Principles and Models of eLearning

Understanding eLearning

1

Digital Delivery

Learning content delivered through electronic devices and the internet

2

Anytime, Anywhere

Learners access content beyond fixed classroom hours and locations

3

Diverse Formats

Includes videos, simulations, quizzes, and online discussions

OVERVIEW

Session Agenda

1. Principles of eLearning Design
2. Models and Approaches to eLearning
3. Major eLearning Models and Approaches
4. Online, Blended and Flexible Learning
5. Instructional Design and Universal Design for Learning

1

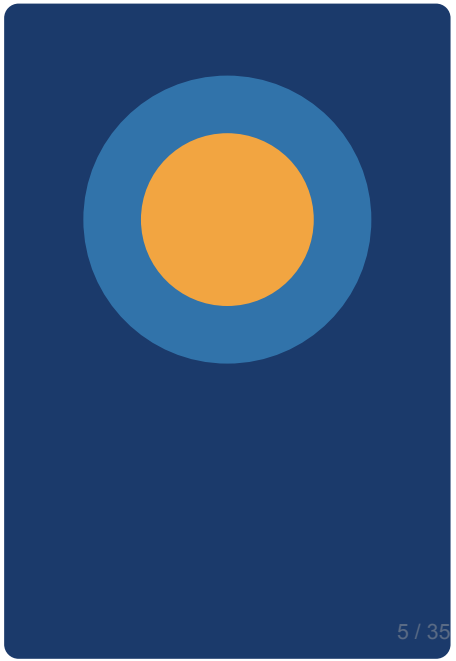
SECTION 1 OF 5

Principles of eLearning Design

Foundational guidelines that shape effective digital learning experiences

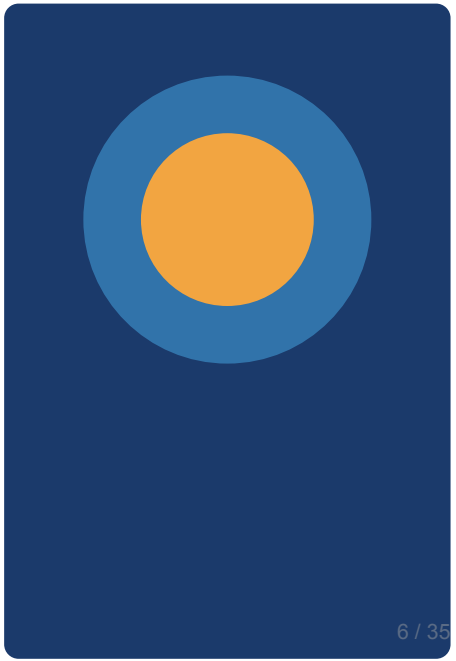
Learner-Centered Design

- Design around learner needs, goals, and pace
- Offer choices in content paths and activities
- Build on learners' prior knowledge and context
- Respect diverse backgrounds and motivations



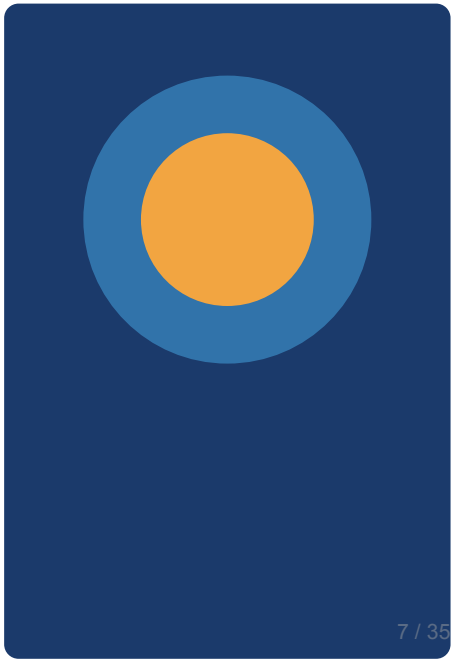
Interactivity & Engagement

- Use quizzes, simulations, and discussions
- Encourage active participation, not passive viewing
- Gamification boosts motivation and retention
- Real-world scenarios make learning meaningful



