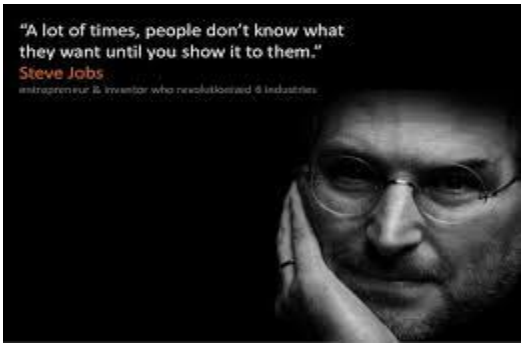
UNIT IV

PROTOTYPING AND TESTING

"People don't know what they want until you show it to them"- Steve Jobs.



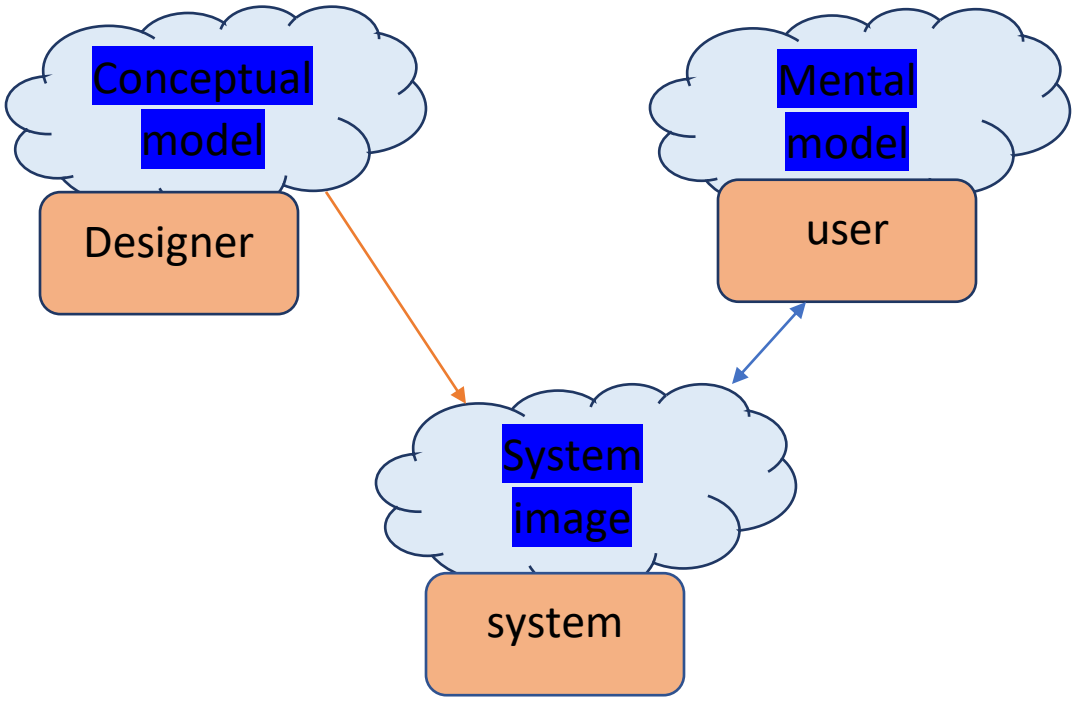
Prototyping is the shorthand of innovation.

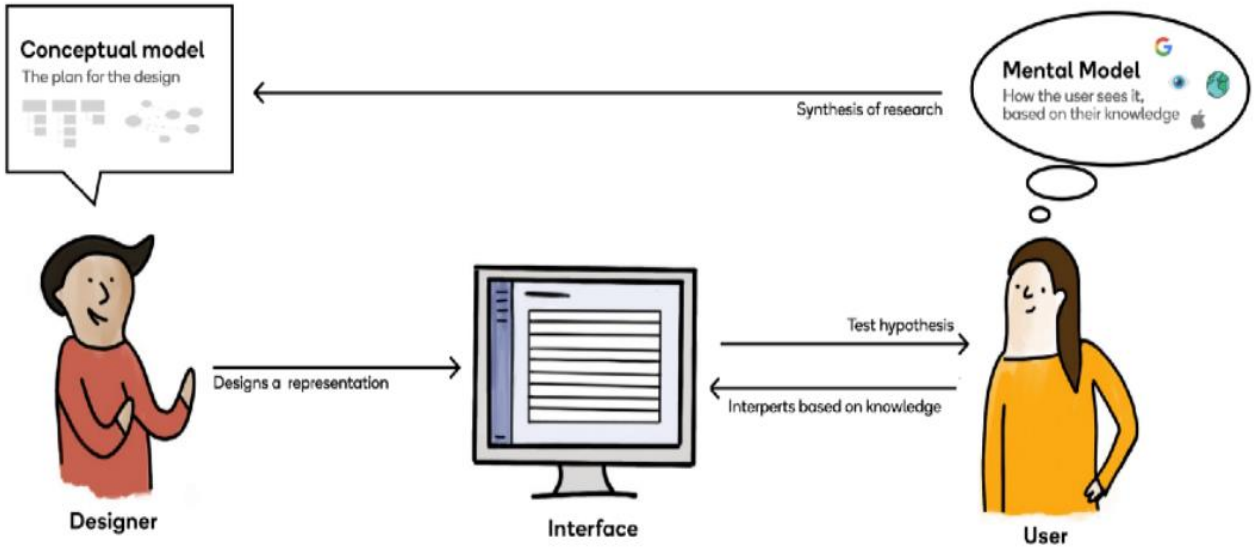
3.2. ConceptualModel and Conceptual Design

