term, health) few are compulsory (Motor insurance).

What is Premium?

Premium is nothing but an amount to be paid on a regular basis for a contract of insurance. Premiums can be either Monthly, Quarterly, Half-yearly or Annual.

Here are the Main Reasons Why Having Insurance is Necessary: -

1. Financially Security

No matter how much you are earning or how much you have saved; your financial position can be dented by an unexpected event in a moment. So, the best way to become financially secure is to cover yourself, your family, and your assets with insurance. You can buy or renew insurance online and receive a payout for financial support, in case there happens to be an unforeseen event.

2. Transfer of Risk

The contract of insurance works on the 'principle of transfer of financial risk from the insured to the insurer'. As an insured, you pay premiums to receive compensation from the insurer, in case of occurrence of an unforeseen event. So, having insurance reduces the financial burden on your shoulders.

3. Complete Protection for You and Your Family

Family is the most important asset that you have and your family also depends on you for financial support. This is why it is important to make sure that you and your family are completely secure to face any emergency.

4. No More Stress or Tension During Difficult Times

None of us can see the future or predetermine the future events. Any unforeseen tragedy can leave you physically, mentally, and financially strained. So, if you have insurance to take care of the outcomes of such tragedies such as illness, injury or permanent disability, even death- you save yourself and your family from tension and stress. With insurance in place, any financial stress will be taken care of, and you can focus on your recovery.

5. Some Types of Insurances are Compulsory

Insurance is necessary because sometimes it is mandatory as per the law. An example of this is motor insurance. As per the Motor Vehicle Act of 1988, it is compulsory to have at least a third-party motor insurance for every motor vehicle plying on road in India. Motor insurances come in really handy during claims. At IFFCO Tokio, we have improved it even further with our Quick Claim Settlement process which, as the name suggests, expedites the settlement of claims.

6. Peace of Mind

Having insurance offers you financial security and also peace of mind. No amount of money can replace your peace of mind. So, when you have insurance you know that you are secured against any unforeseen events in life, and this gives you complete peace of mind.The sum of all these reasons provides enough reason as to why insurance is necessary. and with the convenience that you have to buy insurance online from a general insurance company like IFFCO Tokyo to secure you, your family, and your assets, both financial freedom, as well as peace of mind, are pretty achievable.

Types of insurance you must have:

Health is Wealth:

One of the biggest aspects of financial planning also revolves around health. It is rightly said Health is something which no one can buy. BUT we can definitely secure ourselves with the unforeseen situation in future which everyone has to encounter. Even if your employer is providing you with health insurance for you & your family. You must also look for independent health insurance as your association with the company may not be life long.

Term Insurance

This is the most purest & cheapest form of insurance yet not subscribed by many people. The only reason being that the money is gone if you survive the insurance period. But you must also understand that this type of insurance will be a saviour for your family.

For E.g. A sum of Rs. 50 lac term insurance can be easily purchased with a premium of less than Rs. 10,000 per year which accounts for almost Rs. 800 per month which is not a burden to the pocket.

Mutual Fund:

Mutual fund is a process where investment is taken from various investors and the pool of money generated is then invested to purchase stocks, securities & bonds. It is considered one of the safest forms of investment as the money collected is handled by professional investment bankers. This reduces the risk and also the risk (if any) is distributed among various investors.

SIP:

SIP stands for systematic investment plan. It is the most widely followed investment plan by youths and college students. In this plan you invest a small amount in a mutual fund scheme. One of the safest and most convenient forms of investment. The SIP starts from as low as Rs. 500 per month.

PPF Scheme:

PPF account is a long term investment plan. It has an attractive rate of interest (non-taxable). To avail the benefits one has to open the PPF account and the amount deposited annually will be claimed under section (80 C). {refer income tax handout}

Where to open a PPF account?
You can open the account at the Post Office or any other nationalized bank.

Interest Rate: The present interest rate as of 2021 is 7.1% compounded annually.
The minimum time period of a PPF is 15 years. You can extend the period in blocks of 5 years as per your wish. You can open an account with a deposit of Rs. 500 and this has an upper capping of Rs. 1.5 lac.

Eligibility: Every Indian can have a PPF account. They can have only 1 PPF account, they can have a second account only in the case of minors.

Withdrawal: As per the rules one can withdraw the PPF account only at the time of maturity i.e. 15 years. However the scheme also permits partial withdrawal anytime after completing 6 years.

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

Let's Reflect!

1. How do you think today's class will help you attain financial freedom? List action points which you take for your financial freedom?

_____

_____

_____

2. What challenges will you face while building your Financial freedom?

_____

_____

_____

3. How much of an emergency fund will be sufficient for you? Why?

_____

_____

_____

Quiz:

1) Which of the following does not come under Financial Planning?
a) Budgeting
b) Capital Generation
c) Funding
d) Entrepreneurship

2) What is a Debt?
a) A sum of money which is due
b) A depressed money
c) Money in your account
d) Money earned through interest.

3) What is Insurance?
a) Money given to the bank.
b) Compensation against damage or loss.
c) Money earned by the stock market.
d) Money given to cooperative banks.

4) Which of the following is a benefit of Insurance?
a) Investment
b) Financial Security
c) Loss
d) Financial Market

5) Which of the following is compulsory Insurance for everyone?
a) Term Insurance
b) Travel Insurance
c) Property Insurance
d) Motor Insurance

Ans: 1-d, 2-a, 3-b, 4-b,5-d

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Financial Literacy - 21st Century Literacies

Income Tax

Lesson Plan

A teachers objectives for what students should accomplish and how they will better learn the material.

Income Tax

What are taxes?

Have you heard about this term "Tax"? Have you ever paid any tax? Let's learn more about taxes in this lesson. Tax is a compulsory contribution to state revenue, levied by the government on the worker's income & business profit, or added to the cost of some goods, services & transactions.

WHAT IS DIRECT TAX?

In simple words, a direct tax is a tax that you directly pay to the authority imposing the tax. For instance, income tax is imposed by the government, and you pay it directly to the government. These taxes cannot be transferred to any other entity or person. There are several acts which govern direct taxes.

In India, CBDT (Central Board of Direct Taxes) which is governed by the Department of Revenue is responsible for the administration of direct taxes. The department is also involved in planning and providing inputs to the government regarding the implementation of direct taxes.

WHAT IS INDIRECT TAX?

While direct taxes are imposed on income and profits, indirect taxes are levied on goods and services. A major difference between direct and indirect tax is the fact that while direct tax is directly paid to the government, there is generally an intermediary for collecting indirect taxes from the end-consumer. It is then the responsibility of the intermediary to pass on the received tax to the government.

Unlike a direct tax, indirect taxes do not depend on the income of an individual. The tax rate is the same for everyone. The CBIC (Central Board of Indirect Taxes and Customs) is mostly responsible for handling indirect taxes in India. Just like CBDT, CBIC also works under the Department of Revenue.

Basis	Direct tax	Indirect Tax
Meaning	Tax levied on income or wealth of a person and is paid by the person (or his office) directly to the government.	Tax levied on Goods & Services
Impact	Impact on one person & tax is imposed on his salary.	Impact on various people. Imposed on sellers, but collected from buyers and paid by sellers to the government.
Burden	More the salary, more is the tax	Tax is flat for all the individuals, despite their income.
Tax benefit	Tax benefit is possible and easy	Tax benefit is difficult
Inflation	Helps to reduce the inflation.	Contributes to inflation.
Shiftability	Cannot be shifted to others	can be shifted to others
Examples	Income tax, Wealth Tax, capital gains, Securities	GST, Excise Duty

Why should we pay taxes?

- Welfare Scheme
- Helps build the Nation
- Improved healthcare & education

Can you think of more reasons or benefits of paying tax? Write them here:-

_____

_____

_____

Income Tax Slabs:

Income Slab	Tax Slab Rates (FY 2020-21)
Rs. 0 - Rs. 2.5 lac	Nil
Rs. 2.5 lac - Rs. 5 lac	5%
Rs. 5 lac - Rs. 7.5 lac	10%
Rs. 7.5 lac - Rs. 10 lac	15%
Rs. 10 lac - 12.5 lac	20%
Rs. 12.5 lac - Rs. 15 lac	25%
> Rs. 15 lac	30%

Steps to Calculate Income Tax:
1. Identify income from all sources e.g. Salary, rent, interest etc.
2. Find your net taxable income (after deductions & exemptions)
Eg. If your Total salary is Rs. 7 lac but your gross salary comes out to be Rs. 6.5 lac. Tax is calculated on the gross salary.
3. Compute income tax based on tax slab

Let's understand the various ways to save taxes:
80C: This component has a limit of 1.5 lakh every year. To claim these deductions you have to invest in EPF (Employee Provident Fund), PPF (Public Provident Fund), Housing Loan Principal Amount Repayment.
Section 80C – Deductions on Investments
Section 80C is one of the most popular and favourite sections amongst the taxpayers as it allows to reduce taxable income by making tax saving investments or incurring eligible expenses. It allows a maximum deduction of Rs 1.5 lakh every year from the taxpayers total income.
The benefit of this deduction can be availed by Individuals and HUFs. Companies, partnership firms, LLPs cannot avail the benefit of this deduction.
Section 80C includes subsections , 80CCC, 80CCD (1) , 80CCD (1b) and 80CCD (2).
Section 80E : Interest on Education loan
80D: Health Insurance component

Deduction for the premium paid for Medical Insurance

You (as an individual or HUF) can claim a deduction of Rs.25,000 under section 80D on insurance for self, spouse and dependent children. An additional deduction for insurance of parents is available up to Rs 25,000, if they are less than 60 years of age. If the parents are aged above 60, the deduction amount is Rs 50,000, which has been increased in Budget 2018 from Rs 30,000.

In case, both taxpayer and parent(s) are 60 years or above, the maximum deduction available under this section is up to Rs.1 lakh.

Example: Rohan's age is 65 and his father's age is 90. In this case, the maximum deduction Rohan can claim under section 80D is Rs. 100,000.

From FY 2015-16 a cumulative additional deduction of Rs. 5,000 is allowed for preventive health checks.

Example Calculation of Income tax:

Pranav is working in a bank and is earning 7,00,000 as his salary. He lives in a rented house with Rent of Rs. 75,000 (annual) and also has an EPF of Rs. 1,00,00 and medical insurance for his family of Rs. 10,000. Pranav also has an FD in the bank which yields him an interest of Rs. 25,000 (annual). Calculate his Income tax?

Answer: Let's make a table for his financials to calculate the Net taxable Income

Total salary	Rs. 7,00,000
HRA Exemption (Rent)	(-) Rs. 75,000
Income from bank deposits (Fixed Deposit)	(+) Rs. 25,000
Gross Taxable Income	**Rs. 6,50,000**
EPF (Section 80C)	(-) Rs. 1,00,000
Medical Insurance (Section 80D)	(-) Rs. 10,000
Net taxable Income	**Rs. 5,40,000**

Explanation:

Pranav has an income of Rs. 7,00,000 however he has used various tax saving measures denoted by (-) as they are subtracted by total salary and along with various other sources of income like FD interest denoted by (+). On calculation we get a net taxable income of 5,40,000.

This net taxable income will be divided in three slabs as defined by the government. In the first slab of Rs. 2,50,000 there will be no income tax. The remaining amount (2,50,000) will fall in the next slab of 5% (12500) and at last the remaining amount (Rs. 40,000) will fall in the third slab with 10 % tax (Rs. 4000).

So the total tax will be Rs. Rs. 12500 + Rs. 4000 = 16,500.

Rs. 2,50,00	Rs. 2,50,000	Rs. 40,000
No tax	5% Tax Slab	10% Tax Slab

Division of taxable income in 3 slabs.
Total: 5,40,000

Scan the QR Code to understand the basic usage of the government's ITR website:

Let's Reflect!

1. Are you able to grasp the concept of taxes? What are the two forms of taxes?

_____

_____

2. Why do you think we need to pay taxes to the government? Is it a good thing?

_____

_____

3. Till what salary one is exempt from paying taxes in India?

_____

_____

4. Will you follow the new tax regime or the old tax regime?

_____

_____

5. Is it legal to save taxes? Why does the government want us to save taxes?

_____

_____

6. Till what salary one is exempt from paying taxes?

_____

_____

Quiz:

1) What does CBDT stand for?
a) Common Board of Direct Taxes
b) Central board of Direct Tools
c) Central Board of Direct Taxes
d) Critical Bureau of Direct Taxes

2) Which of the following is a direct Tax?
a) Income Tax
b) Custom Duty
c) Service Tax
d) Sales Tax

3) Which of the following is an Indirect Tax?
a) Income Tax
b) Property tax
c) Sales Tax
d) Wealth Tax

4) CBIC & CBDT work under which department?
a) Department of Tax
b) Department of Revenue
c) Niti Aayog
d) Department of Commerce

5) Which of the following taxes is independent of your salary?
a) Indirect Tax
b) Direct Tax
c) Income Tax
d) None of the above

Ans: 1-c, 2-b, 3-c, 4-b, 5-a

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Sources of Funds

Sources of Funds

Do you also have dreams of starting your own business? You will definitely learn more about it in the upcoming sessions but let's use this lesson to understand the sources of funds to start a new venture.

Personal Source: The most widely followed source for financing your startup or business is personal source. It can be saving, cash insurance, early retirement funds etc.

Friends & Relatives: In this option we look for funds from our friends and relatives. Usually they receive ownership, interest or equity in the startup.

Angel Investors: These are the individuals & businesses that are interested in helping small businesses survive & grow.

Government Grants & Programs: Central & state governments often give financial assistance in the form of grants or tax credits for startups & expanding businesses.

#startupindia

Loan from Banks

You can also avail loan from the bank when you are in need of money. Let's learn more about it.

Key Difference between Public & Private Sector Banks:

- **Processing Fee:** Private Banks in most of the cases channelize their customers via Direct Selling Agents (DSA's). These agents charge fees to source the customers, which the banks ultimately charge from the customers in one form or another. The Public Sector Banks charge comparatively lower interest rates as their sourcing of customers has a direct approach.
- **Processing Time:** If you need the funds urgently, go to a private bank. They disburse loans faster, to meet their targets and deadlines.
- **Efficiency:** Private sector banks score better than that of public sector banks in terms of service and efficiency. In public banks, the effort is much more from a borrower's side.
- **Prepayment:** A public bank gives an applicant the flexibility to pre-pay as per his/her wish. However, in the case of a private bank, an applicant can start pre- payment only after 6 months from the date of disbursement.

Types of Loan For Startup Businesses

Line of Credit: No need to pay the interest on the borrowed amount for the first 9 - 15 months. It gives relaxation to the entrepreneurs who struggle in the initial phases of establishing the business. It is in similar lines with Credit Cards, where the borrower is required to pay the interest for the amount used.

Equipment Financing: This kind of loan demands to put up the collateral as security. This enables a lender to charge at lower interest rates but with a relatively high risk. The advantage of this loan is that the borrower is eligible to claim the tax benefit for the depreciation of the equipment. Both these types of loans need a high credit score.

Installment Loan: This means to borrow a lump sum amount all at once. A startup business must have following things to avail this loan:
- Collateral
- Good Credit Score
- Business Plan
- Additional Guarantees

The loan is paid in both principal and interest amounts. The interest amount is calculated from the day when the contract is signed and it remains until the closure of the loan. Also there are few other loans like Term Loan, Account Receivable Loan, Commercial Loan etc.

Various Government Schemes for Startups
(Note: this information was gathered in May 2021, please check the status to know the current status of these schemes)
Standup India:
An initiative to instill a sense of entrepreneurship among SC, ST & Women Communities. They can avail loans ranging from Rs. 10 Lac to 1 Cr.

Pradhan Mantri Mudra Yojana:
This scheme provides working capital and term loan to all kinds of manufacturing, service and trading sectors including agricultural activities.
This scheme was launched in the year 2015. Loans are offered in three categories:
• Shishu
• Kishore
• Tarun
Amount usually ranges from Rs. 50,000 to Rs. 10,00,000.

Sustainable Finance Scheme:
Under this scheme the funding is available for businesses working in green energy, renewable energy, technology hardware, and non-renewable energy. This is SIDBI (Small Industries Development Bank of India) to enhance sustainable development.

Bank Credit Facilitation Scheme:
National Small Industries Corporation (NSIC) aims to meet the requirements of MSME units in an easy way. Usually, the loan is offered for a tenure ranging from 5-7 years, but in special cases it can also be extended till 11 years. Credit facilitation is offered through many banks, some of which are mentioned below –
• IndusInd Bank
• Vijaya Bank
• Yes Bank
• Federal Bank
• Kotak Mahindra Bank
This is like a loan though the terms are on the easy side and if you go to a Government bank, the charges would be less than a private bank however the processing of loan would be slow.

Credit Guarantee Scheme (CGS):
These are suitable for both kinds of businesses - those who are in the initial phases, and also those who require funds to expand their businesses. It includes service and manufacturing sector industries; however educational, institutional, agriculture, and retail trade are excluded from applying for this scheme. Under this scheme, a business loan of up to Rs. 2 crores can be raised.

Coir Udyami Yojana:
The primary aim of this scheme is to set up coir units across India. This Coir Board heads this scheme, and the fund's project costs up to Rs.10 lakhs. The rate of interest will be at par with the base rate. The total lending fund should not exceed 25% of the total cost of the project.

National Bank for Agriculture and Rural Development (NABARD):
NABARD is focused on providing refinance to lending institutions in rural areas. The bank aims to provide and regulate other facilities that help to promote and develop agriculture, cottage, small industries, handicrafts, and village industries.

Atal Incubation Centre (AIC):
Started by the NITI Aayog in 2016, AIC is an innovative funding scheme to promote entrepreneurs by covering their capital operational costs. The selected startups will be granted funding up to Rs 10 crore over a period of five years. Students, researchers or newly formed organisations from fields including transport, health, energy, education, agriculture, water and sanitation can apply. The AICs can be set up either in Public funded institutions or Private sector funded institutions or in Public-Private Partnership (PPP) mode.
The candidate will have to provide at least 10,000 sq. ft of space for the infrastructure such as laboratory and workshop facilities, utilities, support services, pre-incubation services, networking, mentoring and other facilities within a period of six months from the date of release of funds for capital and operational expenditure.

NewGEN IEDC:
In 2017, the Department of Science & Technology (DST) introduced the New Generation Innovation And Entrepreneurship Development Centre (NewGen IEDC) programme.