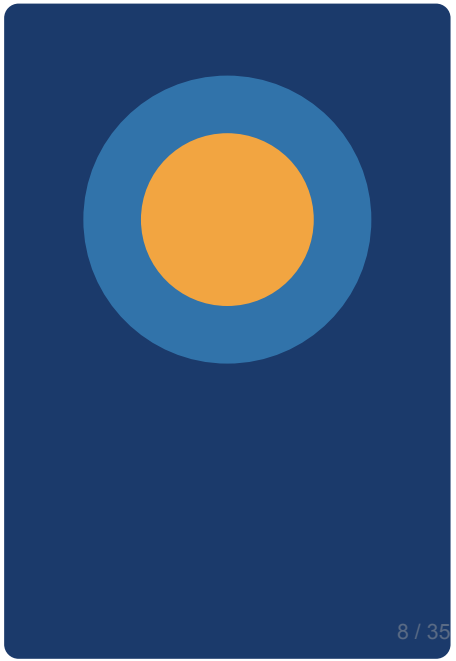
Accessibility & Inclusivity

- Design for learners of all abilities
- Provide captions, transcripts, and alt text
- Follow WCAG guidelines for digital content
- Support multiple devices and assistive technology



Clear Objectives & Feedback

- State measurable learning outcomes upfront
- Give timely, constructive feedback
- Align assessments directly with objectives
- Track progress to guide learners forward



Multimedia Learning Principles

1

Words + Graphics

Combine narration and visuals rather than text alone

2

Coherence

Remove extraneous content, sound, and decoration

3

Segmenting

Break content into short, manageable chunks

2

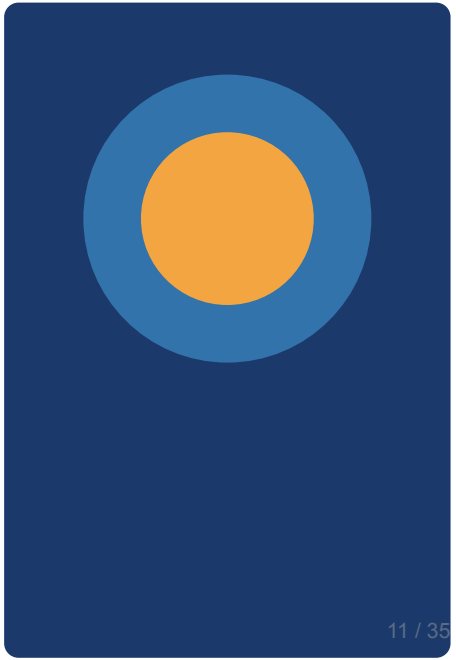
SECTION 2 OF 5

Models and Approaches to eLearning

Structured frameworks that guide how digital learning is planned and delivered

What Is an eLearning Model?

- A structured framework guiding design decisions
- Defines stages from analysis to evaluation
- Ensures consistency, quality, and scalability
- Helps teams collaborate with a shared process



Synchronous vs Asynchronous Learning

S

Synchronous

- Live, real-time sessions
- Immediate interaction
- Fixed schedule and pace

A

Asynchronous

- Self-paced, on demand
- Recorded content and resources
- Flexible timing for learners

Self-Paced vs Collaborative Learning

1

Self-Paced Learning

- Individual progress and control
- Flexible timing and sequence
- Independent study and reflection

2

Collaborative Learning

- Peer interaction and dialogue
- Group projects and tasks
- Shared discussion and feedback