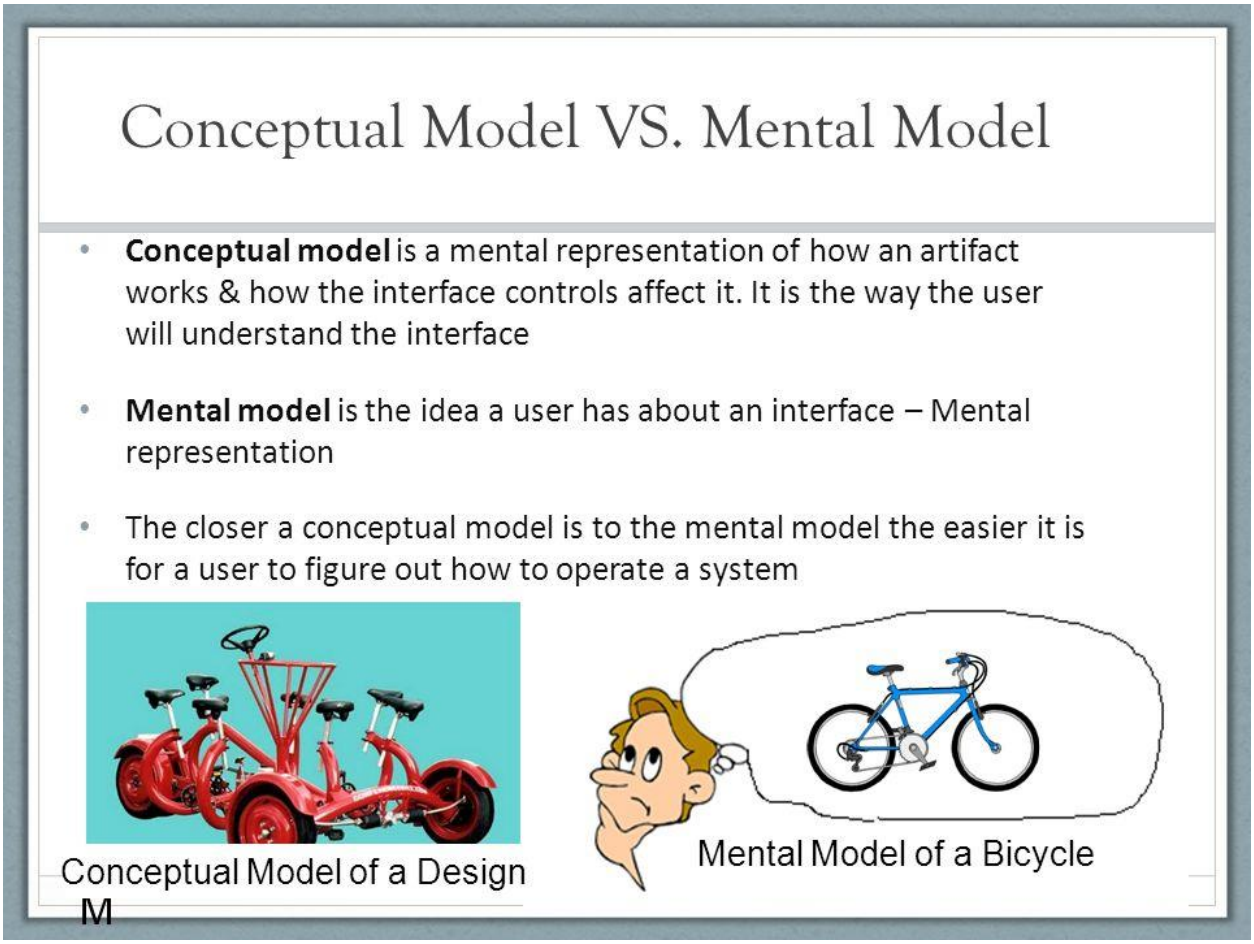
*******A conceptual model is created by the designer as a high-level plan for how the product/service will work and fit together********

- Conceptual design is an early phase of design.it is the very first stage of the product/service process, where drawings and other illustrations or models are used.
- It serves to provide a description of the proposed product, in terms of set of integrated ideas and concepts about what it should do, behave, and look like in a way that is understandable for users.
- It is the design of interactions, experiences, processes, and strategies and is the point at which people, knowledge, product, services, processes and profitability meet vision and endless possibilities each acting as a distinct color on the canvas of the designer.
- It is grounded in more abstract thinking until a detailed design is ready to be created.
- Concept model=the foundation of the interface, different users' interfaces could be built upon it.

- Interface design translates the concept models into things people can see and interact with.it involves design choices but must stay faithful to the concepts and terminology of the concept models.
- Conceptual design is:
  - Designing systems so users can understand them.
  - Assisting the user to build useful metal models.
- Interface Design is:
  - Representing the conceptual model to the user







********** the concepts that designers as word-sense are defined in terms of clear, typical, central cases called prototypes*********

3.2.1. Definition:

A prototype is a draft version of a product that allows designers to explore ideas and show the intention behind a feature or the overall design concept to users before investing time and money into development.

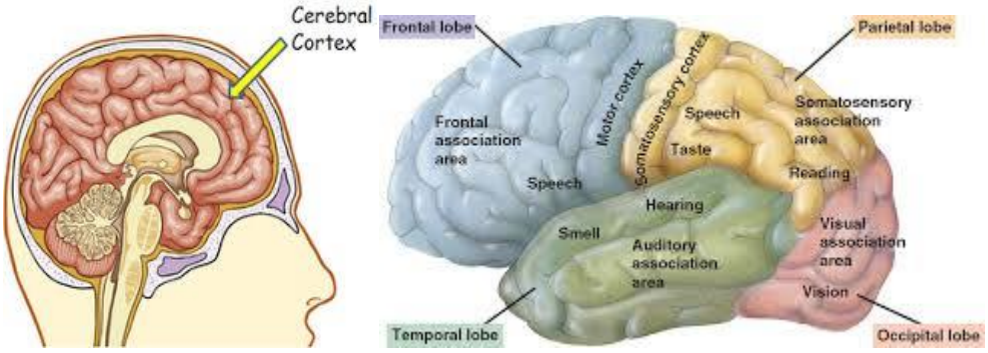
Or

Representation of Conceptual design for users and designers, and other stakeholders to interact with