The programme is implemented by the Entrepreneurship Development Institute of India (EDII), Ahmedabad. It promotes "knowledge-based and technology-driven start-ups" through mentorship, guidance and support. Key features are:
• The NewGen IEDCs are established in academic institutions where students can work on innovative projects over a period of five years.
• In its first year, the DST was successful in establishing 14 NewGen IEDCs.
• A one time cost of Rs 25 lakh will be granted in phases.
• The institution should be a University/Deemed University or a premier Institute/College offering Engineering, Technology, Science courses at degree level or above for at least 5 years.
• They must provide a space of about 5000 square feet for housing the NewGen IEDC with basic amenities like electricity, water, telephone and internet connectivity

You can read about more government schemes by scanning this QR Code:

Quiz:

1) Pradhan Mantri Mudra Yojna was launched in the year _____?
a) 2014
b) 2015
c) 2016
d) 2017

2) What is the maximum amount a person can receive in Pradhan Mantri Mudra Yojana?
a) Rs. 1,00,000
b) Rs. 5,00,000
c) Rs. 15,00,000
d) Rs. 10,00,000

3) The maximum loan a person can avail through Standup India Scheme?
a) 10 Lac
b) 40 Lac
c) 60 Lac
d) 1 Cr

4) Atal Incubation Center was started by _____?
a) Department of Commerce
b) Niti Aayog
c) Ministry of Finance
d) Home Ministry

5) Under Credit Guarantee Scheme a Business Loan of upto _____ can be availed?
a) 1Cr
b) 2Cr
c) 3Cr
d) 4Cr

Ans 1-b, 2-d, 3-d, 4-b, 5-b

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Session 68

Creative Problem Solving- Entrepreneureship

Entrepreneurial Mindset

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Entrepreneurial Mindset

Who is an Entrepreneur?

There are various definitions of an entrepreneur. In simple words, an entrepreneur is a person who develops and owns his business. Let us look at some of the definitions-

• An entrepreneur is someone who perceives an opportunity and creates an organization to pursue it. (Bygrave & Zacharakis, 2013)
• Entrepreneurs are individuals who exploit market opportunity through technical
and/or organizational innovation. (Schumpeter, 1965)
• An entrepreneur is a person who habitually creates and innovates to build something of recognized value around perceived opportunities. (Bolton & Thompson, 2000)
• An entrepreneur is someone who demonstrates initiative and creative thinking, is able to organize social and economic mechanisms to turn resources and situations to practical account, and accepts risk and failure. (Hisrich, 1990)

Mark Zuckerberg, the CEO and founder of Facebook is an entrepreneur. However, a local restaurant owner in your city is also an entrepreneur. A vegetable vendor in your locality is also an entrepreneur. The first step towards being an entrepreneur is to take that leap from an idea to the goal of creating an enterprise.

• Entrepreneurs are self-motivated and start with initiating a venture, a project or anactivity.

• Entrepreneurs usually start small, but continuously keep doing things to grow.

• Entrepreneurs focus on executing an idea and on creating or adding value.

• Entrepreneurs see and create value in situations that other people view as worthless, impossible or stupid. (Isenberg, 2013)

• Entrepreneurs develop a certain way of thinking with experience, by actively acting and applying what they know and learning what they do not know

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What may stop you from being an entrepreneur/ Myths about Entrepreneur

Risk-taking: Entrepreneurs do not necessarily have a very high appetite for risk. Entrepreneurs might take a risk initially when they start, but this risk is evaluated depending on how high the reward is. In the process, entrepreneurs learn to work under risk and uncertainty and develop plans that anticipate obstacles to an extent.

Creative: Entrepreneurs do not suddenly get a creative idea. They create a business by understanding a need or problem in their surroundings and bringing unimaginable and innovative solutions to life. They learn to apply creative thinking when building a business.

Visionary: Entrepreneurs may not start with a sharp vision or goal. They learn to adapt and improve their ideas depending on feedback and analysis. Persistence is a key competency that an entrepreneur requires in this process. They do not predict the future, but instead are cautious about making any future projections or extrapolations.

Dominating: Entrepreneurs are not necessarily dominating. They are people and team focused. They understand the capacity of an individual, motivate them to do better and are concerned about employee welfare.

Money driven and wealthy: Entrepreneurs may be money driven also, but when they start, they are opportunity driven. They see and act on opportunities.

Self-confident: Entrepreneurs may be self-confident and determined but anyone who is working towards being successful can be that.

What is Entrepreneurship?

In simple words, entrepreneurship is defined as the creation of a new business venture. However, it is important to recognize entrepreneurship is much beyond that. Entrepreneurship is everywhere. In our daily lives, we use various products and services which were created because of entrepreneurs. The question is what these entrepreneurs do to create new ventures.

• Entrepreneurship is the process of identifying an opportunity and turning it into a venture.
• Entrepreneurship is the practice of starting new organizations or revitalizing mature organizations, particularly new businesses generally in response to identified opportunities. (Onuoha, 2007)
• Entrepreneurship is a mindset, a way of thinking. A person can be oriented towards this way of thinking.
• Entrepreneurship is a way of living, where a person chooses to have insatiable thirst for learning, evolving and creating.
• Entrepreneurship is the pursuit of opportunity beyond resources controlled (Stevenson, 2013).
• Entrepreneurship is a skill or an ability to act on ideas and build on opportunities.
• Entrepreneurship is a problem-solving technique focused on improving yourself by improving something for the people in the world around you.

Managerial vs. Entrepreneurial Thinking

Managerial Thinking:
• Goal well-defined
• Resources determined
• Plan created and executed
• Progress measured
• Goal achieved

Entrepreneurial Thinking:
• Start with what you have rather than what you need
• Only choice is to act
• No definite plan
• Uncertainty
• Progress might not be measurable

PREDICTION	CREATION
Managerial	Entrepreneurial
Big planning	Small actions
Systematic	Random at times
Use existing data	Collect real data
Linear	Iterative
Optimization	Experimentation
Avoid failure at all costs	Embrace & leverage failure
Competitive	Collaborative
Knowable	Unknowable
Get Data – Plan – Act	*Act – Learn – Build*
Plan to Act	**Act to Learn**

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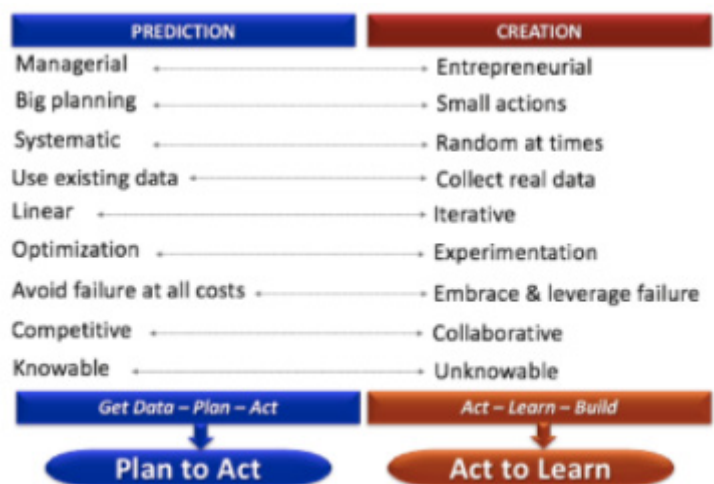
Entrepreneurial Mindset

The entrepreneurial mindset is about a certain way of thinking -- it is about the way you approach challenges and mistakes. It is about an inherent need to improve your skill set and to try and try again. An entrepreneurial mindset is also important as it shows a person's ability to:

• Successfully lead a team (Gauge the strengths and weaknesses of those around them and create a way for diverse groups to work together)
• Be a quick thinker and use the resources at their disposal to the best of theirabilities. Most startups have a limited pool of resources which they have to make the most out of it.
• Risk appetite & being able to identify opportunities.
• Adaptability & learnability: being able to quickly adapt to changing circumstances, learn new skills quickly and be able to learn own experience trying and failing at something
• Communication: Being able to effectively communicate your thoughts and plans are incredible assets to have in any line of work. Entrepreneurial skills also lead you to be more confident.

Entrepreneurial Skills
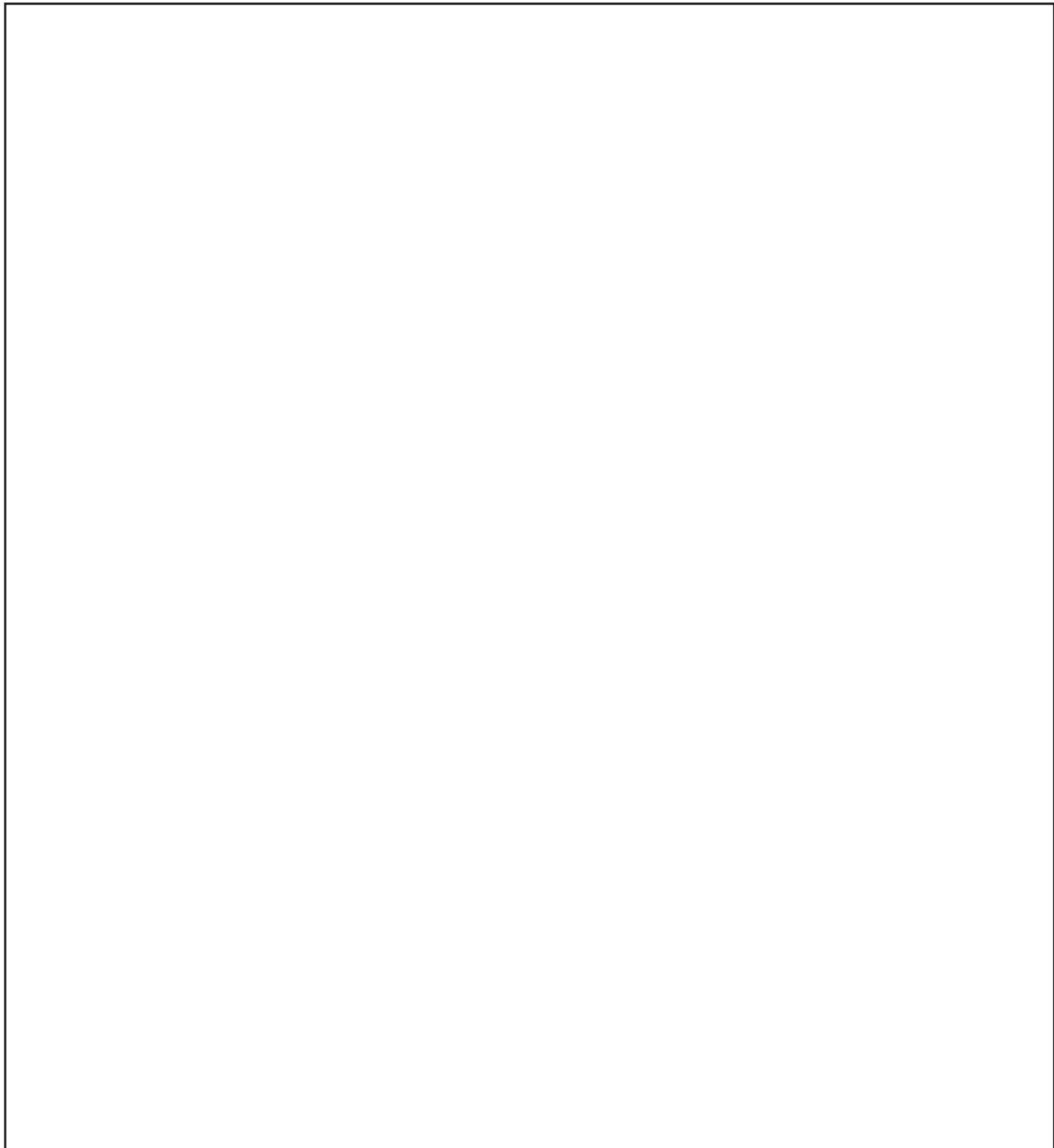
• Innovative
• Resilient
• Goal Oriented
• Achievement motivated
• Self-confident
• Self-starter/initiator
• Committed
• Opportunity seeker
• Creative thinker
• Moderate risk taker
• Effective networker
• Tolerant of ambiguity
• Has a strong work ethic
• Optimistic disposition
• Persuasive
• Problem solver
• Systematic Planner
• Information seeker
• Leverages and assembles resources
• Tenacious and Persistent
• Can deal with failure

Activity:
Entrepreneur I admire the most

When: during session

How: Think about entrepreneurs you know/ you have read about/ you have met or observed, and write the common characteristics, traits and habits of these entrepreneurs.

Quiz:

1. Rajat has his own venture of Marketing. Rajat is an _____?
a. Entrepreneur
b. Manager
c. Capitalist
d. Teacher

2. Uncertainty is a characteristic of which type of thinking?
a. Managerial Thinking
b. Marketer Thinking
c. Presidential Thinking
d. Entrepreneurial Thinking

3. Which of the following is the quality of an Entrepreneur?
a. Risk Taking
b. Measurable Goal
c. Specific Working Time
d. Stick to a specific roles & responsibilities

4. Which of the following differentiates an Entrepreneur from a Manager?
a. Hardworking
b. Leadership
c. Risk taker
d. Confident

5) Kusum works from 9 to 5 and gets a monthly pay. Is Kusum an Entrepreneur?
a. Yes
b. No

Ans: 1-a, 2-d, 3-a, 4-c (all other qualities can be found even in Managers), 5-b.

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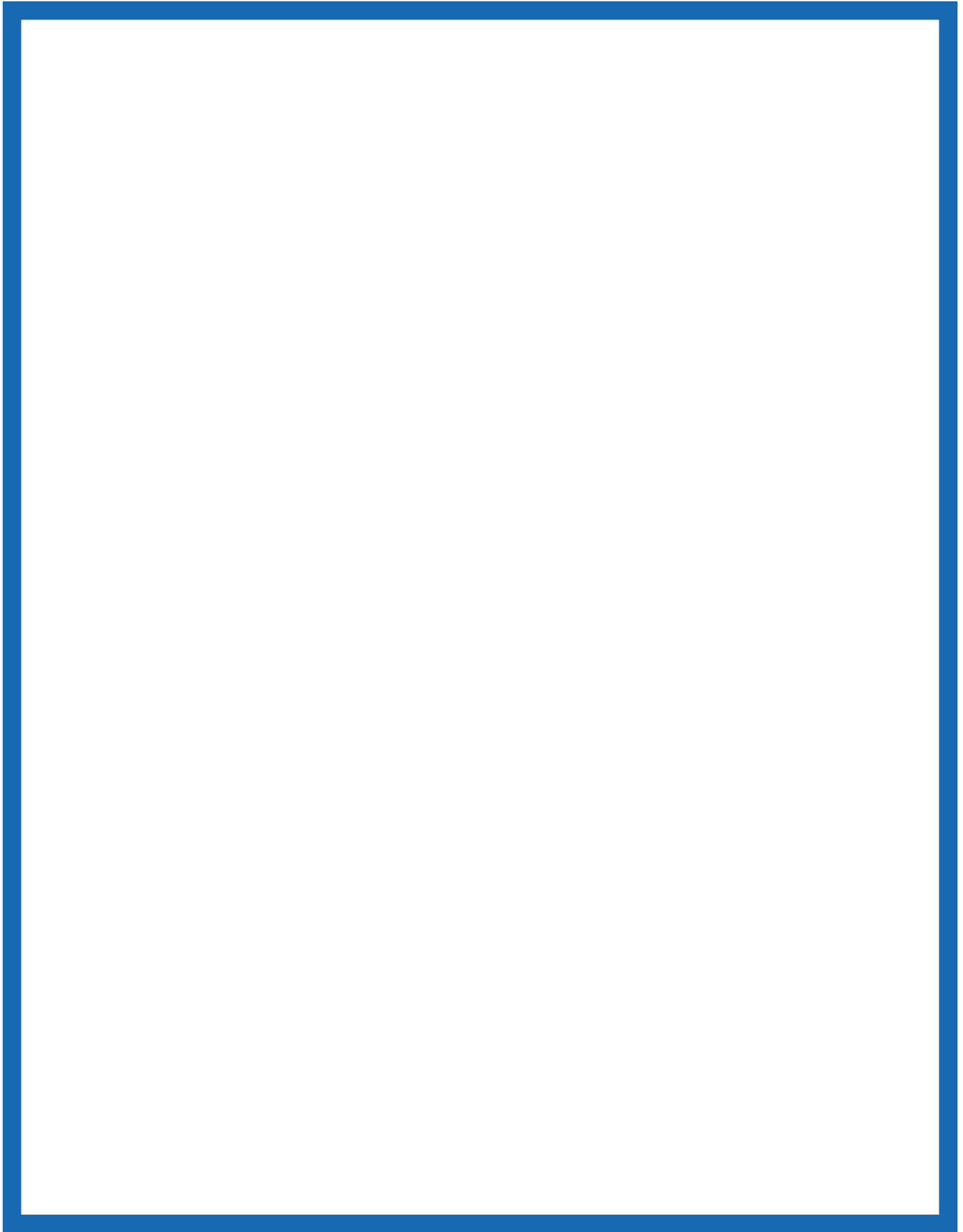
Creative Problem Solving-Entrepreneureship

Creative Ideation

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Creative Ideation

What is Ideation?
Ideation is the creative process of generating, sharing and developing new ideas for a problem or a challenge.

What is a business idea?
• Impression of a concept:
This means it is only an impression. It is not something concrete.
It is a concept – an abstract idea of a commodity that can be publicized.

• Around a product or a service:
Every business offers product/s or service/s or even processes as solutions.

• Assumed to have the potential to make money:
This means that with a business idea, it is an assumption that by selling the product or service, the business will make money. At the idea stage, there is no proof that the business will make money, it is only an assumption.

Three elements of Innovative Ideas

An idea should be viable, desirable and feasible. A blend of these three components is what leads to innovative and sustainable ideas.
• **Desirability** refers to assessing whether the product/service is desired/needed/wanted by a group of humans.
• **Viability** refers to calculating whether the business idea will eventually be profitable/sustainable, i.e. will it actually become a business with regular
transactions and make money.
• **Feasibility** refers to whether the product/service can be practically, realistically and feasibly developed. It is a blend of market, financial, technical and operational feasibility.

However, the first thing to start with, when you think of an idea, is that how desired/needed it is among customers.

Factors to consider before choosing an idea:
• Problem it solves for the customer
• Desirability in the market
• Practical feasibility
• Financial viability
• Scope of growth
• How is it different from competitors in the market?

Sources of Ideas
Solve a Problem:
As we have seen, identifying a problem and framing it helps move towards solving a problem. The first trigger to a business idea is to find something that frustrates you. Next is to find out whether it frustrates other people too. Look around you for problems. Sometimes, start-ups solve problems for customers when they do not even know they have it.

Improve an existing solution:
Some questions you should consider are- "What is the biggest hassle about using or buying a product or service that people unnecessarily tolerate without knowing it? Would customers want it to be cheaper? Would they want it to be more efficient? Customers use various products and services in their daily lives and do not even realize its shortcomings.

