1.What is the main goal of User-Centered Design (UCD)?

A. Promote visual creativity

B. Involve users in the design process

C. Reduce cost

D. Design for aesthetics

📝 **Explanation:**

User-Centered Design (UCD) focuses on involving real users throughout the design process to ensure the product meets their needs and expectations.

2. Which principle states that design should be consistent and predictable?

A. Visibility

B. Affordance

C. Consistency

D. Feedback

📝 **Explanation:**

Consistency ensures similar elements behave the same way throughout the interface, helping users form accurate mental models.

Affordance is about suggesting how an element should be used (e.g., buttons look clickable).

3. Feedback in UI design refers to:

A. Colors used in a button

B. A user leaving a review

C. System response to user actions

D. Product ratings

📝 **Explanation:**

In UI/UX, **feedback** is the immediate visual, auditory, or tactile response a system gives to inform the user that an action has been registered — for example, a button changing color when clicked or showing a success message.

4. Affordance refers to:

A. Low-cost design

B. Suggesting possible actions

C. User satisfaction

D. Interface responsiveness

📝 **Explanation:**
Affordance refers to the **design of an element suggesting how it should be used**. For example, a raised button affords clicking, while a slider affords dragging. It's about visual clues.

5. Which of the following is a usability heuristic?
A. Data compression
B. Recognition over recall
C. Vertical scaling
D. Encryption

📝 **Explanation:**
This heuristic, from Nielsen's 10 usability heuristics, encourages interfaces that minimize memory load by making options visible—users should **recognize options rather than recall them** from memory (e.g., dropdown menus vs. typing commands).

6. **Error prevention means:**
A. Not showing errors
B. Hiding all buttons
C. Designing to reduce user mistakes
D. Removing confirmation messages

📝 **Explanation:**
Error prevention involves proactively designing systems that **minimize the chances of user errors** — for example, disabling a "Submit" button until all required fields are filled or using confirmation prompts before destructive actions.

7. **A system that adapts to different screen sizes is called:**
A. Reactive
B. Flexible
C. Responsive
D. Dynamic

📝 **Explanation:**
Responsive design adjusts layout and elements dynamically to fit various screen sizes and orientations (like mobile, tablet, and desktop) — improving usability and accessibility across devices.

8. Which UX principle ensures important elements are easy to find?
A. Visibility
B. Affordance
C. Consistency
D. Constraint

📝 **Explanation:**
The **visibility principle** ensures that key elements, actions, and options are clearly visible to users. For example, placing a prominent "Buy Now" button where users expect it improves usability and task success.

9. An effective error message should be:
A. Technical
B. Hidden
C. Blaming the user
D. Clear and helpful

📝 **Explanation:**
A good error message tells users **what went wrong, why it happened, and how to fix it**—without placing blame. For example:
"❌ Invalid email. Please enter a valid format like name@example.com."

10. Which term describes how a design guides user behavior naturally?
A. Constraint
B. Signifier
C. Obstruction
D. Indicator

📝 **Explanation:**
A **signifier** is a **visual cue** that indicates how an element can be used — like underlined text implying a hyperlink or a handle suggesting a slider.
Constraints, on the other hand, limit how users can interact with an interface (e.g., graying out unavailable options).

11.**What does WCAG stand for?**

A. Web Code and Graphic

B. Web Content Accessibility Guidelines

C. Web Compliance and Guidance

D. Website Compliance Advisory Group

📝 **Explanation:**

WCAG is the global standard for making web content more accessible to people with disabilities. It provides **guidelines on text alternatives, contrast, navigation, keyboard access**, and more.

12. **Which of the following improves accessibility?**

A. Small fonts

B. Low color contrast

C. Alt text for images

D. Background videos

📝 **Explanation:**

Alt text (alternative text) describes images for screen readers and users who can't view graphics. It's essential for **visually impaired users** and improves overall accessibility and SEO.

13. **ARIA labels are used to:**

A. Change themes

B. Add animations

C. Improve accessibility for screen readers

D. Apply responsive layout

📝 **Explanation:**

ARIA (Accessible Rich Internet Applications) labels provide additional semantic information to assistive technologies like screen readers, helping users understand the role and state of interactive elements.

14. **Inclusive design means:**

A. Designing only for advanced users

B. Designing for specific user groups

C. Designing for as many people as possible

D. Designing with minimal elements

📝 **Explanation:**

Inclusive design aims to create products usable by people with diverse abilities, ages, languages, cultures, and technical skills, ensuring broad accessibility and usability.

15. Which of the following is NOT an assistive technology?
A. Screen reader
B. Braille display
C. Keyboard
D. Touchpad

📝 **Explanation:**

Assistive technologies help users with disabilities interact with devices.