Or

A prototype in Design Thinking is **"A simulation or sample version of a final product, which is used for testing prior to launch."**

- The Goal of a prototype is the test products and services then its ideas before spending lots of time and money into creating the final version of the sellable product.
- The word "prototype" comes from the GreekPrototypos, a compound of protos("first") and typos("mold, "pattern", "impression")
- Prototypes are one of the most important steps in the design process, yet it is very confusing to create and execute.
- A prototype can be almost anything from a series of sketches representing different screens of the final version of pixel-perfect product.
- Prototypes play a major role in solving the usability issues before the launch of the product.
- The prototype stage is when designer create a model designed to solve user's problems or validate ideas can test in the test phase of the process.
- Prototyping helps designers to unveil and explore these human needs, opening the door to insightful interaction and more empathetic design solutions.
- Human Beings are Highly Visual. in fact, 30 percent of human cerebral cortex is devoted purely to vision.



- When human being(user) can view the prototype, then it understood all the processes involved with the product, especially areas of contention for future testing, then prototype comes to life.
- In this phase, the idea selected at the best is expanded into a design concept.
- It must be clarified how the idea can be visualized and in a particular made tangible to test it and with the customer.
- According to the rules" **Be visual and make it to tangible**" and" **fail early and often**", the idea concepts are to be visualized as quickly as easily as possible are made tangible and comprehensible to test the effect of the customer and to learn from positive or in a particular negative feedback.
- Based on Idea concept, it must be clarified which visualization and prototyping techniques should be best be used
- As a first step it must be clear which goal is to be pursued.
  1. What do you want to learn from the customer/ users with the help of surveys interviews, observations, prototype test, pilot applications?
  2. How uncertain are the results?
  3. What can you not experience?
- The time and cost budget are also a factor to consider when selecting visualization and prototyping techniques.

- Even the most experienced design thinking teams cannot design the optimum solution on the first trial. Good design is a result of several iterations.
- Iteration is a cycle of doing something, testing it, improving it, and protecting it. The most efficient method of iterative design is prototyping.
- In general, the design teams have identified vetted solution concepts that are worth bringing farther along the design path.
- Solution concepts need stakeholder feedback as early and as often as possible in the design process.
- Prototypes are the most effective means by which stakeholders can understand what the design team intends.
- Prototyping as a creative tool requires the design team to clarify a solution concept's intentions and make decisions regarding what the concept is and is not.
- By being forced to shape the solution concept into something that can be experienced, constraints and dependencies of logical flow, time and space, human dynamics, and other principles and conventions force concepts to transform into designs.
- Prototyping causes the solution concept to evolve before the first stakeholder encounter.
- In prototyping stage three things are mainly taken care of
  1. Creation of experience
  2. Getting Feedback
  3. iteration

- The step of prototyping is the one in which the end user comes into picture. The end user is actively involved in this component of design thinking.
- All the feedback is taken from the customer, and based on the criticisms, suggestions, and appreciations received, the design thinkers create a better solution after iterating the process of design thinking's first three steps, viz. Empathize, Define, and Ideate.

- Prototyping requires thinkers to create tangible products, which can be small-scale models.
- One of the best ways to gain insights in a design thinking process is to carry out some form of prototyping.
- Prototyping involves producing an early, inexpensive, and scaled down version of the product to reveal any problems with the current design.
- Prototypes are often used in the final, Testing Phase in a design Thinking process to determine how the users behave with the prototype, to reveal new solutions to problems, or to find out whether the implemented solutions have been successful.
- In prototype stage the design team produces several inexpensive, scaled down versions of the solution.
- In this stage it is recommended to share prototype within the design team and if possible, with a wider audience.
- In this stage designers accept, improve, and re-examine or reject solutions based on the user's experience. Though this process, the design team will be better able to tell how a real user would behave, think, and feel when interacting with the learning solution.

- In this stage, designers move from the abstract idea to a more tangible product.
- Think about prototypes as primitive forms of what you envision the final product to be.
- A drawing something pulled together on paper, a digital representation or even a prototype printed by a 3D printer can all serve as an adequate example of the product that designer imagined.
- Think of open questions that the user can shoot towards designer when he experiences the prototype.

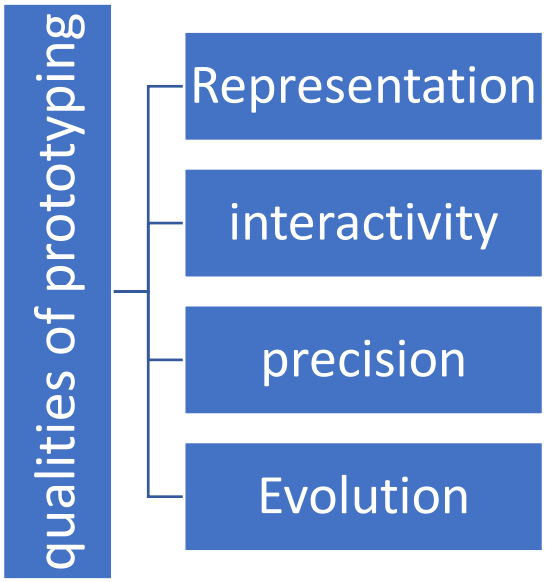
3.2.3. Why prototype:

- Communication &discuss ideas with stakeholders.
- Develop requirements and /or specifications.
- Learning and problem solving
- Evaluate interface effectiveness for communicating conceptual models.
- Further Develop conceptual and physical design
- Save time and money.