Transform an existing idea:

Changing your orientation towards a particular product or exploring options in other countries or cities that can fit into or can be customized for your community are some ways in which entrepreneurs get ideas.For example, Today, Crocs is perceived as a footwear brand that manufactures and distributes funky and comfortable shoes. The design of Crocs shoes was inspired from boating shoes. One of the three founders wore a pair of boating shoes that he had bought from Canada when they went sailing. The thing that was special about his shoes was a special material that did not slip on wet surfaces, was easy to wash, prevented odour and made the shoes feel comfortable. The three of them thought of turning it into a business selling a new design of such Canadian shoes to sailing enthusiasts. They started their first two products, naming them Beach and Cayman. The shoes became so popular that the company turned it into a global brand specializing in funky and comfortable shoes designed especially for kids and then expanding it for men and women as well.

Turn your hobby/passion into a business:

Most of us have hobbies—work that we do in our free time to nourish our spirits and challenge ourselves. You might enjoy your hobby now, but to turn it into a business or profession, you will need concentration, persistence and dedication.

Open Innovation:

Open innovation refers to implementing and developing an idea by involving customers or users. This can be very useful when you are trying to overcome a challenge that your organization is facing and you need more ideas to solve it. Various companies use open innovation to build a better product before getting to the market. Wikipedia is the most well- known example of open innovation. It has 85,000 author volunteers that work simultaneously on the platform.

Franchising:

It is a form of business in which a franchisor(owner) of a product or a service obtains distribution through affiliated dealers (franchisers). It is a continuing relationship in which a franchisor provides a licensed privilege to the franchise to do business and offers assistance in organizing, training, merchandising, marketing and managing in return for profits and brand expansion. In franchising, you implement a ready-to-use concept. Various fashion and food brands work on the franchise model.

Follow policy changes, current events and industry trends:

In India, there are various government policies that were launched such as Start-up India, Make in India, National Policy for Skill Development and Entrepreneurship 2015 etc. which provide a variety of opportunities and benefits to entrepreneurs. Current events such as changes in laws or policies might lead to interesting business ideas. For example, after same gender marriages became legal in Canada, entrepreneurs began selling tourist travel packages that include a marriage ceremony to same gender couples from other countries.

Creativity Techniques

Creativity is a way of thinking, looking for opportunities and alternatives, it's an ability to generate ideas by combining, changing and reapplying existing ideas. Creativity does not just mean being a good artist. Idea generation is about creativity. The good thing is, you can learn to be creative and a problem solver.

Brainstorming:

Brainstorming is another technique to come up with a broad range of ideas. It is aimed at going for quantity and coming up with as many ideas as possible. No idea is considered to be crazy or bizarre. A few things to ensure when brainstorming is:

• Get into a small group setting. The more diverse the group is, the better it is. More ideas can be generated as people from different backgrounds have different exposure and experiences.

• Be passionate about the problem you are solving. Make sure you have understoodthe problem.

• Focus on creation here. This is not the time to be critical. Evaluation of ideas comesmuch later. During brainstorming, it is important to withhold your judgement.

• When brainstorming for a specific issue, think about how it is done today in the current scenario. After that, think of alternatives to do it.

• Build on the ideas of others. After you have written and posted your ideas, look at the ideas of your team members and build on it.

• Have all your ideas in front of you. Eliminate any redundant ideas, put similar ideas next to each other, add ideas where you can find a missing link, list down the themes that emerge after clubbing different ideas together and prioritize these ideas and themes.

Scamper:

Scamper is a set of seven thinking techniques mean to assist those who utilize them in discovering typical solutions to problems.

SCAMPER is an acronym, with each letter representing a different technique that can used to trigger creative ideas:

Substitute: Take one thing or part away and add something else

Combine: Put one or two things together to create something completely new

Adapt: Change something so that it can be used in a specific situation

Modify/Minify/Magnify: Change size, shape or colour or any specific trait and reimagine it

Purpose/Put to Other Use: Use it in a way that it wasn't meant to be used. Change the purpose it is used for.

Eliminate: Remove any unnecessary element that might create an issue or a problem

Reverse/Rearrange: Change the direction or orientation. Look at it differently. May be move it upside down or use it backwards.

Adapt to local country/regional flavours

Substitute Bun with Avocado

Eliminate sauce inside the burger with dip

Put to Another Use by creating "Burger Candies" or "Burger Pizza"

Modify sauce with salad dressing or make "Mini Burgers"

Rearrange by creating "Open Burger" or "Burger flavoured chips"

Combine with ice cream cone to create "Burger Cone" (Savoury) or "Burger Ice cream" (Sweet)

Problem Identification

How to look for problems?

1. Observation (See): It starts with observing one's surroundings, and noticing unusual aspects, unique incidents, repetitive patterns etc.

2. Detailed Observation (Think): Once observations have been made, those observations which make sense or make one feel curious must be revisited. This means questioning why something is happening or exploring whether there is a pattern or repetitive problem identified among multiple observations

3. Seeing a Problem (Analyze): Once a pattern or repetition has been identified,The next step is to analyze and delve into what is the actual problem. It is like peeling the onion and going deep into what is exactly the problem.

4. Problem Size (Mass vs Niche): Once the problem is identified, the next question that needs to be asked is how many people experience the problem. This refers to the problem sizes. Is it a problem experienced by a large number of people? Or is it something few people feel in a specific region.

5. Market (Business Opportunity if a mass or niche problem): After the size of the problem is identified, the final step is to assess if the problem is worth solving. This means identifying the reasons, hurdles, challenges, risks, market potential etc.related to the problem. There is a difference between a business opportunity and a problem/need. A problem or a need becomes a business opportunity only there
are enough number of people in the market willing to pay for the problem to be solved, i.e. if there is a market for it.

From Problem to Market:

If a real market exists for the problem, then some questions to ask are:
• What is the problem? - This means defining the exact problem
• Is it actually a problem? - This means assessing how many people actually say/feel that it is a problem that must be solved.
• Who faces the problem? - This refers to describing which kind/type pf people feel that the problem exists.
• Why is it a problem? - This means understanding why the problem really exists and getting to the core of it.
• Is the problem worth solving? - This refers to how many people are willing to pay for a solution for the problem.

Describe the Problem:

To understand and describe the problem in detail, consider the following questions and try to answer them:
• When did the problem first appear?
• What factors or events led to this problem?
• What factors or events made the problem more evident?
• How and to what extent is this problem affecting the market?

Problem Framing
"How might we (verb) the (process step/outcome) for (target user)?"
Frame a problem in the problem area in this format: "How might we..." statement
For example,
How might we reduce (verb) digital addiction (outcome) of kids aged between 3 to 8 years (target user)?
How might we increase (verb) engagement and interest in online sessions (outcome) for college students (target user)?

Two Sources of Problem Search:
1. Pain Points: Pain Points are those points where customers exhibit frustrations when they interact with a product or a service.
2. Opportunities & Needs: Opportunities & needs refer to solving a latent need or creating a need in the market. A latent need is something which is hidden and it is not obviously stated by customers. It can usually be figured out by observing customer behavior and drawing insights. Some products/services intend to create a need or market, i.e. the customer develops a habit of using it and hence it turns into a need.

Handout
A Handout is written material
given to inform or provide
students with additional
information.

Activity:
SCAMPER

How: Use the SCAMPER technique on Zomato

Quiz:

1) Which of the following is not an element of Innovative Idea?
a) Viability
b) Visibility
c) Feasibility
d) Desirability

2) Which of the following does not fall under product need?
a) Price
b) Design
c) Performance
d) Competitor

3) What is Franchising?
a) Service or product distribution through affiliates
b) Owner expanding a new branch
c) Selling of existing product or business
d) Expanding of business on international level

4) Scamper was created by _____?
a) Ronaldo Lucius
b) Bob Erbele
c) Marie William
d) Bruno Mars

5) Which of the following is not an Ideal way to find/look for a problem?
a) See
b) Think
c) Create
d) Analyse

Ans: 1-b, 2-d, 3-a, 4-b, 5-c

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Creative Problem Solving-Entrepreneureship

Decoding Customers

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Decoding Customers

Understanding Your User

A customer is a person or company who purchases goods and services. A user is
a person or company who uses the goods or services.The objective of interacting
or observing a user is to understand customer perceptions, requirements,
preconceptions, price sensitivity, potential objections and preferences. This helps
validate the assumptions that you made when you came up with the business idea to
an extent.

In this process, empathy is a key skill that must be applied and understood.
However, the success of customer-driven innovation depends on who's invited to
participate. Let us look at the following examples to understand how some form of user
interaction can lead to new ideas and opportunities and which different users can you
interact when you have an idea.

Example: Saami is in his final year in a product designing course. As his final year
project,he designed furnishings such as sets of blanket, curtains, pillow and cushion
covers for kids which had detachable soft toys on them. During the product fair of his
project, some high school girls were amazed by his design. They started to hold the
detachable toys and one of them said "I wish I could take one to stick it on my slippers
and change the look everyday".This got Saami thinking. He knew he wanted to take his
design to the retail shops and make it big. He thought probably he could try to design
soft home slippers with detachable softtoys. He started talking to girls and even young
mothers about it. He actually thought thiscould turn into a huge opportunity for him to
design products such as matching furnishingsor slippers for the mother and the child.

Empathy Mapping

Empathy Mapping comes from the concept of Design Thinking.

Design Thinking

Design Thinking process is a 5-step process, as follows:

Empathize: This involves learning about the target audience by using methods such as observation, interviewing, shadowing etc.

Define: This refers to framing the right problem such that the right solution can be created. In the define mode, one creates a meaningful, clear and actionable problem statement that focuses on needs and insights of the target user.

Ideate: In the ideation step, the focus is on generating a lot of ideas rather than generating one single 'right' idea, through brainstorming, mind mapping, bodystorming, sketching etc.

Prototype: Prototyping refers to building something in a tangible way such that it can used to test and learn. For example, if you want to start a platform that sells baby and kids products, you could use free online tools to create a free website that consists of a few web pages. This would help real customers interact with your prospective solution in real time.

Test: Testing presents a chance to refine your solutions, make them better and eventually innovate. For example, for a physical object, give samples and ask people to take it with them and use it within their normal routines. Similarly, for an experience, try to create a scenario in a location that would capture the real situation.
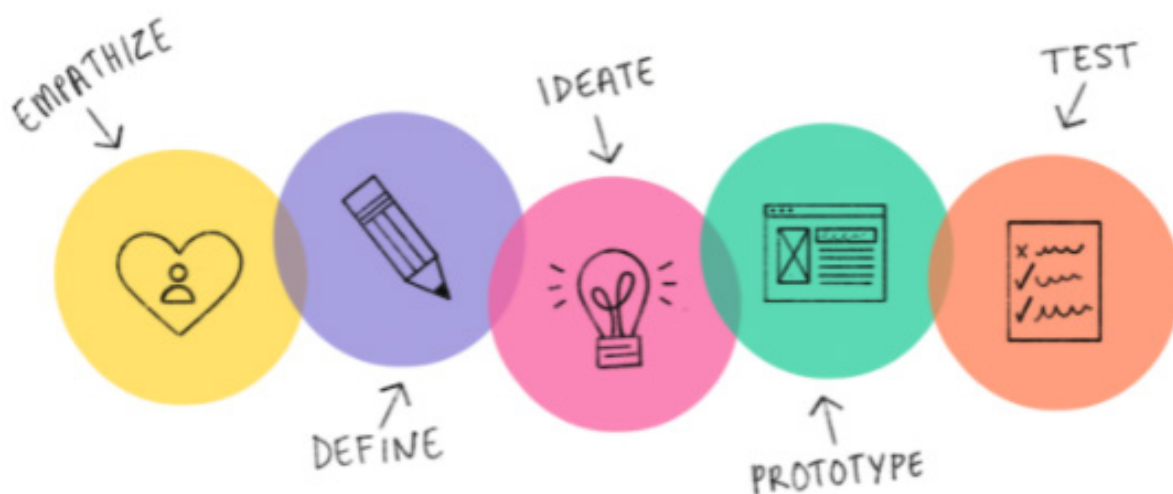
Image source: getcloudapp.com
Medium.com

Empathy Map

An empathy map helps to answer and map what a core/ideal customer for your idea would look like. Some factors to include in an empathy map:

Demographics: Age, Gender, Location, Marital Status, Income, Education, Occupation
Perceptions: What do they think of other similar products/services?
Requirements: What are certain needs they have around the product/service?
Preconceptions: What are certain assumptions/biases they have for certain brands/products?
Price Sensitivity: How much are they willing to pay for a product/service?
Potential Objections: What are their dislikes about existing products/services?
Preferences: What are certain preferences/luxuries/features they enjoy in a product/service?

Image source: getcloudapp.com
Medium.com

What you need to learn about your customers?

Your goal is to at least learn about the following things through customer interview and surveys.

1. Who they are

If you sell directly to individuals, find out your customers' gender, age, marital status and occupation. If you sell to other businesses, find out what size and kind of business they are. For example, are they a small private company or a big multinational?

2. What they do

If you sell directly to individuals, it's worth knowing their occupations and interests. If you sell to other businesses, it helps to understand what their business is trying to achieve.

3. Why they buy
If you know why customers buy a product or service, it's easier to match their needs to the benefits your business can offer.

4. When they buy
If you approach a customer just at the time they want to buy, you will massively increase your chances of success.

5. How they buy
For example, some people prefer to buy from a website, while others prefer a face-to-face meeting.

6. How much money they are willing to spend
You'll be more successful if you can match what you're offering to what you know your customers can afford it.

7. What makes them feel good about buying
If you know what makes them tick, you can serve them in the way they prefer.

8. What they expect of you
For example, if your customers expect reliable delivery and you don't disappoint them, you stand to gain repeat business.

9. What they think about you
If your customers enjoy dealing with you, they're likely to buy more. And you can only tackle problems that customers have if you know what they are.

10. What they think about your competitors
If you know how your customers view your competition, you stand a much better chance of staying ahead of your rivals.

Conducting the Survey/Interview
Tips for conducting survey:

Find the right people: Finding the right people means that you have to think carefully about the profile of the people you need to speak to. As a startup, the first place to begin with is whom you know and who you know who might know others in your area of interest. Your own personal contact file or social networking sites like Facebook, Twitter, and LinkedIn are good places to start.

Give a brief introduction: Frame an introduction in four to five sentences. Include your name, the purpose of your interview and length of time you expect the interview to take.
Ask easy questions and get the participant talking.

Types of Questions: Do not focus a lot on the "what", but more on "why" and "how". Example: 'What do you like about this venture concept?' might give you a list of features, but "Why do you like this venture concept" will provide more information about the respondent's preferences and opinions.

Take Notes: It is a good idea to take detailed notes of the conversation in the interview or survey. However, make sure you keep eye contact with the participant as well. If it is an option, you can also choose to record the interview with participant's permission, so that you can refer to it after.

Peel the Onion: Interviews and surveys are fruitful when you listen and not argue. The strategy of peeling the onion is like the "5 whys".

List of Bad Questions:
• What do you think of my idea?
• Can you tell me about your problems regarding...?
• I am building a solution to solve the problem X. Can you tell me...?
• How do you think of Y as a solution to achieve results?
• Would you do something like... to use the product?
• Would you buy a product which solved this problem?
• How much would you pay for this?

List of Good Questions:
• What do you like/dislike about X?
• Why do you like/dislike something about X?
• How do you currently deal with this problem that you mentioned?
• Talk me through the last time you experienced such a problem
• How do you feel about (the current solutions available)?
• What is the most frustrating thing about (the current solution, a feature, your day etc.)
• Can you give me an example?

Sample Questions
• What do you enjoy doing most? (Likes and why)
• What do you not enjoy doing? (Dislikes and why)
• How has your experience been using X?
• What do you spend your money on?
• What are some challenges you face in your day-to-day life that you would want someone to solve?
• What would an ideal product look/ feel like for you?

Trigger Questions
• How do your customers define too costly? Takes a lot of time, costs too much money, or requires substantial efforts?
• What makes your customers feel bad? What are their frustrations, annoyances, or things that give them a headache?
• How are current value propositions under-performing for your customers? Which features are they missing? Are there performance issues that annoy them or malfunctions they cite?
• What are the main difficulties and challenges your customers encounter? Do they understand how things work, have difficulties getting certain things done, or resist particular jobs for specific reasons?
• What negative social consequences do your customers encounter or fear? Are they afraid of a loss of face, power, trust, or status?
• What risks do your customers fear? Are they afraid of financial, social, or technical risks, or are they asking themselves what could go wrong?
• What's keeping your customers awake at night? What are their big issues, concerns, and worries?
• What common mistakes do your customers make? Are they using a solution the wrong way?
• What barriers are keeping your customers from adopting a value proposition? Are their upfront investment costs, a steep learning curve, or other obstacles preventing adoption?

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Activity:
Empathy Map

When: during the session
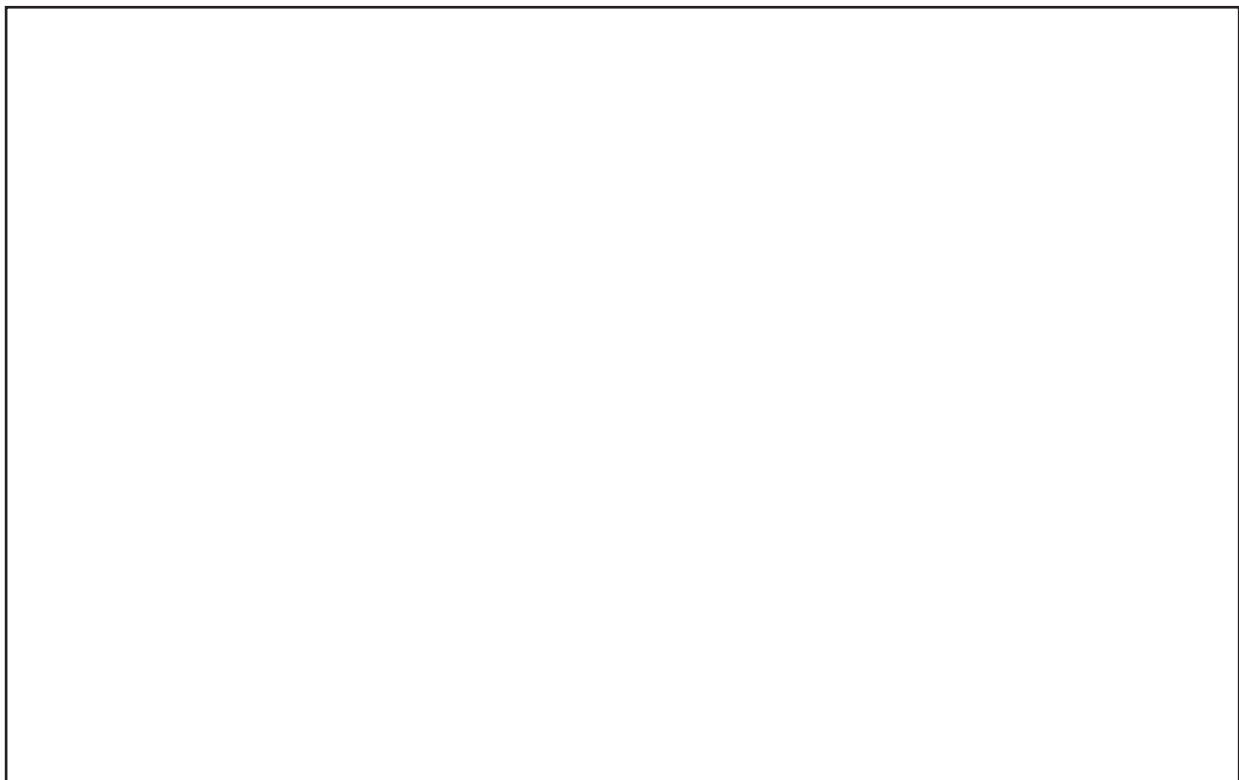
How: Step 1: Put Down Customer Quotes and Demographics. Who is the person for the map? Mention location, age, gender, education level, occupation, marital status, average income etc.