3

SECTION 3 OF 5

Major eLearning Models and Approaches

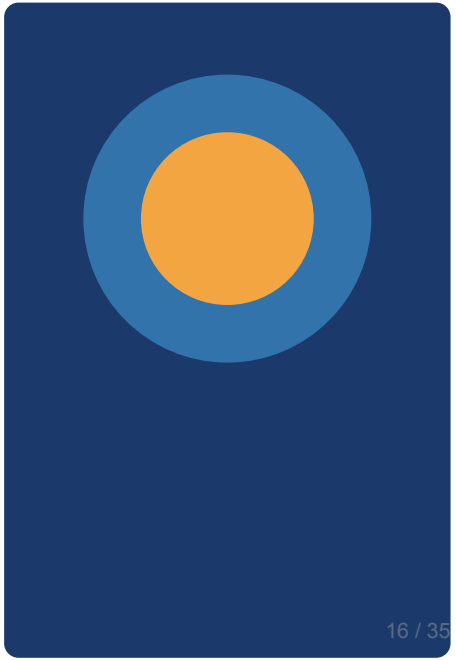
Widely used frameworks for designing and evaluating digital learning

The ADDIE Model

- Analyze – Learner needs and goals
- Design – Structure and strategy
- Develop – Build learning materials
- Implement – Deliver the course
- Evaluate – Measure and improve

The SAM Model

- Successive Approximation: rapid, iterative design
- Cycles of Preparation, Design, and Development
- Frequent prototypes tested with real learners
- Faster feedback loops than linear models



Gagne's Nine Events of Instruction

1

Beginning

- Gain attention
- State objectives
- Recall prior knowledge

2

Middle

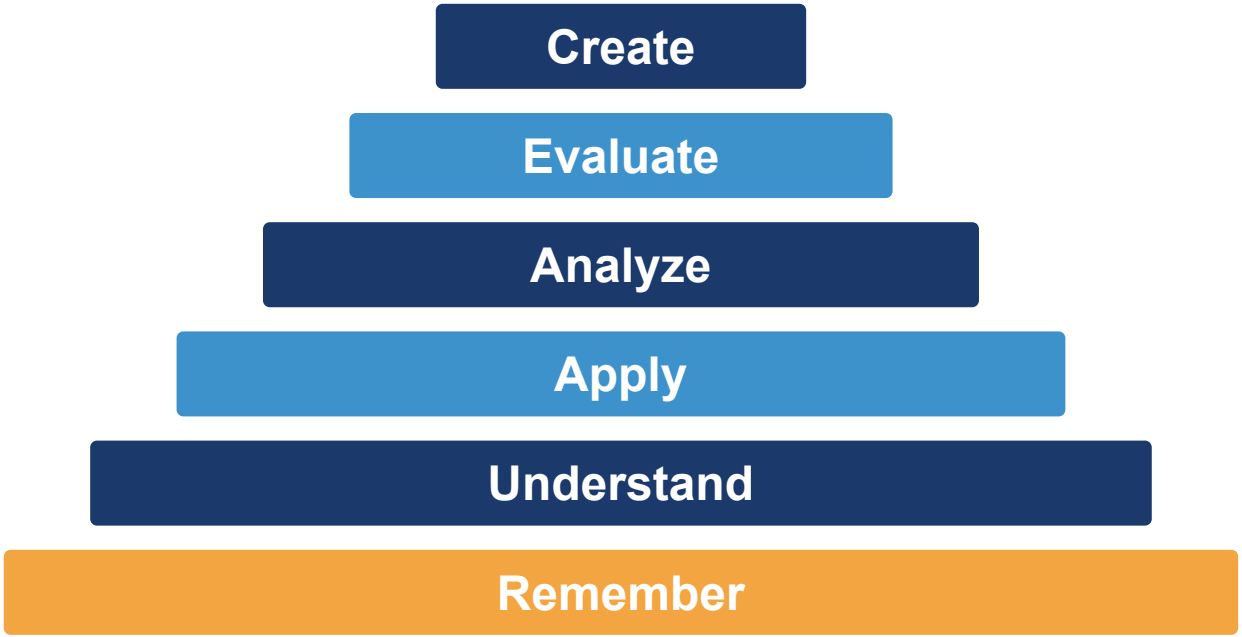
- Present content
- Provide guidance
- Elicit performance

3

End

- Give feedback
- Assess performance
- Enhance retention

Bloom's Taxonomy in eLearning



Kirkpatrick's Evaluation Model

1. **Reaction**
   How learners respond to the training
2. **Learning**
   Knowledge and skills gained
3. **Behavior**
   Application of learning on the job
4. **Results**
   Impact on organizational outcomes