3.2.4. Four Qualities of Prototyping:

The Qualities of prototyping are:

Representation	This form of the prototype is mainly structured for presentation and keynote uses. That may be a paper-pen, digital or code
precision	The fidelity of the prototype is defined here. It explains the level of details, realism, and final design. Such as Low-fidelity and high-fidelity.
Interactivity	The functionality opens for the user. i.e fully functional, partially functional or no interactions at all
Evolution	The life cycle of the prototype. some are built to re iterate and re-iterate until it is precisely done, and some are just designed and thrown it away after the certain outcome is made.



- A prototype is one manifestation of Design that allows stakeholders (users and designers) to interact with it and to explore its suitability.
- "A prototype is an early sample, model or release of a product built to test a concept or process.it is a term used in a variety of contexts, including semantics, design, electronics, and software programming----Wikipedia.

3.2.5. Primary Guidelines for Prototyping:

- ❖ Take the first step and start to build the prototype. Do not procrastinate.
- ❖ Do not waste too much of time on building a single prototype.
- ❖ The prototypes must be built with the end user in mind.
- ❖ The prototype must not be a mere piece of trash; it must create an experience for the user.

Difference Between Sketches and prototypes:

Sketch	prototype
suggest	Describe
Explore	Refine
Question	Answer
Evocative	Didactic
propose	Test
Provoke	Resolve
tentative	Specific
Non-committal	Depiction

Prototypes take many forms:

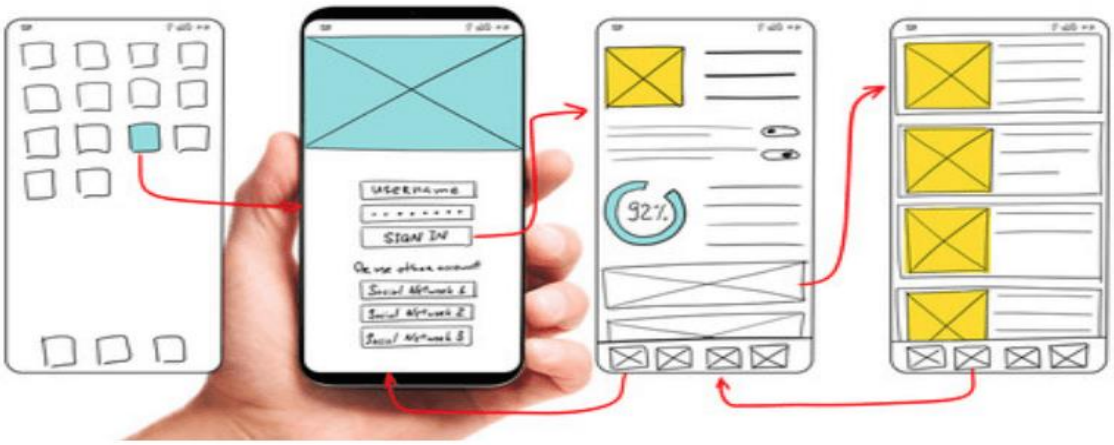
- ❖ Paper
- ❖ Cardboard
- ❖ Foam
- ❖ Software
- ❖ Video
- ❖ Clay
- ❖ Website
- ❖ Sketches
- ❖ Scripts
- ❖ index cards

3.2.6. Types of Prototyping:

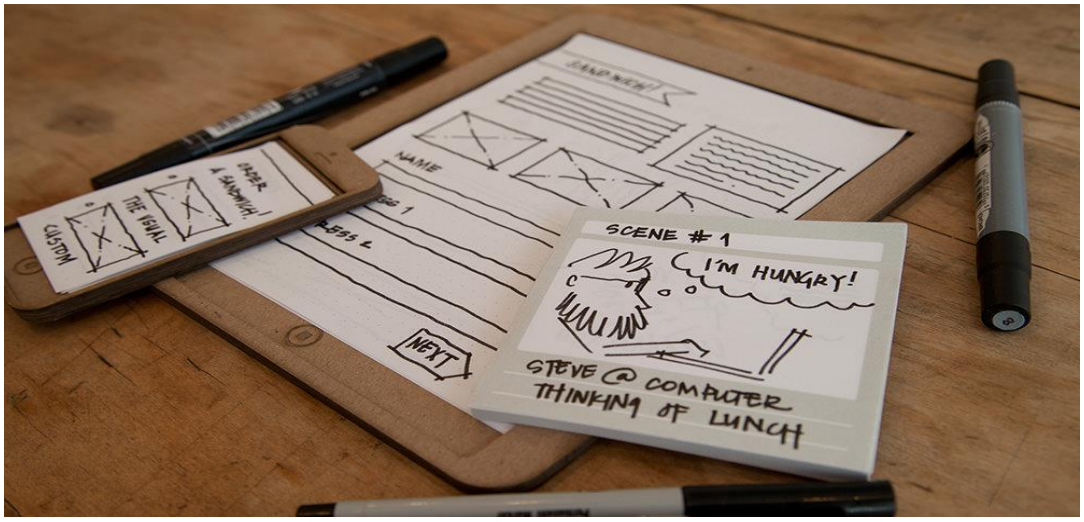
- Prototyping does not have to be time-consuming, expensive, or difficult.
- Different fidelity levels allow designers to come up with solutions quickly.
- Fidelity means the level of details, functionality, or interactivity that a prototype has.
- "Fidelity" can be a defined (according to Oxford Dictionary) as "the Degree of exactness with which something is reproduced."
- In other words, a prototype's level of fidelity answers the question, how precisely does this present the final solution.
- Prototypes are of two types.
  (i) Low- Fidelity prototype
  (ii) High-Fidelity prototype

Low-Fidelity Prototyping:

- Low-Fidelity prototypingis intended to provide designers with Basic model or example of the product that requires testing.
- With a low-Fidelity prototype, it is likely going to be incomplete or utilize a limited number of its intended features.
- The low-fidelity prototype-Known as **low-tech**, **low-fi** or **lo-fi** prototype, is a semi-finished prototype that focus on function, structure, process, and provides the simplest framework and elements of web/app.
- It can even be constructed using materials such as **wood, paper**, and **metal**that are not intended to be used for the finished article.
- Low -Fidelity prototypes are usually simple and in-expensive ways to communicate, explore and modify ideas in the early stages of developments and their purpose is to support and provide answer to the question of the designers.
- Low -Fidelity prototyping is used generally show the overall shape of the design idea and the primary functionalities, which are required to work fully but rather serve as the proof of concept and to help generate insight about the final look.