Step 2: Establish Challenges, Needs, Preferences and Goals What are customers trying to achieve? What is the desired outcome?

Step 3: Capture your customer's Outside World Capture what they see, say, do, and hear.
• What do they SEE?
• What do they DO and SAY?
• What do they HEAR?

Step 4: Explore Inside the Mind What do they THINK and FEEL? positive and negative thoughts. What makes them feel good or bad? How do they feel? Frightened? Excited? Anxious?

Quiz:

1) Which session of 21st Century Skills was helpful to know the customer's perception?
a) Empathy
b) Entrepreneurship
c) Body Language
d) Grooming

2) Empathy mapping comes from the concept of?
a) Constructive Thinking
b) Collaborative Thinking
c) Dedicated Thinking
d) Design Thinking

3) Which of the following is not a part of the 5 step process of Design Thinking?
a) Empathize
b) Define
c) Test
d) Manage

4) User Research will help you to get answers for _____?
a) Tasks
b) Assumptions
c) Results
d) Options

5) What is Ideation?
a) Generating an Idea
b) Generating lot of Ideas
c) Generating no Idea
d) Generating a concept

Answer: 1-a, 2-d, 3-d, 4-b, 5-b

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Creative Problem Solving- Entrepreneureship

Business Model

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Business Model

Business Model

A business model is an abstract representation of an organization. It gives an understanding of the problem you are solving, who are your customers, who will you work with, how will your business operate and how will you make money and what will it cost to make money. More than anything else, it reflects on the viability of your business.

Every company's business model consists of two components.

Revenue Model: Your revenue model will show how you will earn or generate income from your business. Suppose you own a bakery. Your basic revenue model will separate breads and cakes into two sources of revenue. However, you can take it further and break the revenue model into in-shop sales and party orders or according to type of dessert and breads (e.g. French, Italian etc.). Breaking down the model can help identify which category is generating more revenue and how revenue can be increased in each.

Cost structure: Costs are basically the money you would need for your business. These would include costs of producing your product or providing your service and operating costs. As with revenue, you can also categorize your costs and try to understand how you can reduce it. Now, let us look at a structured way to understand the business model.

Introduction - Business Model Canvas

According to Business Model Generation by Osterwalder & Pigneur , the business model consists of nine building blocks. These blocks are Customer Segments, Value Propositions, Customer Relationships, Key Activities, Key Partners, Cost Structure, Revenue Streams, Distribution Channels, and Key Resources.

Revenue Streams

Revenue Streams represent the money a company generates from each customer segment. In a simple formula, it is represented as:

Earnings = Revenue-Cost

Revenue Streams answer what and how the customers would pay for your product or service. Some companies have a set list price such as a restaurant in your city. Some might have volume dependent pricing such as wholesalers, who sell products only in bulk, thus depending on the quantity, they set the price. Some might have prices varying depending on the market such as jewellery businesses. Some might have feature dependent pricing, such as similar models of phones and laptops have different prices depending on features such as storage capacity. Some companies might have auction-based pricing.

An extremely interesting example of this was when brands had to bid to put advertisements on Pinterest, which challenged Google Ads in a way. Revenue may be earned rather by a one-time payment made by the customer or by recurring payments made by them. A few examples of common revenue streams are:

- **Unit or Asset Sale:** This basically refers to deriving revenue by giving ownership rights to someone else for a product. Tata sells cars and it is up to the buyer to drive, resell or scrap it.
- **Usage Fee:** This revenue stream is generated by the use of a particular service. A hotel gets its revenue depending on the number of the nights a guest says.
- **Subscription Fee:** In this, revenue is generated by giving continuous access to a service or a product. Gym membership and everyday newspapers are a few simple examples of this revenue model.
- **Franchising:** Franchising is a practice where a company gives the right to use its business model and brand for a prescribed period of time. The company can earn in different forms of payments such as royalty for the trademark, fee for training and advisory services, percentage of individual business unit's sales etc. Mc Donald's is one the largest franchised chains in the world that makes all its revenue through this revenue stream.
- **Lending/Leasing/Renting:** This revenue stream is created by temporarily granting someone the exclusive right to use a particular asset for a fixed period in return for a fee. Boeing started a subsidiary company that offers aircraft leasing to various airline companies. Zoomcar is a company that helps people rent cars for self-driving.
- **Advertising:** This revenue stream results from fees for advertising a particular product, service, or brand. Traditionally, the media industry and event organizers relied heavily on revenues from advertising. In recent years, companies such as Spotify (Audio Ads), Google (Search Ads), Snapchat (Content Ads), Commonfloor (Property Ads), YouTube (Video Ads) have used this revenue stream.
- **Licensing:** Licensing refers to granting permission to use protected intellectual property in exchange for licensing fees. Licensing allows rights-holders to generate revenues from their property without having to manufacture a product or commercialize a service. Microsoft and Adobe charge a licensing fee for their products.

- **Commission/Brokerage Fee:** This revenue stream derives from intermediation services performed on behalf of two or more parties. Businesses that match the supply and demand side of anything. For example, Ola earns its revenue by charging a commission from the car owners who choose to drive on the platform and give a ride to people who request a ride using the ap

Customer Segments

Customer Segments refer to the different groups of people or organizations an enterprise aims to reach and serve. When building a business, the first thing to understand is who your customer is. A business can only be profitable if there are people out there willing to buy what you are planning to create. Businesses cluster customers based on demographics, psychographics and common needs, behaviours, expectations and desires. Once it is clear which of the different segments exist in the target market of your business, you can design and prioritize your business activities according to specific customer needs.

Example: Aman has an e-commerce website that sells men's and women's formals. The core target market is working professionals between the ages of 22-50. The website also has an option of customization for formal shirts where customers can choose the colour of the collar, pocket, buttons and other designs. Aman has built a tracking system that compiles the data based on who opened and used his website. Thus, he segments his customers based on first-time visitors vs. repeat shoppers, registered users vs. guest users, last buy within one month vs. six months vs. one year, top purchasers, location, device type (mobile, tablet, laptop)and personal data (gender, income, style preferences etc.). This helps Aman cluster similar customers together and send them emails about new products and offers according to what they bought in the past

Value Propositions

Value propositions refer to how you describe your product or service to the customer. It gives a compelling reason for the customer to purchase it. Value proposition is the reason why customers would choose one company or brand over another. It is an aggregation, or bundle, of benefits that a company offers customers.

Channels

Channels refer to the mediums or means used to communicate with and reach the customers. These include communication, distribution, and sales channels through which customers get the information and delivery. An organization may choose to reach the customer through various channels such as:
- Owned channels such as salespeople employed by the organization
- Retail stores owned and operated by the company
- Own website and in-house customer support centre
- Partner channels such as wholesalers, retailers, e-commerce websites, app stores, dealers, agents, franchisers, brokers, outsourced call centres etc.

Partner Channels lead to lower margins, but they allow an organization to expand its reach and benefit from partner strengths. Owned Channels and particularly direct ones have higher margins, but can be costly to put in place and to operate. The trick is to find the right balance between the different types of Channels, to integrate them in a way to create better customer experience, and to maximize revenues.

Customer Relationships

Customer relationships describe the types of relationships a company establishes with specific customer segments. Companies maintain relationships with customers with the objective of acquiring new customers, retaining existing customers and in turn boosting sales. Companies might do this in various ways.

· Give personalized assistance through call centres and emails or might even dedicate an employee of the company to handle a client or customer account personally. · Automate the customer support service or make it a hybrid of automated and personalized assistance.

· Choose self-service where the company does not maintain any direct relationship with the customer.

· Create communities where users can discuss a product or post their demands, solve each other's problems and share their opinion about a particular topic. This helps companies analyse what the users want and create products accordingly.

· Engage the customers by making them create something for other customers. For example, online platforms such as Youtube.com, Wikipedia, and Medium solicit customers to create content for public consumption. Various e-commerce websites encourage customers to write reviews. This helps other customers understand the pros and cons of a particular product or service.

Key Resources

Key Resources refer to the most important assets required to make a business model work. These are usually divided into physical such as land, building, transportation, warehouses etc., human such as labour, workforce, salespeople etc., financial such as cash, working capital, stock, equity or debt financing etc. and intellectuals such as brands, proprietary knowledge, patents, copyright etc. Every business requires key resources. These resources allow an enterprise to create and offer their product or service, reach markets, maintain relationships with customer segments, and earn revenues. Different resources are needed depending on the type of business model. Key resources can be owned or leased by the company or acquired from key partners.

Key Activities

Key Activities describe the most important things a company must do to make its business model work. Every business model calls for a number of key activities. These are the most important actions a company must take to operate successfully. Some common activities include production or manufacturing of a product based company, software and problem solving for service based businesses and online website or app or online portal for most businesses. Like key resources, key activities differ depending on business model type. For software maker Microsoft, key activities include software development. For car manufacturer Toyota, key activities include production management. For consultancy McKinsey, key activities include problem solving.

Key Partnerships

Key Partnerships describe the network of suppliers and partners that make the business work. Companies forge partnerships for many reasons, and partnerships are becoming a cornerstone of many business models. Companies create alliances to optimize their business models, reduce risk, or acquire resources in an optimal way.

If you want to start a company that makes backpacks, you will have to find suppliers who sell fabric that you choose such as nylon, cloth etc. and zippers and Velcro etc. Sometimes companies form strategic partnerships with non-competitors through which two brands can be mutually beneficial. This helps them leverage the power of brands. For example, Uber partnered with Zomato such that a customer could think about booking an Uber while using the Zomato app. Thus, if you are looking at going to a restaurant on Zomato, you can see how far an Uber car is and this in turn would remind you to just book it instantly rather than think about taking your car or going to the Uber app and booking. Some companies also form strategic alliances with competitors. Qatar Airways and British Airways got into a joint business agreement to offer both their customers a more seamless travel experience. Sometimes entrepreneurs choose to start a joint venture to develop a new business. For example, Starbucks entered into a joint venture with Tata Group to expand its market to India.

Cost Structure

An organization's cost structure includes all costs incurred to start the business and operate a business model. Business Models can be divided in various ways based on the cost they incur. Let us first understand the difference between fixed cost and variable cost. Fixed costs remain with the business despite the number of goods or services produced. On the other hand, variable costs change proportionally depending on the number of goods or services produced. Manufacturing companies such as automobile companies, metallurgical product companies have higher fixed costs rather than service businesses. Some businesses are cost driven while others are value-driven. This means some focus on minimizing their costs and offer low price value propositions. For example, Dell computers focus on being low cost and thus do better for corporate customers than Apple macs. On the other hand, some businesses are less concerned with the cost implication and focus on creating value. For example, luxury hotels are more value driven

Session 71

Handout
A Handout is written material given to inform or provide students with additional information.

Activity: Business Model

When: during the session
How: Fill the business model canvas for your business idea

The Business Model Canvas

| Designed for: | Designed by: | Date: | Version: |

| Key Partners 🔗 | Key Activities ✓ | Value Propositions 🎁 | Customer Relationships ♥ | Customer Segments 👥 |
| | Key Resources 🏭 | | Channels 🚚 | |

| Cost Structure 🏷 | Revenue Streams 💰 |

⊗Strategyzer
strategyzer.com

Video: https://www.youtube.com/watch?v=QoAOzMTLP5s

Session 71

Worksheet
A worksheet is a sheet of paper given by a teacher to students that lists tasks for the student to accomplish

Quiz:

1) Which of the following is the correct formula for calculating "Earning"?
a. Revenue - Cost
b. Cost - Revenue
c. Revenue - Loss
d. Loss- Cost

2) Which of the following is not a part of the Revenue Stream?
a. Selling
b. Subscription
c. Lending
d. Donating

3) What is the role of Revenue Structure in Business Planning?
a. Various ways to generate revenue
b. Sources of revenue generation
c. Willingness for customers to pay
d. All of the above

4) Which of the following is not a part of Business Model Canvas?
a. Channels
b. Cost Structure
c. Business Expansion
d. Revenue Streams

5) What is variable cost?
a. A fixed cost
b. A cost that changes proportionally
c. A minimized cost
d. An occasional cost

Ans: 1-a, 2-d, 3-d 4-c,5-b

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Creative Problem Solving-Entrepreneureship

Tools for Prototyping

Tools for Prototyping

Prototyping

Imagine you have built your final product or service and you are ready with your business plan. Now, you are thinking of pitching your idea, showing your product and discussing your plan with investors to get funding. The investor asks you a question. "How can you say your product or service will succeed?" Here is where the concept of rapid prototyping comes in.

A prototype is an early sample, model, or release of a product or a service built to test a concept or process. Prototyping gives a realistic form to your idea or solution. The process is like a cycle. You start by creating your first prototype and then go out to understand what your potential customers and users think about it and get feedback. You come back and then analyse the feedback given by them on your prototype. Considering the analysis, you improve your prototype, such as making its features, aesthetics, functionality etc. better. After improving it, you again go out and get feedback.
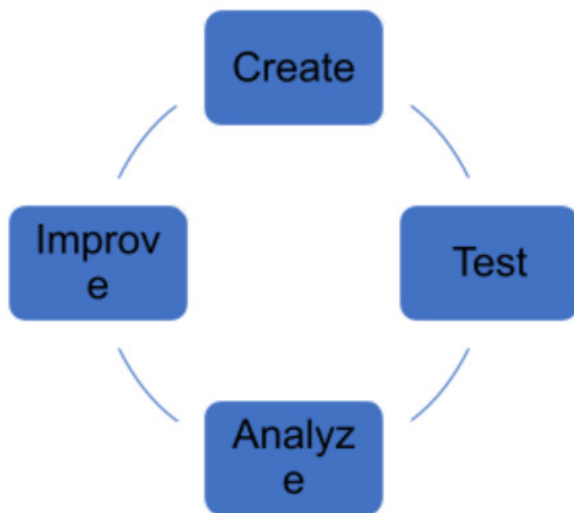
This process provides you with guidance and investors with proof of concept. Prototyping helps get insights that would not be possible otherwise. This is because you are finally showing something to end-users and not just sharing an idea or interviewing them. You start getting a clearer picture about what should work and what people like and this in turn helps you focus on specific needs of the users. Early prototyping starts with really simple materials such as 2D sketches, storyboards, cardboard, paper, tape, thread etc. Even creating a video explaining the concept could serve as a prototype. The idea here is to make simple representations and learn from them. It is not to select the best prototype but to develop one. When you create a prototype, learn from the unexpected responses that users give, document the observations and insights you gain from them and think about other ways to gain some clarity on building on your prototype.

Prototypes help to:
- Test the concept quickly and cheaply
- Check basic functionality
- Collect positive and negative user feedback
- Make adjustments in the product/service

Types of Prototypes
- Models
- Wireframes
- Fake Ads
- Storyboards
- Role plays
- Mock Ups

Tools for Physical Prototypes

- Paper – 2D: Hand drawings of different screens are drawn on paper, that represent user interfaces of a product. A common practice for testing these prototypes is to have one person play 'computer,' switching the sketches around according to user choices.
- Paper – 3D: A 3D prototype encourages manipulation and could draw a higher level of engagement in the concept-testing phase. Using cardboard, foam, wood, plastic, clay and building blocks has become increasingly popular, especially with the spread of design thinking's hands-on approach.
- Wireframes: A wireframe is a visual representation of a product page that the designer can use to arrange page elements. By linking together different pages, you can create a very basic prototype in software like PowerPoint and Keynote.
- Business Origami: The paper cut-outs of various objects improve prototyping systems and interactions with them. This is especially effective for creating models of facilities, spaces and furniture etc.
- LEGOs: LEGOs facilitate innovation and business performance. The sets can be used to build low-fidelity prototypes of business and service experiences.

Tools for Digital Prototypes

- **Balsamiq Mockups:** Provides basic wireframing for apps/websites with the option of choosing the device. Extremely simple and fun to use.
- **Proto.io:** Good to create holistic click-throughs with multiple screens & customized animations.
- **Framer JS:** Full customizability in terms of transitions & micro-interactions. Best for a few screens!
- **Flinto:** Great tool for advanced digital prototyping.
- **Wix.com:** Great tool to pick free website templates and edit them to make your own!
- **Canva:** Great tool for creating basic graphics and marketing material

Prototype Testing

Prototype testing refers to conducting small experiments or tests to get customer feedback by explaining and showing your prototype to potential customers. We know that the entrepreneurial process is full of uncertainty.

Conducting small experiments to get customer feedback by explaining and showing your prototype to potential users

- Assess the success of a product or a service without spending the full amount
- Get access to customer feedback before launching
- Learn from findings and improve

You are unsure of what will work and you do not know what problems might come with running the business. In this environment of uncertainty, prototype testing helps assess the success of a product or service without spending the full amount into it. The thing with prototype testing is that you get access to customer feedback and reaction before you have even launched your product or service. Rather, you build your product depending on the reaction and feedback that you get and increase your competency as an entrepreneur. In this process, entrepreneurs answer three questions before conducting the test:

- What is the assumption? While prototyping, you might have made some assumptions, which have to be tested. Though you conduct early stage experiments and tests to get customer feedback, being clear about exactly what assumption you are testing can define the objective and measure the results of it to an extent.
- How different experiments or tests can be conducted in a cost-effective way? When working towards launching your start-up, entrepreneurs are usually working with resources in hand. They do not get funding without proving their business opportunity. Thus, these small experiments and tests must be conducted in a low- cost manner.
- Who can serve as the right subjects for your experiment and how would you reach out to them?

Session 72

Handout
A Handout is written material
given to inform or provide
students with additional
information.