- Screen readers and Braille displays are assistive.

- Keyboards **can** be considered assistive for people unable to use a mouse.

- A **touchpad** is a standard input device, not specifically assistive.

16.Low-fidelity prototypes are usually:
A. Interactive and functional
B. Code-based
C. Paper sketches or wireframes
D. High-resolution designs

📝 **Explanation:**

Low-fidelity prototypes are simple, often hand-drawn or basic wireframes used early in the design process to explore ideas quickly without focusing on visual details or interactivity.

17. Which tool is commonly used for UI prototyping?
A. SQL
B. Figma
C. Excel
D. Postman

📝 **Explanation:**

Figma is a popular cloud-based design tool used for creating UI prototypes, wireframes, and interactive designs collaboratively.

18. **A clickable prototype simulates:**

A. Server speed

B. Interactions/navigation flow

C. Final code logic

D. Database connections

📝 **Explanation:**

Clickable prototypes allow users to interact with the design by simulating the navigation and flow of the final product without needing full backend functionality.

19. **Which is a benefit of prototyping?**

A. Hides usability issues

B. Reduces creativity

C. Gathers early feedback

D. Increases development cost

📝 **Explanation:**

Prototyping helps designers test ideas quickly and gather feedback from users and stakeholders before full development, saving time and cost.

20. **High-fidelity prototypes typically include:**

A. Database logic

B. System architecture

C. Final UI layout and interactivity

D. Placeholder content only

📝 **Explanation:**

High-fidelity prototypes closely mimic the final product's look and feel, including detailed visuals and interactive elements, but may not include backend logic like databases.

21. **Which is NOT a phase in the interaction design lifecycle?**

A. Requirement gathering

B. Coding

C. Prototyping

D. Evaluation

📝 **Explanation:**

The interaction design lifecycle focuses on understanding requirements, designing,

prototyping, and evaluating. Coding is part of software development but not strictly a phase of the interaction design lifecycle.

22. **A metaphor in interface design helps users:**
A. Access code
B. Learn faster through familiarity
C. Visualize database
D. Animate content

📝 **Explanation:**
Interface metaphors use real-world concepts to help users understand and learn how to use digital interfaces more quickly by relating to something familiar.

23. **Which is an example of an interface metaphor?**
A. Dropdown menu
B. Toggle switch
C. Trash bin icon for delete
D. Pagination control

📝 **Explanation:**
The trash bin icon is a classic interface metaphor representing a place where unwanted files are discarded, drawing on the physical world experience of throwing things in a trash can.

24. **What is the purpose of the evaluation phase?**
A. Deploy product
B. Analyze errors only
C. Measure usability and get feedback
D. Add more features

📝 **Explanation:**
The evaluation phase involves testing prototypes with users, gathering feedback, identifying usability issues, and refining the design before final deployment.

25. **Which is a quantitative research method?**
A. User interview
B. Usability testing

C. Heatmap analysis
D. Focus group

📝 **Explanation:**
Heatmap analysis collects numerical data on where users click or scroll (quantitative).
User interviews and focus groups are qualitative methods focused on gathering
opinions and experiences.

26. Which metric evaluates user satisfaction?

A. NPS or SUS score
B. Load time
C. Server response rate
D. App installation count

📝 **Explanation:**
The **Net Promoter Score (NPS)** and **System Usability Scale (SUS)** are standardized
metrics used to measure user satisfaction and perceived usability of a product.

27. **What is the goal of A/B testing?**
A. Compare two versions to find the better one
B. Add features
C. Fix errors
D. Test only visuals

📝 **Explanation:**
A/B testing involves presenting two different versions of a design to users and
measuring which performs better based on key metrics like conversion or engagement.

28. **Think-aloud protocol helps to gather:**
A. Server metrics
B. User behavior and thoughts while performing tasks
C. Analytics only
D. Sales conversions

📝 **Explanation:**
The think-aloud protocol asks users to verbalize their thoughts as they interact with a
system, providing rich qualitative insights into their experience and challenges.

29. Personas are used in UX to:
A. Create security layers
B. Represent typical users
C. Build admin panels
D. Manage databases

📝 Explanation:
Personas are fictional but data-driven profiles that represent key user groups. They help designers keep real user needs and behaviors in focus throughout the design process.

30. Usability testing focuses on:
A. Server speed
B. Color theory
C. Real user interaction with the system
D. Performance testing

📝 Explanation:
Usability testing observes actual users as they interact with the product to identify usability issues and areas for improvement, ensuring the design meets user needs effectively.