- Typically speaking, when design a low-fidelity prototype it can be inexpensive, quick, and simplified version of what the final product will be.
- Low-Fidelity means that the prototype does not have a lot of detail, no images, or colors.
- Instead, it uses placeholders for images and text, but shows the flow and functionality of a solution.
- It is often used to translate design ideas into testable and tangible artifacts for collecting and analyzing the user demands at early stage.



- Building a low-fidelity prototype is very helpful for exposing the idea for user feedback and finding major issues that need to be fixed the early stages of design when re-designing cane be cheaper and quicker

Advantages of low fidelity prototypes:

- **Low cost**: The cost of low Fidelity prototype is extremely low.
- **Fast:** Without focusing on every interface detail, designers can just follow their design ideas and create a simple and testing product within a few minutes
- **Easy to demonstrate, co-operate and iterate**: Without too many details, hello why prototype does not require money professional skills. And more people can join and collaborate on the same project it is also easy for designers to make changes and iterate the prototype during the calibration.

- **Easy to get feedback**: Since a low fertility easy to carry and demonstrate designers can also directly share it with other people to collect design feedback.
- **Easy to detect and tackle potential issues**: A low Fidelity prototype also allows designers to test use flows, interactions. It is good for designer to detect and tackle potential issues quickly.

Disadvantages of low-fidelity prototyping:

- **Uncertainty during testing.** With a low-fidelity prototype, it might be unclear to test participants what is supposed to work and what isn't. A low-fidelity prototype can often require some imagination from the user, typically based on a scenario that the research team has written in advance, limiting the outcome of user testing.

- **Limited interactivity.** It is impossible to convey complex animations or transitions using this type of prototype.

High-Fidelity Prototyping:

- The fidelity of the prototype refers to the level of details and functionality built into a prototype.
- In this sense, a high-fidelity (sometimes referred as high-fi or hi-fi) prototype is a computer-based interactive representation of the product in its closest resemblance to the final design in terms of details and functionality.
- The high in high-fidelity refers to the level of comprehensiveness that allows designers to examine usability question in detail and make conclusions about the user behaviour.
- High-fidelity prototypes appear and function as similarly as possible to the actual product.
- Teams usually create high-fidelity prototypes when they have a solid understanding of what they are going to build, and they need to either test it with real users or get final-design approval from stakeholders.

High-fidelity prototypes are designed to look and operate similarly to the finished product

Characteristics of high-fidelity prototypes:

Visual design	Realistic and detailed design — all interface elements, spacing, and graphics look just like the real version of the product
Content	Designers use real or similar-to-real content. The prototype includes most or all the content that will appear in the final design
Interactivity	Prototypes are highly realistic in their interactions

Advantages of high-fidelity prototype:

- **Meaningful feedback during usability testing*:*** High-fidelity prototypes often look like real products to users. This means that during usability testing sessions, test participants will be more likely to behave naturally — as if they were interacting with the real product.

- **Testability of specific UI elements or interactions*:*** With high-fidelity interactivity, it's possible to test graphical elements like affordance or specific interactions, such as animated transitions and micro interactions.

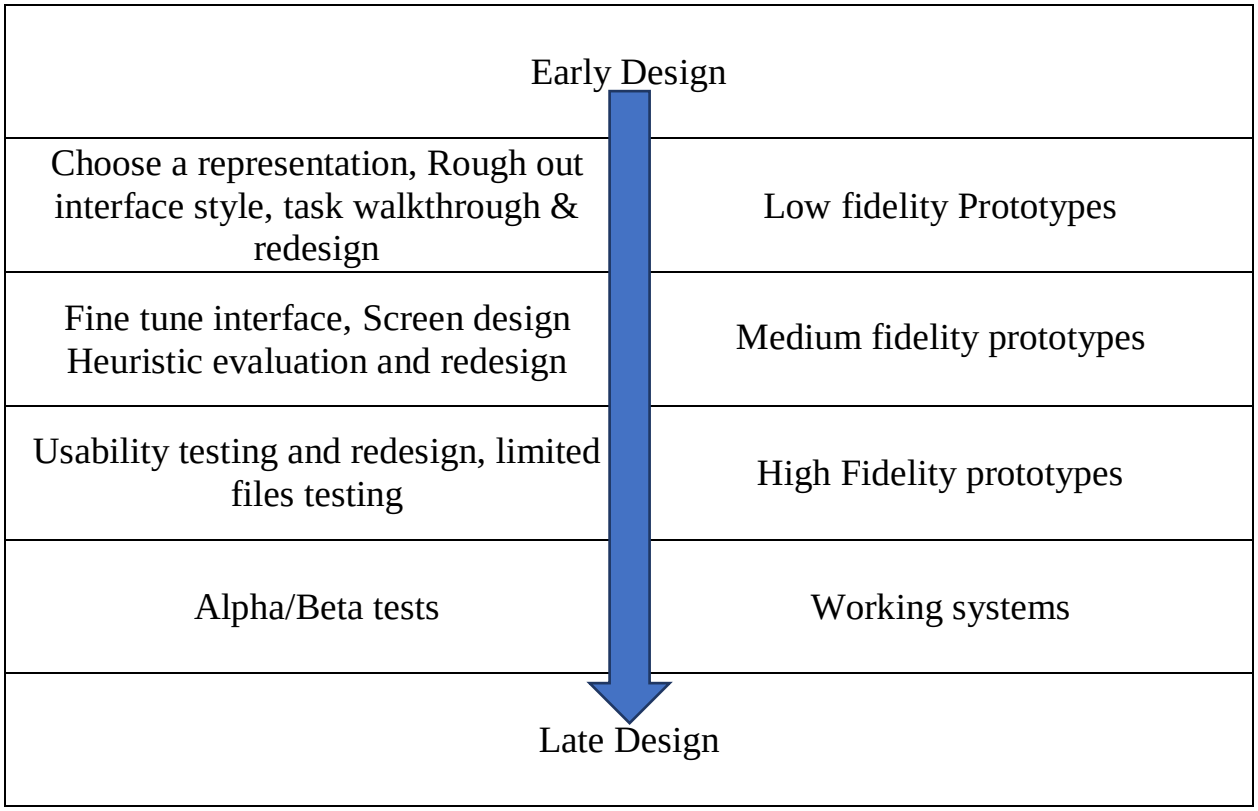
- **Easy buy-in from clients and stakeholders:** This type of prototype is also good for demonstrations to stakeholders. It gives clients and potential investors a clear idea of how a product is supposed to work. A well-crafted high-fidelity prototype gets people excited about your design in ways a low-fidelity, bare-bones prototype cannot.