Activity:
Plan for Prototyping

When: during the session
How: following trainer's instructions, use this table to plan the
prototyping of your business idea

	• What do we need to learn in developing our business concept? • What is our assumption that we need to test?	• What prototyping will help us learn if our assumption is correct?	• Whom should we interview and observe interacting with the prototype?

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

Quiz:

1) What is a Prototype?

a.   An early sample of product

b.   A product in market

c.   A product which is in market for years

d.   A hypothetical product

2) Which of the following is not a part of the Prototyping cycle?

a.   Create

b.   Improve

c.   Test

d.   Advertise

3) Which of the following is a Type of Prototype?

a.   Model

b.   Fake Ads

c.   Role Play

d.   All of the above

4) Flinto is a great tool for ?

a.   Physical Prototyping

b.   Advanced digital prototyping

c.   Manual Prototyping

d.   Paper Prototyping

5) The ultimate aim of Prototype Testing is to get ?

a.   Investor's Feedback

b.   Entrepreneur's Feedback

c.   Customer's Feedback

d.   Owner's Feedback

Ans: 1-a, 2-d, 3-a, 4-b, 5-c

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Creative Problem Solving-Entrepreneureship

Cost Structure

Cost Structure

What are startup costs?
Start up costs are all the non-recurring costs and expenses incurred during the process of setting up a new business.

It consists of expenses for (a) acquiring assets as well as (b) for acquiring initial raw material and other related items of initial expenses, till such time the cash flow (i.e. money coming in and money going out) from the business can provide for these. This part of the start-up expenses is known as working capital. All these expenses occur from the time you start the planning and preparation (i.e. many months before the actual operation beginning). Some of the items that might have to be bought to start your business include land, building, computers, equipment, machinery, vehicles, legal registration etc.Though different businesses have different start-up costs, they can usually be categorized into:

Long-term assets: If you are manufacturing a product or providing a service, then apart from inventory, long term assets might include land, equipment, machinery and structure to stock raw materials. If you are starting a brick and mortar store, then site improvements, furniture, utilities and initial supplies could be some assets you would spend on.

Pre-startup expenses: These are expenses that happen before the first month. Some common expenses new businesses incur are expenses for legal work such as license or permit fees, insurance and logo design. Other expenses could be money spent to build a website, design brochures, pay initial rent deposit and do market research. Employee wages, salaries and benefits required to be paid to set up must also account for expenses.

Working Capital and Buffer: Working capital is the cash needed to run the day to day operations of a business in the initial stage, probably the first few months.

Why Calculate Costs?
• Estimate profits
• Do a breakeven analysis
• Secure loans
• Attract investors
• Save money with tax deductions

Cost vs. Expense
"Cost" and "Expense". What is the difference?

These terms are not clearly defined by the Financial Accounting Standards Board. So, the explanations given here are derived from common usage. We should keep in mind that many people use these terms interchangeably and will not make the distinction.

Expenses are incurred. Technically, an expense is a specific accounting event related to the outflow of cash. Expense simply records the event and is used to understand what happened, from an accounting perspective.

Costs are derived. A cost is a derived value of money consumed to produce a current or future outcome; hence, costs provide management a decision supporting view to improve business economics.

Operational Costs
As the name suggests, operational costs are for carrying out the day-to-day operations of the business or enterprise. These can be broadly categorized in to Fixed and Variable Costs.

Fixed Cost
For example, if you make a t-shirt, then the cost of printing machine, factory rent, utility bill, business insurance would be some fixed costs. It is important to remember that these costs are fixed in nature and not necessarily fixed in amount. For example, telephone bills may vary slightly month to month, de- pending on the usage. However, this variation is not linked to the sales volume directly. Rent is fixed per month, till it is revised by negotiation. Thus, it may be different in different years, but not because of sales increase or decrease.

Following is a list of some of the items on which expenses will remain fixed in nature:
• Consultancy Charges
• Travel
• Salary
• Wages
• Rent
• Telephone
• Water
• Office lighting
• Office stationery
• Employee welfare
• Advertising
• Insurance premium

Variable Cost

An example of a variable cost for a bakery would be the cost of flour, sugar, baking powder etc. If you make a t-shirt, then money spent on cloth, buttons, printing, tailoring will be variable costs. They will only be incurred when you make the shirt, otherwise they would not be. Similarly, the cost of making one shirt will be less than that of two.

In a service business, there are often fewer variable costs. Often the main variable cost in providing a service is the cost of wages for an employee working directly in providing the service. Other variable costs in a service business would be anything directly used up during the provision of the service. For example: Washing detergent in a laundry or a car wash unit, polishing material in a polishing unit, hair shampoo in a saloon.

Following is a list of some of the items for which the costs incurred are variable:

*   Raw Materials
*   Packing Material
*   Freight inward and outbound
*   Sales Commission
*   Royalty
*   Factory Power
*   Piece rate: Wages paid based on production

To classify a particular expense/cost as either fixed or variable, it is important to know for which industry or type of business it is related to. For example,

*   Telephone bill is generally a fixed expense, except when it relates to a Call Center
*   Paper bill in an office or shop would be fixed but in a printing business it would be variable cost (like raw material).
*   Fodder to the cows is variable, because more cows means more milk
*   Water in the office is fixed; water in a soft drink factory is variable.
*   Stationary in a coaching class is variable because more students mean more but stationary in an office is fixed.

The most important point to remember is, not to get trapped in classifying an expense in one or the other category, without knowing which business it refers to.

How to Calculate Costs?

Step 1: Identify Your Startup Expenses

• Office space
• Equipment and supplies
• Communications
• Utilities
• Licenses and permits
• Insurance
• Lawyer and accountant
• Inventory
• Employee salaries
• Advertising and marketing
• Market research
• Printed marketing materials
• Making a website

Step 2: Estimate how much your expenses will cost

• Well-defined costs
E.g.: permits and licenses, office furniture, rent etc.
• Estimated costs
E.g.: employee salaries, advertising, transport etc.

Step 3: Add up your expenses for a full financial picture

• One-time expenses
E.g.: buying equipment, designing a logo, paying for permits, licenses and fees, legal work, brochures, site selection etc.
• Monthly expenses
E.g.: salaries, rent, utility bills etc.

Step 4: Fill the Costing Sheet

Start-up Costing for [Business name] - [Year]

START-UP COSTS	Cost	EQUIPMENT/CAPITAL COSTS	Cost
Registrations		Business purchase price	
Business name		Franchise fees	
Licences		Start-up capital	
Permits		Plant & equipment	
Domain names		Vehicles	
Trademarks/designs/patents		Computer equipment	
Vehicle registration		Computer software	
Membership fees		Phones	
Accountant fees		Fax machine	
Solicitor fees		Security system	
Rental lease cost (Rent advance/deposit)		Office equipment	
Utility connections & bonds (Electricity, gas, water)		Furniture	
Phone connection		Shop fitout	

Internet connection			
Computer software			
Training			
Wages			
Stock/raw materials			
Insurance			
Building & contents			
Vehicle			
Public liability			
Professional indemnity			
Product liability			
Workers compensation			
Business assets			
Business revenue			
Printing			
Stationery & office supplies			
Marketing & advertising			
Total start-up costs	0	Total equipment/capital costs	0

Using this Start-up Costing Sheet
This start-up costing sheet contains a list of suggested costs a typical business may incur when starting up. You can edit these items by removing or adding rows and typing in your own items. Don't forget to enter the financial year at the top of the sheet.

Please note: This sheet assumes all figures are GST inclusive.
This start-up costing sheet is intended as a GUIDE ONLY and DOES NOT constitute financial advice, please always verify and discuss your financial statements with a qualified accountant, solicitor or financial advisor

Income Statement

The reason one is in a commercial business is to earn profit. So, what is profit and how is it determined? Profit is a financial benefit that is realized when the amount of revenue gained from a business activity exceeds the expenses, costs and taxes needed to sustain the activity.

Statement that enables us to determine the profit over a period of time is known as a Profit and Loss Statement or Income Statement. It is also very often known as the Statement of Operations.

This is a statement which shows revenues, expenses, gains, and losses; it does not show cash receipts (money you receive) nor cash disbursements (money you pay out).

The income statement is important because it shows the profitability of a company during the time interval specified in its heading. The period of time that the statement covers is chosen by the business and will vary. For example, the heading may state: **"For the Three Months Ended December 31, 2011"** (The period of October 1 through December 31, 2011) or **"The Four Weeks Ended December 27, 2011"** (The period of November 29 through December 27, 2011.)**"The Fiscal Year Ended June 30, 2012"** (The period of July 1, 2011 through June 30, 2012). From this it is clear that Income Statement can be prepared for a day, week, month etc. based on the needs of the business owner.

At a certain stage, start-ups do not have existing assets or sales to make financial statements. Thus, certain assumptions have to be made to project what the financials of your start-up are going to look like:
• What are number of units you plan to sell
• What is the price
• How much revenue do you plan to make
• How much profit will you make after deducting all the costs
• How much cash would you project to have by the end of each year etc.

A Pro-forma Income statement is a financial statement that can be used to understand what the business is going to look like in the future.
Let us try to build an income statement for Amy's food truck.

Example: Amy wants to start a food truck that would sell fresh wood oven pizzas. She has come up with 10 varieties of pizzas with five vegetarian and five non-vegetarian options. She has priced all the vegetarian pizzas at Rs. 150 and all the non-vegetarian pizzas at Rs. 200. She is wondering how much money she will be able to make once she starts her business. Let us help Amy get the answer by building her pro-forma statement.

Look at the following examples:
To create this statement, first document all your day-to-day expenses. What will be your specific expenses depending on the activities? Some operating expenses include rent, payroll, supplies, utilities, marketing and advertising, insurance, taxes etc. These are some expenses which would be incurred in running your business and might be expensed daily, monthly or yearly.

Let us look at how Amy goes about figuring out her operating expenses.

Expense	Daily	Monthly	Yearly
Vehicle lease			60,000
Rent			50,000
Salary			2,40,000
Hourly Employee	200		72,000
Marketing		5000	60,000
Utilities		3000	36,000
Depreciation		1666.67	20,000
Maintenance			40,000
Total			5,78,000

Assumptions:
- Lease the truck at Rs.60,000/year rather than buy it
- Park the truck near a popular mall and pay rent at Rs.50,000/year
- Take a salary of Rs.2, 40,000/year
- Truck will run from 11:00 am to 10:00 pm, which makes it 11 hours/day, for 360 days in the year
- Hire an employee from 6:00pm -10:00 pm for an hourly basis at Rs. 50
- Actual Price of the truck is Rs.1, 00, 000 depreciated over 5 years, thus Rs. 20,000/year Utilities include fuel, electricity, and water at Rs.3000/month
- Vehicle maintenance cost at Rs.40, 000/year
- Marketing at 5000/month to be incurred every time a marketing campaign is run

Next, calculate Cost of Goods Sold (COGS).

Cost of Goods Sold is the direct and total costs used to create the product or the service.
COGS differ for every type of business. The two important things that contribute to COGS are direct labour and materials. If you are into manufacturing a product, COGS would include raw materials, labour, other pre-manufactured components, cost to assemble different product parts etc. If you are into providing a service, it would include the labour cost of providing the service and any supplies used in delivering the service. In Accounting, COGS is also calculated as

COGS = Beginning Inventory + Purchases made during the Period – Ending Inventory

This formula can be used for businesses into manufacturing and retail. Though knowing what will contribute to COGS is important, it is necessary to know how much gross margin you would want to earn.

Gross Profit is the difference between revenue and COGS and shows the profitability calculation of the company.

After figuring out all the costs, the key part is Revenue or also termed as "Sales" sometimes. A few things to start with, when projecting how much revenue your business would generate, is to look at all the sources of revenue, determine all the revenue streams and understand the revenue drivers.

The sources of revenue can be understood as the different products and services of your business will generate different revenue each. The revenue streams would include the revenue models your business is based on. It could be subscription as well as unit sales. Revenue drivers refer to variables that influence your revenue. These could be the number of customers you serve or the number of units they buy or the price or the frequency with which they buy or the average of some important metrics. The revenue drivers are also different for different businesses.

Considering all of these, imagine how much you would make in a day and multiply it for the month and then for the year.

Product	Price	Unit Sold/ day	Gross Margin	Revenue	COGS
Veg Pizzas	150	20	50%	3000	1500
Non-veg Pizzas	200	20	40%	4000	2400
Total				7000	3900

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Assumptions:
Traffic/Footfall per day= 40 people
Units sold:
Vegetarian Orders - 40/2= 20
Non-Vegetarian Orders - 40/2= 20

COGS are calculated depending on the gross margin Amy wants to earn. COGS
were also  calculated by taking the average total cost of ingredients, cooking gas
and disposable cutlery.