31. Which design principle emphasizes reducing the user's memory load?
A. Visibility
B. Recognition over recall
C. Feedback
D. Consistency

📝 Explanation:
Recognition over recall reduces cognitive load by allowing users to recognize options instead of memorizing information.

32. What does 'heuristic evaluation' involve?
A. Testing code efficiency
B. Expert review of usability principles
C. User survey
D. Automated bug testing

📝 **Explanation:**

Heuristic evaluation is a usability inspection where experts evaluate the interface based on recognized usability principles.

33. Which prototyping fidelity is best for quick concept validation?

A. High-fidelity

B. Medium-fidelity

C. Low-fidelity

D. Final product

📝 **Explanation:**

Low-fidelity prototypes are simple and fast to create, ideal for early feedback and concept validation.

34. The term 'affordance' was coined by:

A. Donald Norman

B. Jakob Nielsen

C. Steve Jobs

D. Alan Turing

📝 **Explanation:**

Donald Norman introduced the term to describe perceived and actual properties of an object that determine how it could be used.

35. What is the main advantage of responsive web design?

A. Faster coding

B. Works on all screen sizes

C. Better graphics

D. Advanced animations

📝 **Explanation:**

Responsive design ensures the website adapts to various screen sizes, improving user experience across devices.

36. Which UX research method collects numerical data?

A. Focus groups

B. Usability testing

C. Surveys

D. Ethnographic studies

📝 **Explanation:**

Surveys collect quantitative data such as ratings, counts, or scales.

37. Which is NOT a key component of user personas?

A. Demographics

B. User goals

C. Technical stack used

D. Pain points

📝 **Explanation:**

Technical stacks are not part of personas, which focus on user characteristics and needs.

38. What does 'wireframe' mean in UX design?

A. A detailed, colored mockup

B. A basic layout sketch of a page

C. Final product design

D. Backend architecture

📝 **Explanation:**

Wireframes are simple black-and-white layouts showing placement of elements without styling.

39. What does the term 'user journey' describe?

A. The server path for data

B. Steps a user takes to accomplish a goal

C. Code deployment process

D. Graphic design process

📝 **Explanation:**

User journeys map the process users go through to complete tasks.

40. Which tool is commonly used for remote usability testing?

A. Zoom

B. Lookback.io

C. Photoshop

D. GitHub

📝 **Explanation:**

Lookback.io records and facilitates remote user testing sessions.

41. Which principle aims to keep interfaces simple and minimal?

A. Flexibility

B. Minimalism

C. Scalability

D. Affordance

📝 **Explanation:**

Minimalism avoids clutter and focuses on essential elements for clarity.

42. What is the benefit of 'card sorting' in UX?

A. To test color schemes

B. To organize information architecture

C. To design icons

D. To fix bugs

📝 **Explanation:**

Card sorting helps organize content in a way users find logical.

43. What does the 'Fitts's Law' state?

A. The time to reach a target depends on distance and size

B. Color affects usability

C. Feedback improves learning

D. User satisfaction increases with speed

📝 **Explanation:**

Fitts's Law predicts that targets closer and larger are faster to reach.

44. Which design pattern is used to save user time by predicting inputs?

A. Autocomplete

B. Modal window

C. Tooltip

D. Carousel

📝 **Explanation:**

Autocomplete suggests possible completions, speeding input.

45. Which of these is a form of quantitative usability testing?

A. A/B Testing

B. User interview

C. Focus group

D. Diary study

📝 **Explanation:**

A/B testing compares performance metrics between two variants.

46. What is a 'heuristic' in UX?

A. A code function

B. A rule of thumb for usability

C. An animation technique

D. A database query

📝 **Explanation:**

Heuristics are usability rules used to guide design and evaluation.

47. What does 'persona empathy map' help to understand?

A. User technical skills

B. User feelings and motivations

C. User demographics

D. Server uptime

📝 **Explanation:**

Empathy maps visualize what users think, feel, hear, and say.

48. What is a 'call to action' (CTA)?

A. Error message

B. Button prompting user action

C. Loading spinner

D. Navigation bar

📝 **Explanation:**

CTAs prompt users to take specific actions like 'Buy Now'

49. Which method helps identify problems by watching users use a product?

A. Heuristic evaluation

B. Usability testing

C. Survey

D. A/B testing

📝 **Explanation:**

Usability testing involves real users performing tasks while being observed.

50. What does 'progressive disclosure' do?

A. Shows all options at once

B. Hides advanced options until needed

C. Discloses bugs progressively

D. Automatically saves data

📝 **Explanation:**

Progressive disclosure simplifies the interface by hiding complex features initially.