Disadvantages of high-fidelity prototypes:

- **Higher costs.** In comparison with low-fidelity prototypes, creating high-fidelity prototypes implies higher costs, both temporal and financial.

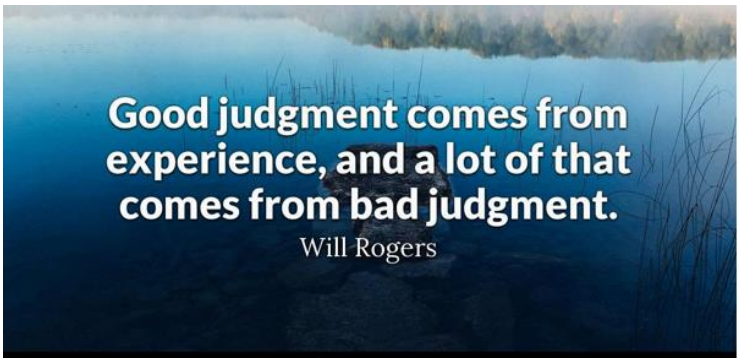
- **Timing and misunderstanding.** Presenting or demonstrating high-fidelity prototypes early in the design process can sometimes become a distraction for stakeholders. A discussion on functionality can quickly derail into an argument about a missing period, so it is important to consider where the team is in the design process.

When to use Different types of prototypes?



Testing

"Good judgement comes from experience. Experience comes from bad judgement".



- The testing phase allows the designers to gain the feedback and insights that may not be possible without testing their prototypes.
- Through these tests, designers will be able to identify aspects of their prototype that did not work well, or the end user did not find the functional or pleasing.
- These failures give the designers the opportunity to fix and improve the aspects of their prototypes.
- However, failing can be difficult to accept for most of the designers. Not only does it make uncomfortable and insecure, failing can also be embarrassing, painful, and annoying and sometimes even anger.
- Despite, these designers overcome their fear of failure and embrace it as a learning opportunity.
- Time to try out new things, and innovate, even if this means pursuing the unconventional.
- In the testing phase, Design thinking teams tests prototyped solution with users representing the target personas.
- Update the solution in an iterative manner until the solution in an iterative manner until the solution satisfies the user needs and overcomes the challenges that is defined in the initial phase of the project.
- Design thinking team members should always appreciate user's Critiques of the solution.
- The critique is natural part of any effort, including Design.
- Design Thinking teams should regard the critiques of their solution positively and constructively.
- "The Customer is not always right but always having a point."
- In the testing, users have a bias towards evaluating a new solution according to its similarity to existing products with which they are familiar
- When designers asked to comment on the new solution, end users say "The old one was Better. I don't Know why, but it was better" -----Baby-duck Syndrome

- In human psychology, Baby duck syndrome is called the effect when a person, studying a particular area, considers the first object encountered from this area to be the best, and the subsequent ones to be the worst.
- Once the prototype is ready, test that with the users and let them go through the prototype.
- If it is the prototype of a product then let the users use the prototype.
- If it is a service prototype,then show the design of the new service /modification.
- It is to be cautious that the users should use the prototype on their own without any guidance.
- The user test is performed by the users or the representatives of the users testing by the users /customers will give us feedback about the working of the improved component that is added to the product.
- Testing a prototype is saving the cost significantly.
- There are multiple levels of testing among that usability is one of the tests.
- Usability is defined as the effort required to use any feature of product or service.
- e.g A vending machine or coffee machine is to make a cup of coffee.

- users have to put more effort to operate the buttons, familiar people will use it with ease, whereas the non-frequent users will struggle to operate the machine to get a cup of coffee.
- If more effort is required to use a feature, then the usability score will be very less.
- Feedback from this stage would be fed back to the define the stage to redefine the problem.
- The test report is especially important as this gives the input for corrections.
- The test report should have the following fields.
    - Feature code

- Test data
- Test case number
- The proficiency level of the user
- Result test case wise

❖ When selecting the appropriate prototype test methods for the hypotheses, designers should always ask which the simplest test is to perform to arrive at a certain conclusion.

❖ Before the designer start testing the prototype, think about the recording ways (voice recorder, camera etc) of the customer feedback. And which criteria want to use to analyze the feedback?

❖ The customer's statements on the following basic question are to be analyzed.

- What was positively evaluated?
- What concerns arose
- What was a surprising message/action from the customer?
- Did emotions come up with the customer, if so what kind of emotions?
- What suggestions were made?
- What insights and feedback do designer get for the idea concept?
- What can be learned from this?