Total Revenue = 7000
Total COGS = 3900
Gross Profit = 3100
Gross Profit Margin = 44%
```

After understanding the different parts of the income statements, let us try to create one using Amy's assumptions and calculations. We know that Amy calculated the total of annual operating expenses. We know that Amy has calculated the Revenue and COGS for a day. We will now multiply both the totals by 360 (given that Amy will shut her food truck at least for 5 days in a year). We will then subtract the total annual COGS and total expenses from the total of annual revenue. This would give us earnings from operations.

Since Amy will register her business, she will be paying taxes. Depending on the category she would fall into, let us assume Amy will pay 10% as tax. After subtracting the tax from earnings from operations, we will get net earnings or net income that the business would earn. This will show the financial projections of Amy's food truck and will help her reevaluate her expenses as well as costs. This will also serve as evidence that Amy's business can and will be profitable.

Amy's Pizzeria Pro-forma Income Statement 2017	In INR
Revenue: Veg. Pizzas	10,80,000
Non-veg Pizzas	14,40,000
Total Revenue	25,20,000
Cost Of Goods Sold:	
Veg. Pizzas	5,40,000
Non-veg Pizzas	8,64,000
Total Cost Of Goods Sold	14,04,000
Operating Expenses:	
Vehicle lease	60,000
Rent	50,000
Salary Hourly	2,40,000
Employee Wage	72,000
Marketing	60,000
Utilities	36,000
Depreciation	20,000
Maintenance	40,000
Total Operating Expenses	**5,78,000**
Earnings from Operations	**5,38,000**
Taxes	60,760
Net Income	**4,77,240**

Income statement is also called as Profit and Loss statement. It describes the various expenses, revenues, gains and losses of a particular duration. By looking at the Income Statement one can find out whether the organization is making profit or running at a loss. Income Statement does not show you the cash transactions or cash flow.

Cash Flow Projections
Cash flow refers to the movement of money in and out of a business during a specific period of time.

Inflow: Following is a list of some of the ways in which money comes into the business

Inflow

- Owners' Equity: own money invested in the business.
- Loan Received: money borrowed from friends, family, relatives, bank etc.
- Sales Receipts: money coming in by selling your products or service.
- Interest Earned: money coming in the form of interest on the deposits made in the bank.
- Rent Received : Money coming in by renting out a building or room.
- Sale of Assets: Money coming in by selling surplus property like furniture, machinery, old cars etc.
- Claims Received: Money coming in the form of insurance claims like accident claims, fire claims, maturity of insurance policies, etc.
- Government Subsidy Received: Money coming in the form of grants paid by the government. It is a form of financial assistance paid to an individual starting a business.
- Sale of Scrap: Money coming in by selling scrap and waste material, selling rejects etc. This list is not exhaustive. Think of some more ways in which money comes into the business and enhance this list.

Note: Please remember that profit is not to be considered as inflow. Nobody gives money as "profit". Profit is being generated in the business.

Outflow: Following is a list of some of the ways in which money goes out of the business .

Outflow
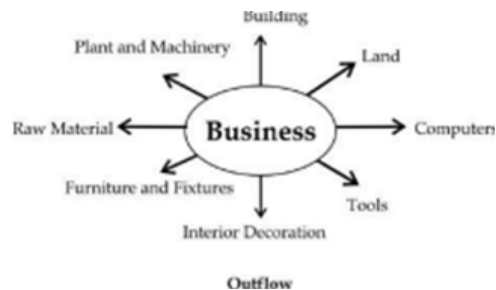
- Land: Purchasing land to start business.
- Building: Constructing a building or purchasing a building to start business.
- Plant and Machinery: Investing money in Plant and Machinery to start business.
- Furniture and Fixtures: Purchasing furniture and fixtures.
- Interior Decoration: Investing money in hiring an interior decorator.
- Tools: Purchasing tools for the business which will be utilized in the business.
- Computers: Purchasing computers.
- Raw Material: Buying of raw materials.
- Packing Material: Money required to buy packing material for products.
- Transportation: Purchasing a vehicle to be used for transporting raw materials, transporting your products to the customer's premises.
- Salary and Bonus: The money paid to employees.
- Employee Benefits: The perks given to employees like travel allowance, medical benefits etc.
- Incentives: Payment of incentives to employees based on their performance.
- Advertising: Money spent on publicizing the products through newspaper, television, pamphlets, brochures, public hoardings, etc.
- Rent at Premises: Money being spent on paying the rent for the premises used for the business.
- Interest on Loan: Borrowed money on which interest is to be paid.
- Insurance Premium: Money paid as premium to the insurance company for covering various risks.
- Travel: Money spent on travelling for the owners and the employees.
- Sales Commission: Money given to the employees or agents as commission on sales.

Note: When items are used with longer life in business (furniture, machinery etc), a part of its original value is computed as the cost for a given period – say a month, year etc. This is known as depreciation. However, money is not paid for depreciation. So depreciation is not a cash outflow. It is a non-cash expenditure.

Recording Cash Inflows and Outflows

Now let's take a look at the format in which a cash book or register is written for only cash transactions. This is a simplified version (compared to what an accountant would use for cash book) in which we have 6 columns as shown below:

Date	Description	Reference No.(Voucher/ Bill)	Cash Received (in Rs.)	Cash Paid(in Rs.)	Cash Balance (in Rs.)
1	2	3	4	5	6

In the above format,

• The first column is the date on which either received cash or paid cash is entered.

• The second column is the description in which the details for which either received cash or paid cash is entered. For example: monthly tea expenses paid or purchase of furniture, etc.

• The third column is where the bill or voucher details are entered.

• The fourth column is where the amount of cash received is entered.

• The fifth column is where the amount of cash paid is entered.

• The sixth and last column is where the left over balance is entered.

For example:

Opening balance of Rs 40,000/-

Spent Rs 10,000/- for purchasing furniture, then in the fifth column enter Rs. 10,000/- and in the sixth column enter Rs. 30,000/- (Rs. 40,000 – Rs. 10,000).

Sold products on the next day for Rs. 5,000/-. Then in the fourth column enter Rs. 5,000/- and in the sixth column, enter Rs. 35,000/- (Rs. 30,000 + Rs. 5,000).

Exercise 1 – Cash Transactions Only

Ratan Singh is an owner of a shop in a three-star hotel at Ranthambore. He sells T-shirts and mementos to the tourists at that shop. He also takes a stall on rent at crowded places on a daily basis. Details of daily transactions for the month of July are given below. Let us suppose that he started his business with an opening balance of Rs. 30,000/-

(i) On July 01, to start his business, he buys some furniture and basic supplies that cost him Rs. 15000/-

(ii) On July 2, he buys 3 dozens of T-shirts at Rs. 1200/- per dozen.

(iii) On July 6, he decides to sell T-shirts at the temple area on the forthcoming Sundays. And for that he paid an advance rent of Rs. 100/- per day. Apart from that he spent Rs. 200/- for the banners and Rs. 50/-for handbills.

(iv) On July 7, he sold all the T-shirts at Rs. 200/- per piece.

(v) On July 10, he again purchased five dozens of T-shirts at Rs. 1200/- per dozen.

(vi) On July 14, he sold four dozens of T-shirts at Rs. 200/- per piece and the remaining T Shirts, he sold at Rs.190/- per piece.

(vii) On July 16, Ratan Singh again purchased five dozens T-shirts for Rs. 1200/- per dozen. He spent Rs. 500/- on commissions and Rs. 300/- more on pamphlets and Rs. 100/- on another banner.

(viii)On July 21 Mr. Singh sells 3 dozens of T-shirts at Rs 200/- per T-shirt.

(ix) On July 25, he purchased 3 dozens of T-shirts at Rs. 1200/- per dozen and manages to sell all his T-shirts at Rs. 200/- per piece on that same day.

(x) He pays the tea expenses of Rs. 300/- for the current month on July 31.

Cash Book format for Cash only

Date	Description	Ref No.(Voucher/ Bill)	Cash Received (in Rs.)	Cash Paid (in Rs.)	Cash Balance (in Rs.)
July 1	Opening Balance				30,000/-
July 1	Purchase of Furniture	No: 3675 and Date: 1/07/2012		15,000/-	15,000/-
July 2	Purchase 3 Dozen T-shirts	No: 863 and Date: 2/07/2012		3,600/-	11,400/-
July 6	Rent, Banner and Handbill	No:5640 and Date: 6/07/2012		350/-	11,050/-
July 7	Sale of 3 Dozen T-shirts	No: 6012 and Date: 7/07/2012	7,200/-		18,250/-
July 10	Purchase 5 Dozen T-shirts	No: 887 and Date: 10/07/2012		6,000/-	12,250/-
July 14	Sale of 5 Dozen T-shirts	No: 6087 and Date: 14/07/2012	11,880/-		24,130/-
July 16	Purchase 5 Dozen T-shirts	No: 906 and Date: 16/07/2012		6,000/-	18,130/-
July 16	Commission Paid	No: 1294 and Date: 16/07/2012		500/-	17.630/-
July 16	Banner and pamphlets	No: 765 and Date: 16/07/2012		400/-	17.230/-
July 21	Sale of 3 Dozen T-shirts	No: 6127 and Date: 21/07/2012	7,200/-		24,430/-
July 25	Purchase 3 Dozen T-shirts	No: 918 and Date:25/07/2012		3,600/-	20,830/-
July 25	Sale of 5 Dozen T-shirts	No: 6159 and Date: 25/07/2012	12,000/-		32,830/-
July 31	Monthly Tea Expenses paid	No: 189 and Date: 31/07/2012		300/-	32,530/-
	TOTAL		38,280/-	35,750/-	

Note: The balance in the cash register (or the cash box) does not represent the profit. It only shows the cash balance of the firm.

It is important to write the cash register regularly (daily or even more frequently) to ensure no transaction is missed out. Every transaction, however small, must be recorded immediately.

In case of bank transactions, money being withdrawn from ATM is like cheque issued and there will be two entries – cheque issued (hence out flow from bank) and similar amount received as cash (inflow into the cash box). It is also to be noted that when money is withdrawn from bank or deposited in the bank – there are two entries; one in cash column and the other in cheque column. These are known as "contra" entry. It is like taking money from the left pocket and putting it in the right pocket. Money does not go out to anyone else; it just changes pocket (cash box or bank account) but still remains with the owner.

Credit Transactions:

Sometimes in business, products are sold on credit which means that the buyer does not pay the money immediately. The buyer will pay at a later date. This is called selling on credit. Buying on credit means that the buyer will purchase a product from a seller but will not pay the seller immediately. The buyer makes the payment at a later date. This is called buying on credit. While credit (whether given or taken) transactions do not get entered in the cash book, it is very important for the entrepreneur to keep track of these and make appropriate entries in the cash book. To help achieve this, a simple format like the one below would be helpful. It will also ensure that tallying or reconciliation becomes easy.

Also, note that entrepreneurs must try to keep all transactions as cash and not give too much credit. This is sometimes difficult but must be kept to a very minimal. Otherwise, the entrepreneur often ends of spending more time in collecting credit and losing money when the creditors don't pay.

Format for keeping track of credit transactions

Sold on Credit					Bought on Credit				
Date	Amount (in Rs.)	Description	Date money received	Date Entry made in Cash Book	Date	Amount (in Rs.)	Description	Date money paid	Date Entry made in Cash Book

A Cash Flow Projection shows how cash is expected to flow in and out of your business.

For you, it's an important tool for cash management, letting you know when your outlays are too high or when you might want to arrange short term investments to deal with a cash surplus. A Cash Flow Projection will give a much better idea of how much capital investment a business idea needs.

The difference between Cash Flow Projection and Cash Flow Statement is that one is for the future and another is historical. The historical Cash Flow Statement shows how cash has flowed in and out of a business. In other words, it describes the cash inflow and outflow that has occurred in the past. The Cash Flow Projection shows the cash that is anticipated to be generated or expended over a chosen period of time in the future.

Session 73

Handout
A Handout is written material
given to inform or provide
students with additional
information.

Activity:
Preparing an Income Statement and Cash Flow Projection

Case: Savitha Sari Shop

Savitha conducted a survey in her neighborhood and was convinced that there was an opportunity to start a Sari Shop. She plans to bring saris from Surat and sell it to her clients. She has decided on the types of saris that could sell for Rs. 250/- per piece. She will be able to get these saris at Rs. 125/- per piece. The packing of each sari will cost Rs. 12.50/-. She wants to employ two sales staff (shop sale as well as door to door and office sale) at a salary of Rs. 1,000/- each per month. She will also be working in the business and take salary of 1,000/- per month. The sales staff will earn commission @ 10% on sales. The freight for saris from Surat works out to Rs. 12.50/- per sari.

The front portion of her house, which was rented at Rs. 1,500/- per month is now vacant. She will do this up with proper lighting, painting etc. She also wants to put proper seating, cupboards and show –cases to exhibit her products.
Cost of all the furniture, painting, lighting etc is Rs. 90,000/- (Quotations from vendors). This expenditure is to be recovered over 5 years. She has Rs. 20,000/- of her savings, which she will invest in this business. Besides, she has convinced her bankers about the profitability of the business and has been assured of a loan of Rs. 1,00,000/- at 12% interest per annum. For the first 12 months, only interest will be payable. Repayment will start thereafter.
Supplier from Surat sends goods once a month. Savitha has to forecast her sale for the following month and buy the goods by paying cash.
Savitha knows very well that cash is the blood in business and hence plans to be very cautious about credit sales.Monthly utility bill is expected to be the average of Rs. 500/-, phone bill Rs. 500/- and various other office expenses (including publicity) estimated around Rs. 1,000/- per month.

Projected Sales for six months are as under:

Month	1	2	3	4	5	6	7
Total saris sold	72	84	100	120	152	192	192
Cash sales of saris	60	68	80	100	128	160	160
Credit sales of saris	12	16	20	20	24	32	32
Cash sale rupees	15,000	17,000	20,000	25,000	32,000	40,000	
Credit sale rupees	3,000	4,000	5,000	5,000	6,000	8,000	

Note: Money from Credit Sales comes in the following month.
These are the facts (or assumptions as the case may be).

Please prepare a projected monthly income statement for Savitha Sari Shop in the format shown here:

	Income Statement						
	Month 1	Month 2	Month 3	Month 4	Month 5	Month 6	Month 7
Sales/Revenue (in Rs.)							
Cash							
Credit							
Total Sales (A)							

Cost of Goods Sold (COGS)							
Raw Material							
Packing Material							
Sales Commission							
Freight							
Total COGS (B)							
Gross Profit (C=A-B)							
Fixed Expenses							
Salary							
Rent							
Utilities							
Interest							
Phone							
Office exp.							
Depreciation							
Total Fixed Expenses (D)							
Profit/(loss) before tax (E=C D)							
Cumulative Profit/(loss)							

Session 73

Handout
A Handout is written material given to inform or provide students with additional information.

The Cash Flow Projection for the next six months is to be done using the following format. Try doing it step by step as explained.

	Cash Flow Projection						
	Month 0	Month 1	Month 2	Month 3	Month 4	Month 5	Month 6
Cash in flow							
Owner's equity							
Loan from friends							
Bank loan							
Cash sale receipt							
Credit sale receipt							
Total inflow							
Cash out flow							
Start-up exp							
Assets (tangible and intangible)							
Working capital							
Raw material							
Packing material							
Sales commission							
Freight							
Salary							
Rent							
Utilities							
Interest							
Phone							
Office exp.							
Loan repayment							
Total outflow							
Surplus/(deficit)							
Cumulative surplus/(deficitor Closing balance)							

Quiz:

1) Startup costs are _____ cost?
a. Recurring
b. Non- Recurring
c. Variable
d. Fixed

2) Cost are _____?
a. Incurred
b. Derived
c. Managed
d. Controlled

3) Expenses are _____?
a. Derived
b. Reduced
c. Incurred
d. Increased

4) Which of the following is not a Fixed Cost?
a. Salary
b. Commission
c. Rent
d. Insurance Premium

5) Income Statement is also called as?
 a. Earning Statement
b. Balance Statement
c. Turnover Statement
d. Profit & Loss Statement

Ans: 1-b, 2-b (Refer 6.3 of handout), 3-c, 4-b,5-d

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Session 74

Creative Problem Solving-Entrepreneureship

Creative Marketing

Creative Marketing

What is Marketing?

Marketing refers to any actions a company takes to attract an audience to the company's product or services through high-quality messaging. Marketing aims to deliver standalone value for prospects and consumers through content, with the long-term goal of demonstrating product value, strengthening brand loyalty, and ultimately increasing sales.

Purpose of Marketing

The purpose of marketing is to research and analyse your consumers all the time, conduct focus groups, send out surveys, study shopping habits, and ask one underlying question: "Where, when, and how does our consumer want to communicate with our business?"

Marketing vs. Advertising

If marketing is a wheel, advertising is one spoke of that wheel. Marketing entails product development, market research, product distribution, sales strategy, public relations, and customer support. Marketing is necessary in all stages of a business's selling journey, and it can use numerous platforms, social media channels, and teams within their organization to identify their audience, communicate to it, amplify its voice, and build brand loyalty over time.

On the other hand, advertising is just one component of marketing. It's a strategic effort, usually paid for, to spread awareness of a product or service as a part of the more holistic goals outlined above. Put simply, it's not the only method used by marketers to sell a product.

For example, Let's say a business is rolling out a brand new product and wants to create a campaign promoting that product to its customer base. This company's channels of choice are Facebook, Instagram, Google, and its company website. It uses all of these spaces to support its various campaigns every quarter and generate leads through those campaigns.

To broadcast its new product launch, it publishes a downloadable product guide to its website, posts a video to Instagram demonstrating its new product, and invests in a series of sponsored search results on Google directing traffic to a new product page on its website. Now, which of the above decisions were marketing, and which were advertising? The advertising took place on Instagram and Google.

4Ps of Marketing

The four P's of marketing, otherwise known as the marketing mix, are product, price, place, and promotion. The four P's are meant to help marketers consider everything about a product or service when they're deciding how to market something for their business.

For example, you can ask yourself:

How does your product meet your customer's needs?

Where are customers looking for your product?

What is the value of your product?

How can you differentiate your product from competitors?

Thinking about your marketing in terms of the four P's will help you strategize how to reach your customers.

1. Product

When you think about your product, consider exactly what you're selling. Is it a specific product? Or is it a service? Your product can be a physical product, an online app, or a service such as house cleaning. Really, anything that you're selling is the product. Then, think of your brand messaging, the services you offer, and even packaging. When you define your product, think about what problem your product solves for your customers. Consider how your product is different from competing products. What features are unique to your product? It's important to know your product intimately so you can market it.

2. Price

When it comes to price, you have to consider how much you're going to charge customers for your products or services. Of course, you need to make a profit. But you also need to think about what competitors are charging for the same product or service and how much customers are willing to pay. Additionally, you can think about what discounts or offers you can use in your marketing. When you decide on a price, you want to think about perception. Do you want to be known as a cost-effective option in your industry? Or perhaps you're a luxury brand and the price is slightly higher than competition on the market. Either way, the language you use to market your product will be greatly impacted by the price of your product.

3. Place