❖ Prioritize the feedback. try to implement the feedback in the improved prototype.

❖ In addition to the improvement (or rejection) of the prototype or idea, customer feedback also results in possibilities for variants of the product or service ideas.

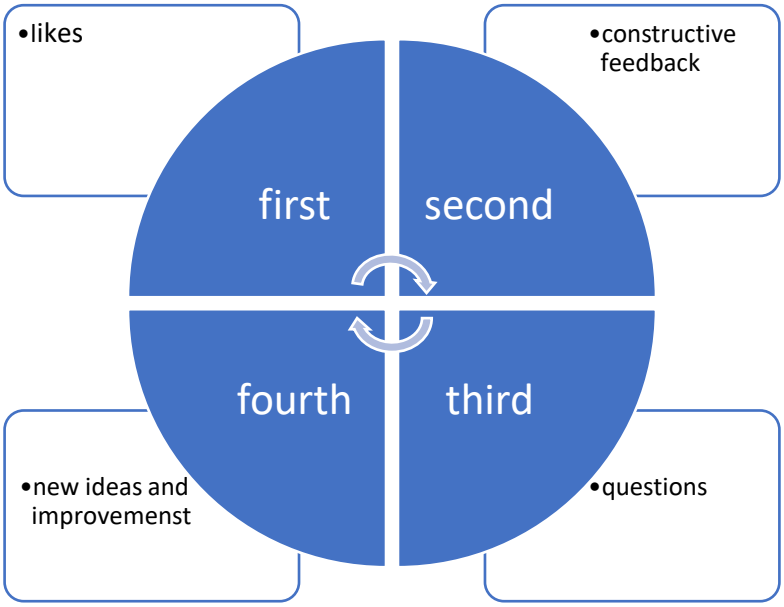
Tips for prototype testing:

- offer multiple prototypes for comparsion.in addition to the very promising ideas, designer can also deliberately create prototype for an idea that would exclude inefficiency.
- ask for feedback without comment. Each evaluation on designer part can influence the assessment of the customer.
- ask the customer to suggest or implement changes to the prototype.

Testing with End users:

- when designers test with end users, it is another chance for them to empathize and learn something new that could be used to refine their prototypes.
- Testing brings the focus back to end users to reveal hidden insights that the designers would have never foreseen without the end users experiencing their prototype.
- According to d.school there are four aspects that designers need to consider when testing with end users
    1. The prototype
    2. Context and scenario
    3. The interaction between the user and designer
    4. The process and method used to observe, capture feedback, and reflect.
- Before testing session, it was important to prepare the users for their interaction so that designers proceeded in in the right testing mindset.

- The testing phase requires designers to not get defensive about the feedback they receive about their prototype or justify the reasoning behind their design, but instead to be attentive to feedback and surprising insights.
- One of the methods the designers captured their observational findings and user feedback through a simple tool called FEEDBACK CAPTURE GRID.
- This grid consists of four quadrants.
- In the first quadrant, designers wrote down their users' feedback on what they liked about the prototype.
- The second quadrant contains the user's constructive feedback.
- The third quadrant contained the questions that arose during the testing.
- The fourth quadrant contained new ideas or improvements that emerged from the tests.



- This feedback tool helped designers be more intentional in what they were observing and the information they were looking to record.
- Using what complied in feedback capture grid, designers proceed back to the prototype phase to refine and improve their prototypes.

Classical Test Methods are:

1. Contextual Interview/ inquiry of Customer
2. User Observation techniques
3. Interviews on neutral location
4. Phone interviews
5. Video charts
6. Instant messaging
7. E-mails
8. Online survey
9. Focus groups/ customer Clinics/Usability-Test/Live testing

10. Eye-Tracking systems

Contextual interview:

- since most of the products or services are used individually, one-on-one interviews are usually more effective.

Tips for interviews

❖ where and how to find customer for the experiments?

- First try for physical meeting for eye-to-eye contact for understanding the customer emotions and thoughts
- Use social network (contact on Facebook, twitter, phone LinkedIn,) for the survey.
- Ask for recommendations for friends to friends (so called second-degree connections) to do this create redirectable mails with request.
- If designer do not have a clear idea of the exact target customers, start broadly, but focus on the potential target group as quickly as possible.
- Search for studies, news articles, reports about the target group, and collect statements, contacts data or other relevant information.
- With already existing, similar products or predecessor products, designer can address existing customers directly.

❖ How to formulate the right questions?

- avoid technical terms! speak in customer's language. Better something more colloquial than incompressible or misleading
- always concentrate on certain activities, events, or decisions in the past or present
- good questions are about the current situation of the customer and his previous experiences.
- Never accept or take anything for granted: Ask also if designer know the supposed reason or take something for granted.

❖ How to conduct interviews correctly:

- make the focus of the interview clear in advance so that designer can concentrate on it.
- Each interview should focus on the following aspects:
  (a) Statements on the concrete hypotheses (either in the sense of confirmation or nonconfirmation)
  (b) Surprising statements
  (c) Emotional statements (emotions expressed by content, choice of words, vocal pitch, gestures, or facial expressions. Emotions can show anger, worry, frustration, curiosity, or excitement)

- Do not conduct group interviews even if this seems very efficient.
- Avoid the concrete business ideas at the beginning.
- Pay attention to speech.
- Recorders should not be used for interviews with strangers.
- After the interview designer should always allow a little time for follow up to note down the most important results
- Designer can enter the notes electronically (excel, googledoc, notepads, index cards etc)
- If there are no clear answer patterns even in many interviews, then designer should take another critical look at the customer segment or revise the questions.

❖ Template for interview protocol for testing:

Source: according to Alvarez (2014) and with the addition of pauck/owen (2013)

<table>
<tr><td colspan="5">Interview protocol</td></tr>
<tr><td>Hypothesis(assumptions)</td><td colspan="4"></td></tr>
<tr><td>Interview conducted by:</td><td colspan="2"></td><td>At</td><td></td></tr>
<tr><td colspan="5">Information about the interviewee:</td></tr>
<tr><td>Name:</td><td colspan="2"></td><td>position</td><td></td></tr>
<tr><td>Gender:</td><td>Male</td><td>Female</td><td>Age:</td><td></td></tr>
<tr><td>Other characteristics traits: (work experience, leisure activities, usage habits etc)</td><td colspan="4"></td></tr>
<tr><td>Keywords of the key message:</td><td colspan="4">Notes:</td></tr>
<tr><td colspan="5">Summary:</td></tr>
</table>

Observation Techniques:

1. Drawings and design of models
2. Storyboarding
3. Storytelling/comics/Lego serious games
4. Body storming
5. Wireframes/Mockups
6. Website/Landing Page
7. Videos
8. Concierge MVP (Minimum Viable Product)
9. Wizard-of-Oz MVP
10. Open-source Prototypes
11. 3D-Rapid prototyping
12. Crowd Funding

Storyboarding:

- Storyboarding is a method, initially used by Walt Disney for cinema film production, which schematically visualize scenes of an action (hence also called visual storytelling) and summarizes dialogues or activities of person in a situation in a keyword manner.
- Storyboards can be used in Design Thinking to visualize customer activities during problem identification on the hand, and as a kind of prototype during the solution finding phase on the other, to obtain customer feedback.
- For the development of service offerings, storyboarding is a good opportunity for visualization.

Storytelling:

- Storytelling describes in a narrative form as a real (but also fictitious) story the vision/strategy, the benefits or use of an innovation or the success (best practices) or typical mistakes in innovation activities.
- Storytelling can be used as a kind of prototype test to illustrate an innovate idea to customers and to ask for feedback.
- The procedure for the creation of a story is like the creation of a communication concept in marketing or can be part of such a concept.
- First, the central message of the story (goal) should be defined, or the target group determined in amazingly simple words.
- the following questions need to be answered to create a central message.
    1. who is the target group for the message?
    2. why should this story be told?
    3. what should the reader /listeners/ viewers take with them?
    4. How will the reader/listeners/viewers benefit from the story?
    5. Is the message relevant?

6. what can the reader /listeners/viewers learn from it?
7. what should be the reader /listener/viewer think, feel of do after the story?

- To prepare the storytelling, relevant background information on these elements e.g interviews with the people involved in the story, must be researched, which is relevant in the broadest sense.
- Quotations of the personality can incorporate in the story.
- To better understand the role of the characters, the persona method or the empathy map can be used to prepare the story.
- The realization of the story can be realized as text, radio play or video or as a combination of these possibilities of various multimedia.

Supporting points on testing techniques:

- ❖ Most products /services are used individually, one -on -one interviews are usually more effective than focus group sessions.
- ❖ People/end-users are affecting each other's opinion during focus-group sessions, and this may undermine the testing results.
- ❖ It is beneficial to conduct focus group session after the interviews.
- ❖ During interviews and focus groups, some users may not provide complete, clear, and objective feedback about the solution.
- ❖ Some of the users will not want to criticize the solution, and they will hesitate to make negative comments.
- ❖ To mitigate this risk, user observations should also be conducted following interviews and focus group sessions.
- ❖ User observation Techniques consists of observing users while they use the prototyped solution.
- ❖ Testing a solution with limited number of users who represents the target personas is much better than testing with many random users.
- ❖ The optimum number of users that should be included in the testing phase is eight or ten per persona.
- ❖ Finding the users who represent the target personas is one of the most challenging parts of the testing phase.
- ❖ Sometimes design thinking teams hesitate to allocate a specific time and budget for testing sessions, because a fully equipped test laboratory is mandatory for testing.
- ❖ Observing users while they interact with the solution can be sufficient to detect and analyze most of the problems with the solutions.

Step by step Procedure for Testing

- **Set an objective:** The very first thing you'll need to do is set a clearobjective. What do you want to learn from your user tests? Whatquestion do you hope to answer? Setting a clear objective will helpyoutobuildtherightkindofprototypeandchoosethemostappropriate user

testing method. For example: If you're designing anecommerceapp,yourobjectivemightbetotesthoweasyitisforyour users to add an item to their Wishlist.

- **Build your prototype:** You know what you want to test; now it's timeto build your prototype. If you're in the very early stages of testing anidea, you'll stick to low-fidelity prototypes. Once you've decided on aconcept,you'llwanttotestthefinerdetails,suchasinformationarchitecture or microcopy, using mid and high-fidelity prototypes.

- **Create a plan:** For the sake of consistency, it's important to create aplan for your user testing session. Your plan should include yourobjectiveorquestion;themethodyouintendtousetotestyourprototype;thenumberofuser syou'llteston;alistofalltheequipment you'll need; and how you'll document and measure yourfindings. Depending on your chosen method, you may also want tocreate a script in order to keep the session focused.

- **Recruitparticipants:** Anothercrucialaspectofusertestingisrecruitingtherightparticipants.Yo uwanttotestonuserswhorepresent your target audience, so spend a bit of time identifyingsome key criteria. If you're designing an over-50s dating app, forexample, it wouldn't make sense to run user tests with a group of 18-year-old.

- **Gatherallthenecessaryequipment:** Havingrecruitedyourparticipants, you're ready to get the session underway. Refer back toyour plan and make sure you've got everything you need to conductthetests:screenrecordingsoftwareifyou'reconductingremotetesting, pens and paper for taking notes, and gather all the necessaryequipment, of course, your prototype!

- **Document your findings:** Throughout each user test, be sure todocument your findings. You'll need a thorough record of each test inorder to analyze your observations and compare the results of eachsession.