When it comes to place, this might mean the physical location of your company, but it could also be defined as anywhere you sell your product, which might be online. The place is where you market and distribute your product. Remember that not every place makes sense for every product. For example, if your target market is seniors, then it won't make sense to market on TikTok. It's important to choose the right places to market your product and meet your customers where they're at. Think about possible distribution channels, what outlets you could sell your product, whether you're B2B or B2C, etc. At this point, you'll need to think about how to market your product on all the various channels that make sense for your company.

4. Promotion

Promotion is the bread and butter of marketing. This is when you'll think about how to publicize and advertise your product. Additionally, you'll discuss brand messaging, brand awareness, and how to generate leads and revenue. When it comes to promotion, keeping communication in mind is of the utmost importance. What messages will resonate with your target market? How can you best promote your product to them? Think about where, when, and how you'll promote your brand.

To develop a marketing mix, you'll need to think about how you can uniquely position your brand amongst the competition. The most important part of thinking about the four P's of marketing is to understand the customer, the competition, and your company. You'll evaluate your product and how to promote it. Even though marketing has changed since the four P's were developed, the foundational elements of the industry haven't. You can apply the concepts of the marketing mix to any type of marketing.

What Are Marketing Funnels?

A marketing funnel is a visual representation of the steps a visitor takes from first finding out about your brand until they convert. The most common type of marketing funnel is four steps:

1. Awareness: A prospective customer sees your ad, social media post, or hears about you from a friend.
2. Interest: They think you can solve a problem and want to learn more.
3. Consideration: The prospect has done their research and wants to convert.
4. Conversion: The prospect takes action — they buy your item, schedule a demo, or take whatever other action you want them to take.

The action can vary based on customer and industry — maybe you want them to make a purchase, sign up, or fill out a form. When someone does something you want them to do, it's known as a conversion. The visitor converts from browsing to taking the action you want them to take.

For example, Think about the Amazon purchase funnel. There are several steps a visitor has to go through before they can purchase a product. Here's how it looks:
• They visit Amazon.com
• They view a product
• They decide to add a product to the cart
• They complete the purchase
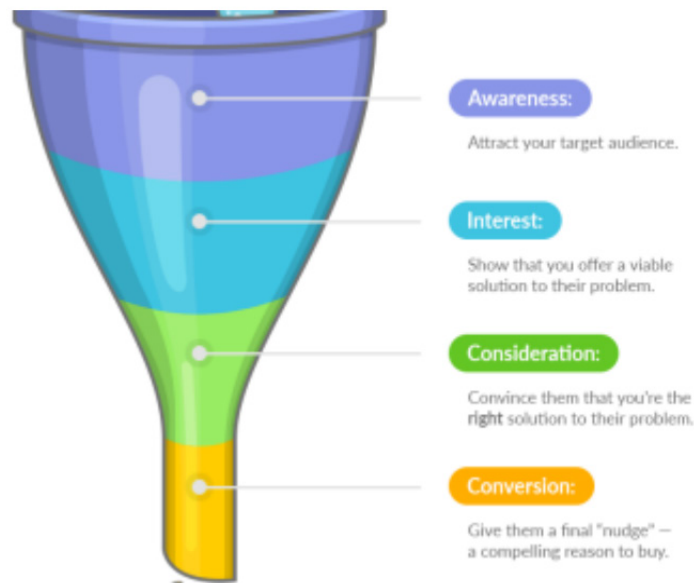
1. Awareness

The first stage of the funnel is awareness. This is where people who have a certain problem get to know about your product, company or brand (because you are somehow related to that problem).This can happen in a variety of ways:

• They read one of your articles on Medium;
• They listen to a podcast where the host gives you a shoutout;
• They see one of your ads on Facebook;
• They search for something on Google and find your website;
• They attend a conference and one of the speakers mentions you;
• They watch one of your videos on YouTube

2. Interest

The second stage of the funnel is interest. At this stage, your potential customers are "hooked." They've consumed your content, and now they want to find out more. They want to dig deeper into the subject. Very likely, they will begin:

• Refining their searches by using more specific Google queries. For example, instead of searching for "how to promote your website," they may begin looking for SEO specific terms like "link building" and "on page SEO"
• Looking for experts and influencers to follow. For example, they may look for the "best SEO blogs" or "best SEO podcasts" to quickly get up-to-speed on what is happening in the world of search

3. Consideration

The third stage of the funnel is consideration.
At this stage, your prospects know the problem. They know the solution. And they know you can provide that solution for them. Just because they know what you can do and how you can help them doesn't mean they will choose you. Chances are: there are plenty of possible solutions for them to choose from. They will look at alternatives. This is especially true if it's a big ticket item.

Think about it: knowing everything about the iPhone does not necessarily mean you will choose it over the Google Pixel 3 or Samsung S9. So your job here is to convince them you are the right person, product or company for the job. How do you do that?

4. Conversion

The fourth stage of the funnel is conversion. Your prospects are almost convinced **you are the right solution for their problem.**

All you have to do is to give them a final 'nudge'—a compelling reason for them to click "buy" right now. There are plenty of things you can do here, like:

- Utilize urgency. If a product is going out of stock soon, you can gently remind them. (Please don't fake this!);

- Make sure the checkout experience is smooth and easy;

- Offer them a discount to persuade them to buy (by the way, this is not a strategy we encourage or use!

Inbound vs. Outbound Marketing

Inbound marketing: Inbound marketing, marketers attempt to pull or draw the customer to the product or service, as opposed to reaching out to them, using modern marketing techniques such as social media marketing and Search Engine Optimization (SEO) content marketing etc.

Outbound marketing: Also referred to as interruption marketing, outbound marketing involves reaching out to the customer or the largest number of people possible to get the marketing message out there through traditional marketing techniques such as cold calling, direct mail, advertising etc.

	Inbound Marketing	Outbound Marketing
Definition	Focuses on crafting high-quality content that organically attracts people.	Uses traditional non-digital strategies and jargon-filled messages to draw attention.
Examples	Blogs, SEO strategy, keyword targeting, social media, etc.	TV commercials, billboards, direct mail, newspaper and magazine ads, etc.
Audience Engagement	Permission-based and relevant.	Interruption-based and often disassociated.
Brand Positioning	You're always the main headline.	Stand out or you won't be seen at all.
Marketing Strategies	Integrated, cross-channel strategies.	Linear strategies with limited marketing avenues.
Messaging	Educational, specific, useful.	Broad, forced, complicated.
Distribution	Continuous and iterative.	Inconsistent and varied.
Data & Attribution	All digital and quantifiable.	Immeasurable and hard to track.

Digital Marketing

Digital marketing incorporates all marketing efforts that use an electronic device or the internet, leveraging digital channels and online marketing tactics to promote and sell products/services and run marketing campaigns.

Most businesses and brands have a website or at least have a social media presence or digital ad strategy. Some channels that brands, businesses and organizations leverage upon include email, social media, search engines, videos, blogs, websites etc.

Types of Digital Marketing

Search Engine Optimization (SEO): With SEO, the goal is to optimize and improve the business website and its online content to "rank" it higher in search engine page results. It is the process of optimizing the online content so that search engines can easily read, index and rank them and show it as a top result for searches of certain keywords. For example, If you have an article about how to make an eggless chocolate cake, you want the search engine to show it as a top result to anyone who searches for the phrase "chocolate cake." Hence, the amount of organic or free traffic on the website increases. SEO is about earning traffic on websites through free or unpaid listings. The channels that benefit from SEO include websites, blogs, and infographics.

Pay-Per-Click (PPC): Pay-per-click or PPC is the most common form of paid search marketing. It is a tactic of digital marketing in which the advertiser business or brand pays a fee to the publisher (platform running the add), each time one of their ads is clicked upon. Basically, PPC helps to increase traffic on a website rather than trying to get traffic organically. Commonly, these ads are run on search engines and social media. For example, Google Ads, paid ads on Facebook, sponsored messages on LinkedIn, Twitter ad campaigns etc. Some factors that influence the success of PPC ad campaigns include landing page quality, keyword relevance, quality score, visual creative of the ad etc.

Social Media Marketing (SMM): As the name suggests, this method is about promoting your brand and content on social media channels to drive traffic to your website, increase brand awareness and generate leads among current and potential customers, employees, journalists, bloggers etc. Most businesses create accounts and pages on social media platforms to share content, build a following, and establish relationships with customers. Most social media platforms have built-in data analytics tools, enabling businesses to track the progress, engagement and success of ad campaigns. Some popular social media platforms include Facebook, Instagram, LinkedIn, Snapchat, Twitter, Pinterest etc.

Content Marketing: Content marketing refers to the creation, distribution and promotion of relevant, valuable and consistent content assets for the purpose of traffic growth, increasing brand awareness, lead generation, and engaging customers. Content is created by playing between text, videos and images. The foundation of content marketing is storytelling and generating high-quality content that outlines customer needs, pain points and key benefits. Some common channels and formats of content marketing include blog posts, infographics, vlogs, podcasts, e-books, whitepapers, memes, pin boards etc.

Email Marketing: Email marketing is the practice of communicating with the target audience and sending various types of content via email. Email is used to share discounts, create awareness about events, promote content and direct customers towards the website. Emails also help to get subscribers, generate leads and even get product sign ups. An email campaign is most effective when the subscribers or recipients have opted in to subscribe to the content. Every email newsletter must offer something valuable to customers. Some common types of emails included in an email marketing campaign are blog subscription newsletters, follow-up emails to website visitors who downloaded something, customer welcome emails, promotions to loyalty program members, tips or similar series emails for customer nurturing etc.

Affiliate Marketing: This digital marketing method is a type of performance-based advertising. An affiliate, i.e. the platform/entity that promotes and sells other people's products or services earns a commission for each conversion/sale. The affiliate holds no stock, fulfils no orders and does not deal directly with any customers. Sales are tracked via affiliate links to enable commissions to be calculated. For businesses of various kinds such as those selling physical products via an eCommerce store, SaaS software tools, eBooks and virtual training courses, financial services such as insurance, credit cards etc., affiliate marketing is highly advantageous in driving sales. Some popular affiliate marketing examples include Amazon Associates affiliate program, YouTube partner program etc.

Reputation Management: Also referred to as "Online PR", reputation management is a public relations activity, focused on the practice of earning online coverage with blogs, digital publications, and other content-based websites to improve your brand image and build credibility. It is also about identifying negative press online and creating content to counteract it. Some online PR activities include reporter outreach via social media, getting engaging comments on your personal website or blog, engaging online reviews of your company etc.

Influencer Marketing: Influencer Marketing is a type of sponsored content where products and services are endorsed by industry influencers to publish posts or videos about the product/service on their social media accounts. Influencers are either industry experts or have a huge social media influence. Instead of marketing directly to a large group of consumers, influencers get out the word and drive the brand's message to the larger market. A robust influencer marketing strategy includes macro-influencers, "power middle" influencers, micro-influencers, brand ambassadors, brand advocates, employees, and even celebrities, as needed

Session 74

Handout
A Handout is written material given to inform or provide students with additional information.

Activity: My Marketing Mix

When: during session

How: decide the marketing mix for your business using this table

Product (*Name and describe your product*)	Price (*At which price point will you sell this product*)
Place (*List out the place(s) your product will be sold*)	**Promotion** (*What tactics will you utilize to promote your product*)

Worksheet
A worksheet is a sheet of paper
given by a teacher to students
that lists tasks for the student to
accomplish

Quiz:

1) Which of the following values does Marketing Deliver?
a. Brand Loyalty
b. Product Value
c. Sales
d. All of the above

2) Mark the option which is not among the 4P's of marketing?
a. Peak
b. Product
c. Price
d. Promotion

3) Which among the following is the final phase of the Marketing Funnel?
a. Consideration
b. Conversion
c. Awareness
d. Interest

4) Select the option which is not a type of Digital Marketing?
a. Email marketing
b. SEO
c. Pamphlet Marketing
d. Affiliate Marketing

5) Rubina is marketing and selling a few products on a platform. She earns on each sale done and her performance & remuneration is tracked via a unique link. Which type of marketing is Rubina doing?
a. Content Marketing
b. Affiliate Marketing
c. Influencer Marketing
d. Social Media Marketing[1]

[1]Ans: 1-d, 2-a,3-b,4-c,5-b

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Creative Problem Solving- Entrepreneureship

Pricing & Funding

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Pricing & Funding

Pricing

Price is the amount that a buyer charges for a product or a service. It is all around us. The school charges a price in the form of a fee. Railways charge a price in the form of fare, and consumer products charge a price in the form of an MRP, etc.

The price depends on factors such as fixed and variable costs, cost of production, company objectives, competition, target market, willingness to pay and to purchase power of customers, producer's control on demand and supply etc. For an enterprise, the goal in terms of price is to reduce costs by improving efficiency.

For making price decisions, the following questions must be considered:

- What is the value of the product or service for the consumer or buyer?
- How does the price compare with competitors?
- Does the pricing meet our margins requirements?
- Are there established price points for the product or service?
- How price sensitive is the customer?
- Can price increase lead to increased market share?
- Can different prices be charged to different customer segments?
- What discounts can be offered to customers?

Some pricing strategies using to make pricing decisions are as follows:

A) Penetration pricing
In penetration pricing, the price of a product or a service is set low initially. Usually, the objective of setting the price low in the beginning is attracting new customers, increasing sales, and capturing more market share. Once the market is created, or market share growth is achieved, the price is increased. Penetration pricing works best for a new product that does not have much differentiation from competitor products in the market.

B) Cost-Based Pricing
In cost-plus pricing, the price is set in a manner to cover the cost of making, providing and distributing a product or a service, and accommodating for an additional profit. A reasonable markup or margin is added to come up with the final price. For example, it may cost INR 100 to produce an item, and if the firm adds 20% as a profit margin, the selling price would be INR 120.

C) Skimming Pricing
Skimming, also referred to as creaming, is a strategy where the prices are initially set high and slowly lowered to make the product or service available to a wider market. Price skimming aims to reach a segment that is price-insensitive or has a relatively low price-sensitivity. These could be the 'early adopters' of a product or service that was launched with price skimming. This product is adopted in the market when targeting consumers that have higher disposable income or those willing to pay a premium price. For this, the price and quality relationships must be viewed favorably by quality conscious customers. For example, Apple uses price skimming as the pricing strategy for its smartphones

D) Variable Pricing
Different prices are charged to different customers for the same products or services in variable or dynamic pricing. Pricing varies depending on anticipated business from different customer groups. Other factors that influence price include order size, levels of supply and demand, bargaining power, and purchasing power of customers.For example, with street vendors or small shops, a standard price is posted on each item, but it is negotiated to sell items to customers who are not willing to pay the standard price. Auctioning or Bidding also works on variable pricing as the price of an item being sold through auction changes depending on the demand, as evidenced by bid prices. Two markets that use the principle of variable pricing are the stock market and the real estate marke

Different Pricing Strategies

Competition Pricing: In this, the price is compared with competitor pricing, where the price is set lower, the same or higher than competitor products or services.

Product Line Pricing: Within the same product range, different products are set at different prices. For example, HD and non-HD are charged differently by Direct to Home (DTH) channel operators.

Bundle Pricing: This strategy is used to bundle a group of products at a lowered price. For example, 'buy one and get one free' promotions, especially popular with supermarkets, is an example of bundle pricing.

Psychological Pricing: The most commonly found pricing strategy, in this the psychology and positioning of the price are considered, where INR 99 is charged instead of INR 100 or INR 199 is charged instead of INR 200.

Premium Pricing: As the name suggests, a high price is set to reflect the product's exclusiveness. This can be charged for services or products that are unique or are customized for the customer. For example, first-class airline tickets or designer wear clothes or vintage cars.

Optional Pricing: Some additional products or services are made optional to the customer, and a price is charged for it. For example, in the automobile industry, especially for cars, additional optional services and features are made optional.

Funding

You have already understood the sources of funds in the financial literacy module. Let's apply those concepts in the start-up world and understand Equity and Debt in detail.

Equity Financing

Equity financing or equity funding is the method of raising capital by selling company stock to investors.

Features of Equity Financing:

- Equity finance is more of a permanent source of raising finance
- Ownership rights have to be shared with investors
- There is no charge that is implied over assets
- There is no obligation for fixed dividend payment
- Controlling rights can used by the entrepreneur through voting power

Methods of Equity Financing:

Reinvesting Profits: Retained profits are usually held back for some years and utilized again and again for the development and growth of the business. New entrepreneurs cannot use this method as they do not have any profits.

Equity Shares: Any business that releases equity shares is under no obligation to pay the shareholders any fixed dividend or principal amount.

Preference Shares: The shares which are entitled to the payment of a fixed dividend before the payment of dividend on equity shares are called preference shares. These shares can be of different types such as cumulative or non-cumulative, convertible or non-convertible or participating or non-participating

Stages of Equity Financing for Startups

A) Early-Stage Financing:

Seed Capital Financing (Seed Round): Seed capital is the initial capital, given in relatively small amounts, which can be used to start a business at a stage when it is still an idea or a concept. Some areas where this capital is used include market research, initial operating expenses, product research and development and advancing to the next stage of operations.

Series A Financing (Start-up Round): This funding happens for early stage startups once it is launched. The capital sourced this round is used for continuing with further product development, covering manufacturing or operational costs, facilitating initial marketing and making early sales. At this stage, the startup might have some paying customers and a ready-to-go product. The funding is used to expand sales and customer base. For this round, angel investors and venture capitalists get involved.

B) Stages of Expansion or Development Financing:

Series B Financing (Second Round): This round of funding might happen when there is no clear profitability or cash flow yet for the startup. This funding is used in expanding market reach, assisting in continued development, hiring employees, increasing sales and marketing. By this time, the startup would already have a strong customer base, but would be looking to grow by expanding to a bigger market. It is mainly sourced from venture capital firms that invest in the later stage

Series C Financing (Third Round): By this round, the company is looking for major expansion, with perfecting the business model, scaling and even acquisition of other companies. With rapid sales growth, high market share and positive profit levels, different investors such as hedge funds, private equity firms, investment banks etc. start to fund these startups.

Series D Financing (Fourth Round): This round, followed by a fifth round sometimes, helps to bridge the financing gap for an initial public offering (IPO). Sometimes, this round is also used by the startup to position itself for a private acquisition.

C) Acquisitions and Leveraged Buyout Financing (Diversification, Research   Development):

Exit (IPO): With the exit, either the company goes for a merger, an acquisition or an IPO. If the startup has been successful, this stage can provide a vast amount of return for founders and investors, and serve as a significant incentive for their initial investment.

Leveraged Buyouts (LBOs): In this, the management of a company might choose to completely acquire the company control by buying the stake owned by other present owners.

Going Private or Go Global: An option where some owners of the company might choose to completely go private and buy back all of the outstanding stock. With this, the company might also think of global expansion through mergers, foreign collaborations, acquisitions, joint ventures or franchising.

Key sources of Equity Financing

Under equity financing, these three stages are most of the times funded by two key sources of investors referred to as venture capitalists and angel investors. Let us look at each of those in brief.

A) Angel Investors

Angel Investors, also called Business Angels, are wealthy individuals or virtually invisible groups of wealthy investors who are interested in investment opportunities by providing equity financing to all types of startup or business ventures.

Angel investors usually exist in the informal risk capital market. They provide capital to big and small entrepreneurial ventures, needed at all stages of financing, especially the early stages. Since the first stage is the most difficult to obtain for a new entrepreneur, angels invest during the Seed Round or the Startup or Series A round. Angel investors are relatively active in financing the seed round and startup round of funding, but are not restricted to financing other rounds as well.

B) Venture Capitalists

Financing through venture capitalists has gained popularity over the years. Equity financing is difficult to secure for small businesses, new startups and private middle market companies.

Venture capitalists are investment companies or individual investors who specialize in financing new startups or business ventures that are high potential, and sometimes technology oriented.

How does valuation work?

The three vital factors for any business are "Financing", "Production" and "Marketing", The first rated as the most important of the three factors is "Financing" because without money one can do nothing. Thus for success in business "Finance" is the most vital element. An entrepreneur before acting upon his vision/idea should be able to answer the following three questions very clearly:

1. What is the quantum of money required?
2. What are the available sources to generate such monies?
3. What is the timeline in which such money needs to be made available?

An exhaustive statement of various assets that an enterprise will require will be a good estimation of the money needed. Let us understand how equity and valuation play a key role in financing for startups.

Example:

Stage 1:
> *Think that your "to be business" is a pie. You got a business idea and did some research on it and strongly felt that it could be a great business opportunity. Right now, you own the whole business*

Stage 2:
> *You thought you would want to start building upon your idea or form a prototype, but you donot have all the knowledge and expertise to give a practical shape to your business idea. You know a friend whom you trust and who could possibly help. First, you think of hiring him but then you realize you do not have the money to give him a salary. You think maybe you can tell him that he can own some part of the business when it starts. You do not know how much to offer him. Do you think it is maybe 15%? This would mean that whatever profits your business would make, your friend would get 15% of it. Your friend thinks that it is too less because he is taking a risk. He is choosing to not make any money right now and work using his knowledge and skills. He is also choosing to devote all his time and wait until he can make some money. He offers to be a co-founder or partner in your company by owning half the business. You first think that is too much because the idea was yours originally. But then you realize it is of no commercial value right now and you might not be able to move forward without someone else's skills, knowledge, and expertise. So, you choose to split the business and give him 50%*

Stage 3:
> *You and your co-founder start creating value by giving your idea a more realistic and concrete form and by doing one or two market tests. Now, you have some evidence to prove that there is a market out there for your solution. You feel you need some cash to make your final product. You also feel you might want to get some advice and support from industry advisors could help you push your business forward. You come across an "incubator and accelerator center" in your city.* **Incubators are centers or companies that help start-up companies to develop their business by providing office space, training, mentoring, advisory services, technical support and facilitating finances.** *You contact the center and pitch your*

startup idea to them. You look at your financial projections and see how much your company is going to make. You look at your start-up costs and see how much you need. They think your startup is worth Rs.1000. They offer you Rs.50 and office space in their center as well as connect you to some industry experts.However, in turn, they want to own a part of your company. Now, it is time for you to make a decision. By offering the center some part of the business, you will lose more control as you did when you partnered with your friend. But you need the money and maybe it is wise to lose some control to get that money because you still would earn a lot of money later. So, after discussing it with your co-founder, you decide to take the money and give some part. But, how do you know how much to give to the center? One way to determine it would be to: Look at how much they are offering: Rs.50
Figure out what the value of your business would be after you get the money: Rs.1050
Divide the offer by the value to determine the stake: 50/1050 = 4.76%

You close the deal with the incubator by giving them a stake of 4.76%. Let us see how your pie looks now.

Stage 4:

You and your team have successfully created the final product and taken some pre- orders as well. Maybe it is time to get your business off the ground. However, you know you are going to need more money to fulfill those pre-orders. **You meet an affluent individual called an angel investor who started and is successfully running his own company now.** *He thinks that your business can be valued at Rs.2000 and offers to give you Rs.250 as seed funding. But in exchange, he wants to own a part of your company.* **Seed funding is an initial form of funding a business needs, usually after a product launch.**

Look at how much they are offering: Rs.250
Figure out what the value of your business would be after you get the money: Rs.2250
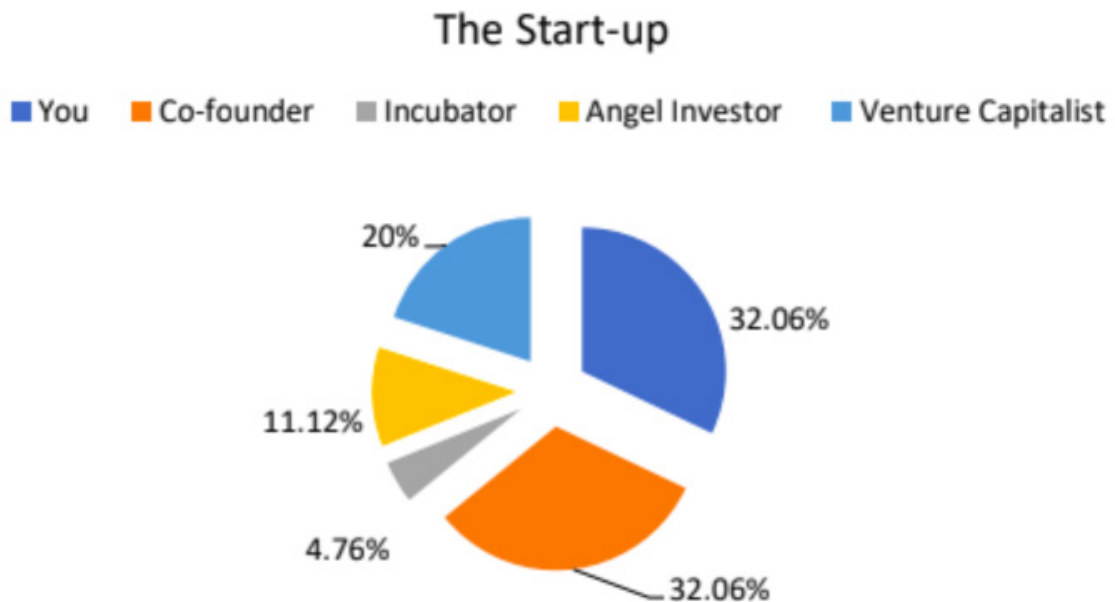*Divide the offer by the value to determine the stake: 250/2250 = 11.12%*

Stage 5:

You have made a decent number of sales, built a small team, and are looking at growing your business now. To scale up your business, you need more money because that would mean more assets and more people. This is where the so-called "Venture Capital Firms" come in. These firms do the work for you. These firms usually provide funding after they see that your start-up has made sales and has the scope to grow. Start-ups have multiple rounds of funding from Venture Capital firms with the first round referred to as the Series A round. So, you finally are looking at scale now and you get in touch with a Venture Capital firm. They think your start-up can be valued at Rs.4000 and offer to give you Rs.1000. Now it is the bigger decision. If you take the money you are going to lose some stake in your company. With any kind of investor comes control. They are going to be owners too and will have equal say in what the business does as you would. This is when you have to understand that you take the money only if the investment is necessary. You might lose some control, but with every investment, your business becomes bigger.

Look at how much they are offering: Rs.1000
Figure out what the value of your business would be after you get the money: Rs.5000
Divide the offer by the value to determine the stake: 1000/5000 = 20%

The Start-up

■You   ■Co-founder   ▥Incubator   ■Angel Investor   ■Venture Capitalist

20% — 32.06%

11.12%

4.76% — 32.06%

Debt Financing

Debt Financing refers to borrowing money or taking a loan which has to be paid back at a point in time in future along with interest. Typically, debt financing requires some asset e.g. piece of land, house, equipment, car, etc. be used as a collateral, against the release of loans and is also referred to as asset-based financing.

Debt-financing is a financing method involving an interest-bearing instrument, usually a loan, the payment of which is only indirectly related to the sales and profits of the venture.

Sources of Debt Financing

1) Public Deposits: Raising funds through public deposits is a way of financing where the general public deposits its savings with a company, for a period not exceeding 3 years (36 months) at the expected interest rate that is usually higher than the rate of return on bank deposits. These depositors play the role of creditors, with no say or rights in the management of the company

2) Debentures: A debenture is a written document or instrument that acknowledges a debt, mentioning provisions about the repayment of principal amount and the payment of interest at a fixed rate. In other words, it is like a certificate issued by the company with a sign and seal, acknowledging the loan, its repayment and its expiry. Debentures help to secure financing for the long term.

3) Loan from Bank: Commercial banks, give out short term, medium term and long-term loans to businesses of all sizes. Some of the ways it does this, is by:

a) Loans and Advances: A loan is advance money or capital given to a business, against a collateral, for a specified period of time. The borrower is usually given the entire amount, either in lump sum or in installments, in cash or by bank transfer, where a fixed interest rate is charged on the loan.

b) Demand Loans: Demand loans are the loans provided by banks against the security of Life Insurance Policies, Fixed Deposits Receipts (FDR), Government Securities etc. The bank can demand these loans back at any time by releasing a notice to the borrower.

c) Term Loan: Term loans are one of the most common types of loans given by banks. They are given for a predefined fixed period of time, where the borrower can repay them in quarterly, monthly, half-yearly and annual installments. These loans help companies to purchase assets, machineries, equipment, trucks etc.

d) Overdraft: Under overdraft, an arrangement is made where the bank gives permission to the borrower to overdraw money from his or her account upto a certain limit for a predefined or agreed period of time, where an interest is charged on the overdrawn amount. For this, the borrower must have a current account with the bank. Overdraft is allowed either on the borrower's personal security or on security of assets.

e) Discounting of Bills: Discounting of bills is an arrangement where the bank encashes the bills of the borrower before they become due for payment. For discounting of bills, a nominal amount called discounting charges is charged by the bank. In this, the bank can also recover the amount from the borrower in case the bill is dishonored.

f) Factoring: Similar to discounting of bills, factoring is a financial service which is rendered by the specialized person known as a 'factor'. This person has experience dealing with realizing the bills receivables, book debts managing sundry debtors and sales registers of the commercial and trading companies. The factor acts as an agent for a commission called commercial charges or discount. Factoring is basically the sale of accounts receivables to a bank or financial company or anyone else.

g) Cash Credit: Cash credit is similar to overdraft, where the bank allows borrowing upto a certain limit, where the borrower can withdraw the money credited as and when required.

4) Loans from Financial Institutions: Financial institutions provide finance for setting up of industries in backward areas, develop investment markets and for facilitating technical assistance to industrial units.

5) Loans from Specialized Financial Institutions: There are some specialized financial institutions that mainly provide long term financial assistance, technical help, guidance & knowledge to entrepreneurs

Quiz:

1) Which of the following factors does the "price" depend on?

a.　　Fixed & Variable Cost

b.　　Cost of Production

c.　　Competition

d.　　All of the above

2) Name the Pricing Strategy where Rs. 999 is charged instead of Rs. 1000

a.　　Psychological Pricing

b.　　Product Line Pricing

c.　　Bundle Pricing

d.　　Optional Pricing

3) Name the pricing strategy where initially the prices are kept high and then lowered to grab a wide market?

a.　　Cost Based Pricing

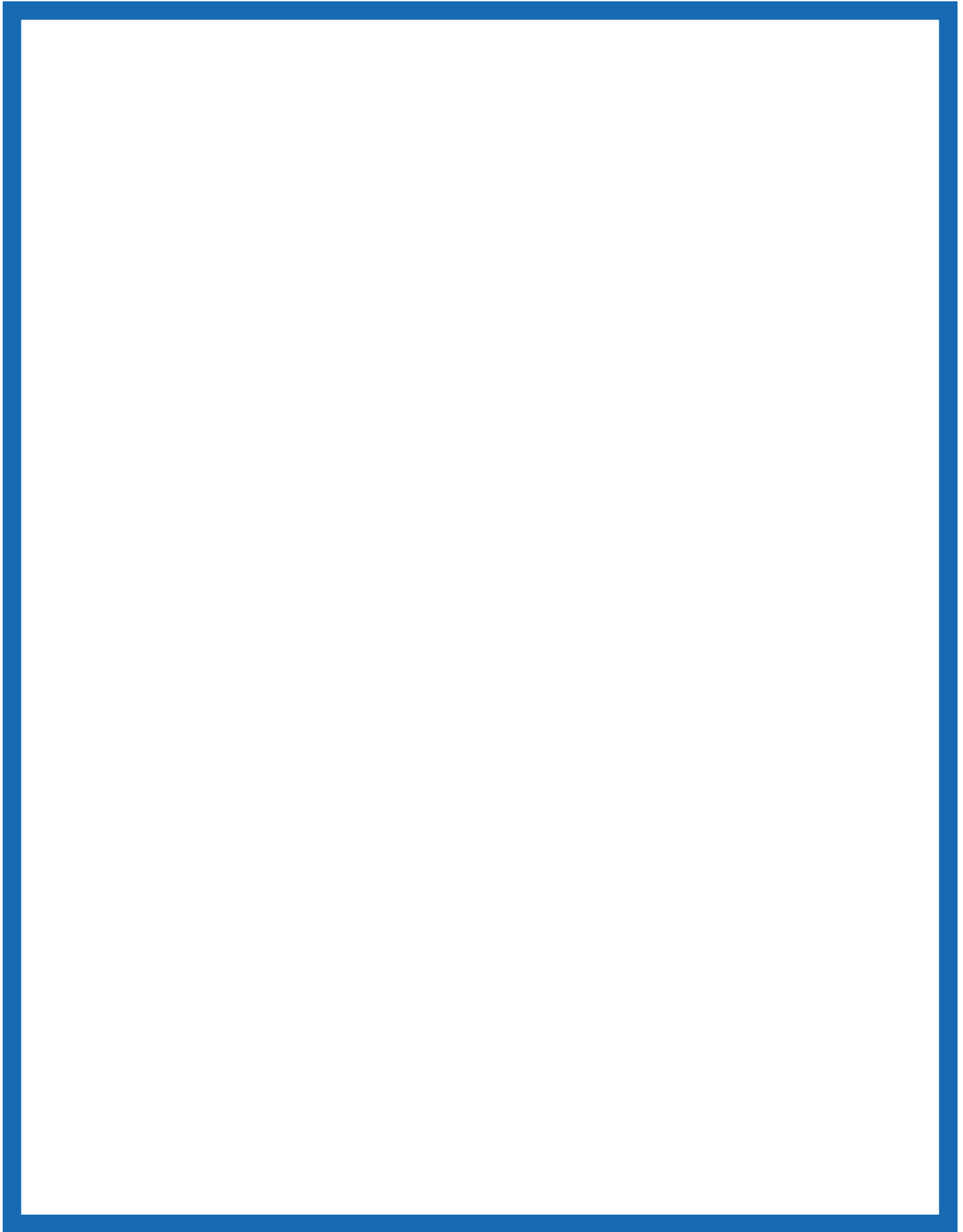b.　　Penetration Pricing

c.　　Variable Pricing

d.　　Skimming Pricing

4) Which among the following is a source of Debt Financing?

a.　　Loan

b.　　Debenture

c.　　Factoring

d.　　All of these

5) Who are Angel Investors?

a.　　Group of Wealthy Investors

b.　　Venture Capitalist

c.　　People who manage the startup

d.　　None of the above

Ans: 1-d, 2-a, 3-d, 4-d,5-a

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Session 76

Creative Problem Solving- Entrepreneureship

Pitch Prep

Lesson Plan
A teachers objectives for what
students should accomplish
and how they will better learn the
material.

Pitch Prep

What is a Pitch?

Being able to share about your business in a concise and interesting way
is extremely important. An "Elevator Pitch" is a concise, planned, and well-
practiced description about your business that anyone should be able to
understand in a limited period of time. It requires a significant amount of time,
thought and practice to craft the pitch. The pitch can range from a minute to
three minutes. It is one of the most essential tools for an entrepreneur as it
helps to stay focused on the business opportunity and practice presentation,
organization and preparation skills. The goal of elevator pitch is to present
a business opportunity. Thus, the focus is on making it clear and simple.
Considering this goal, think about what questions someone can ask you about
your business. Try to answer these questions in your elevator pitch. Some
questions that can be asked are:

- What is the problem?
- How is your business solving it?
- Who is going to get the benefit?
- How are you making money?
- What is the supply side of your business?

Elements of a Pitch

Let us see what areas can be covered in the elevator pitch and how it can be presented:

The Hook

Open your pitch with a hook. This could be a question or a statement that would make people interested in what you are going to say next or grab their attention or make them resonate in a way that says "Yes, I have heard about that problem before". It is important to not only capture the attention of the person you are speaking to but to also gauge how interested they are. If people seem very interested in learning why the question was asked, you can tailor your answer to meet their interest level. The hook should be simple. It should make your business opportunity seem exciting.

The Problem/The Need

- What is the problem or the need?
- How is it an opportunity?

The Customer

- Who has the need or faces the problem?
- Who is your target market? How big is the market?
- What are the growth prospects for the market?

The Solution

- What is your product or service?
- How is it solving the problem or the need in a unique way?

The Competitors

- Who are the other players in the industry?
- How is your solution different from your competitors?

Call to Action

- When do you plan to launch and how many people are there in your team?
- What can the audience do to help you get started?
- What is your financial requirement to start?
- What are you looking for to launch your business?

An elevator pitch must cover all these areas in a very short span of time. Before you create your pitch, you should be sure about who your audience is. In a casual setting, probably at a conference or mingling with new friends, you might not want to get into the details of the competition or ask for a call to action. Whereas, when you share your idea with investors, banks or friends and family, who could be sources of funding, you might want to have a different approach and presentation style. For professional investors, finances are extremely important. You have to tell them everything about how your business is going to make money. For the bank, you might want to pull out a financial statement or a competitor analysis when asked to present the details and the assumptions of your financial projections. When presenting to investors, accelerators and incubators in a formal setting, you might want to have some form of presentation of your business idea such as the physical product itself or slides, along with your pitch.

The Do's and Don'ts for a Pitch

Presenting and communicating so much information in just one to three minutes can be tricky. Elevator Pitch is like a sport. The more you practice the better chances you have of doing well. The only way to perfect your pitch is to practice a lot and take feedback from some industry people as well. Let us now look at some do's and don'ts of pitching

Must Do's:
- First impressions matter. A few things to remember when pitching formally is to be dressed professionally and be energetic
- The pitch has to be engaging. Start your hook like it is a story. You might want to quote an incident or play a short video or an audio to give a hint of the problem.
- Emphasize on the customer problem. This goes back to the problem your business is solving. It is a problem but tell the audience why it is a problem.
- Be passionate and enthusiastic. Remember what was the first thing we learnt? An entrepreneur is passionate about what he or she does. This passion needs to be shown and communicated to people.
- Be natural. Yes, you would have practiced your pitch a number of times, but don't make it sound like that. Relax, be confident and just talk. Sometimes being funny and witty can make people remember what you said too.
- Be prepared. This is especially important when you are pitching to investors. Know everything about your business. Be prepared to answer any questions posed to you. Practice as a team

What Not to Do
- Yes, you have limited time and a lot of things to tell the other person but do not speak too fast. Take pauses so that you sound natural. Keep your pace natural.
- You might know all the business terminologies and jargons but keep that aside. Anyone who knows the language you are going to talk in must understand what you are saying. Keep it simple
- Don't show business plan details until asked to. Never show any detailed financial statements or business analysis in a pitch. Keep it in the appendix so that you can pull it out when an investor or a banker wants to look at the numbers.
- Remember you are telling a story. Do not read your slides. Refer to them or make the audience connect with them when you are talking but do not read.
- Follow the time limit. Your elevator pitch would be allotted a specific time. It is important to not exceed this time limit.

Session 76

Handout
A Handout is written material given to inform or provide students with additional information.

Scoring sheet:

Use this table to record the scores and feedback for other teams that are presenting their business pitch.

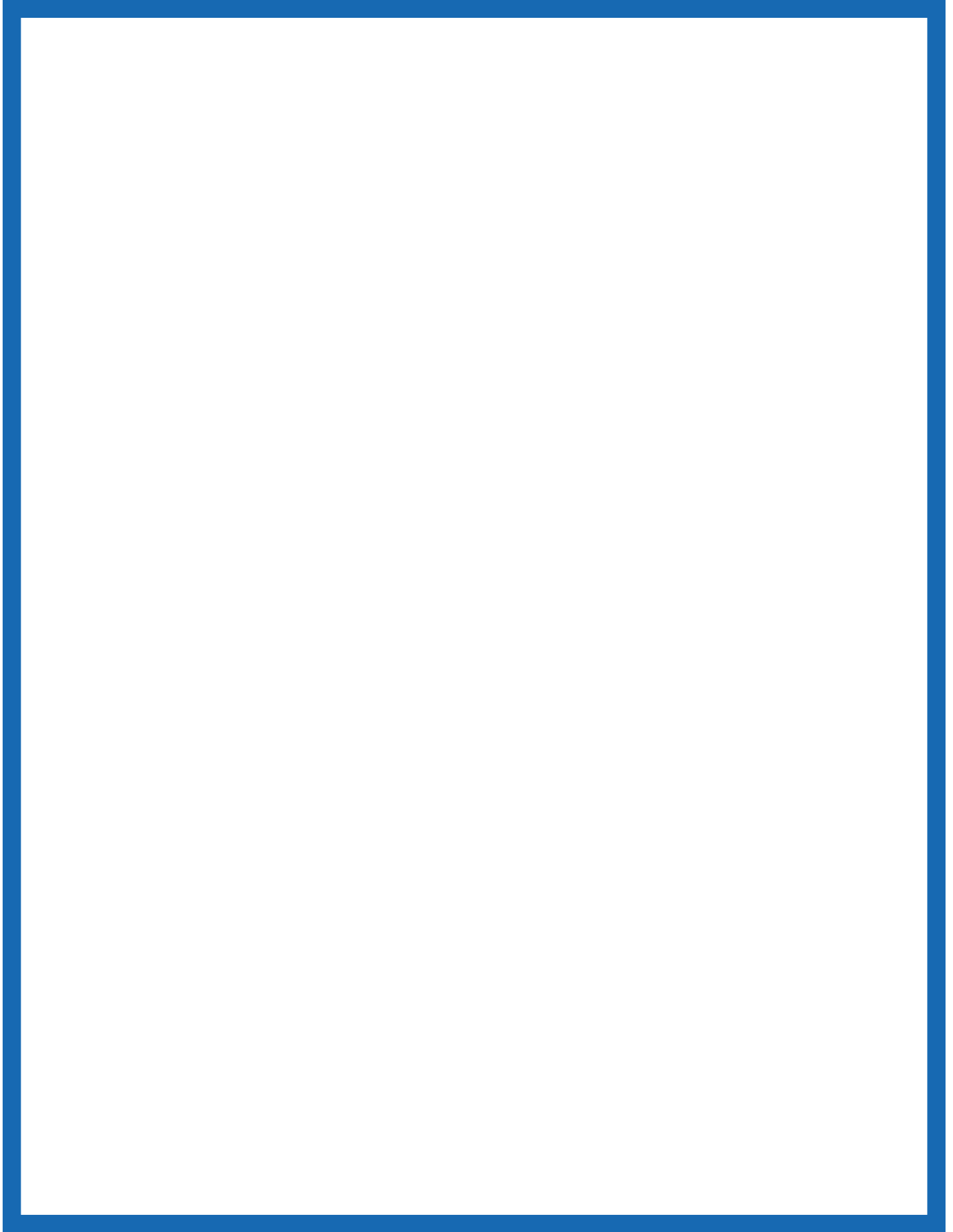| Team Name	The Hook	The Idea	The Prototype	The Revenue Model	Presentation & Communication Skills	Total	Remarks and Suggestions

Rating scale:

Accomplished satisfactorily: 4
Need some improvement: 3
Need major improvement: 2
Unsatisfactory performance: 1

SUSTAINABLE DEVELOPMENT **GOALS**

United Nations Development Programme (UNDP)
Post Box #3059, 55 Lodhi Estate
New Delhi - 110003, India
Tel: +91-11-46532333
Fax: +91-11-24627612
Email: info.in@undp.org
Website: http://www.in.undp.org