4

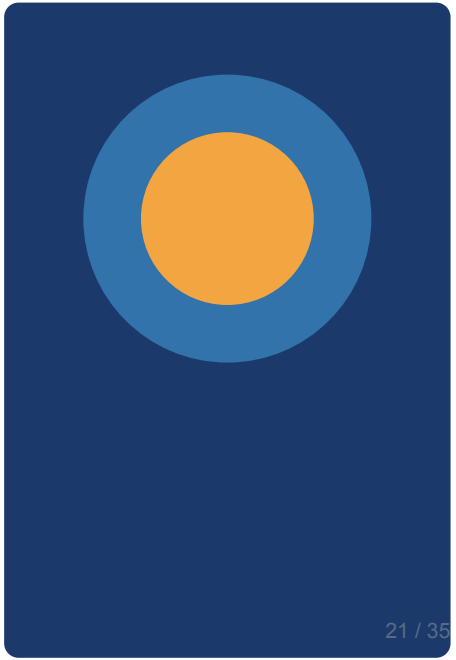
SECTION 4 OF 5

Online, Blended and Flexible Learning

Comparing delivery modes that shape how learners experience a course

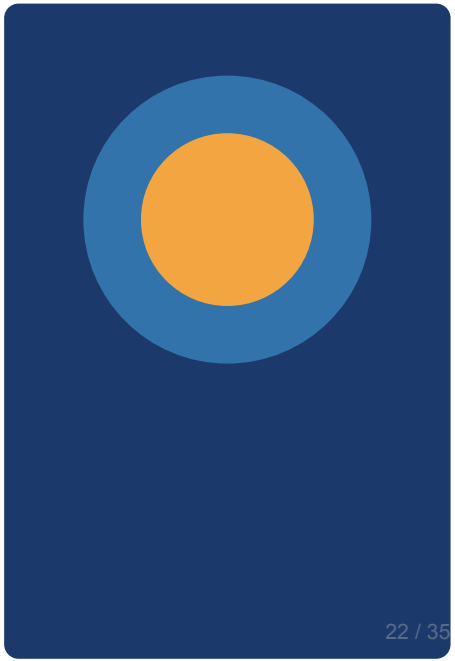
Online Learning

- Fully delivered through internet platforms
- No physical classroom attendance required
- Supports large-scale, global access
- Relies on digital tools for all interaction



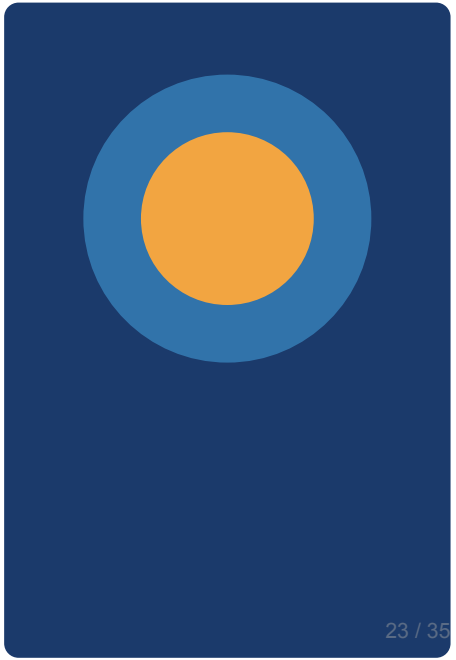
Blended Learning Models

- Combines face-to-face and online instruction
- Includes rotation, flex, and enriched-virtual models
- Balances human interaction with digital flexibility
- Lets teachers personalize pace and support



Flexible Learning

- Learners choose time, place, and pace
- Multiple pathways lead to the same outcomes
- Adapts to diverse learner circumstances
- Supports lifelong and workplace learning



Comparing the Three Modes

	Online	Blended	Flexible
Location	Fully remote	Mixed settings	Learner's choice
Pace	Set by course	Partly fixed	Fully adaptable
Interaction	Digital only	Digital + in-person	Varies by pathway

5

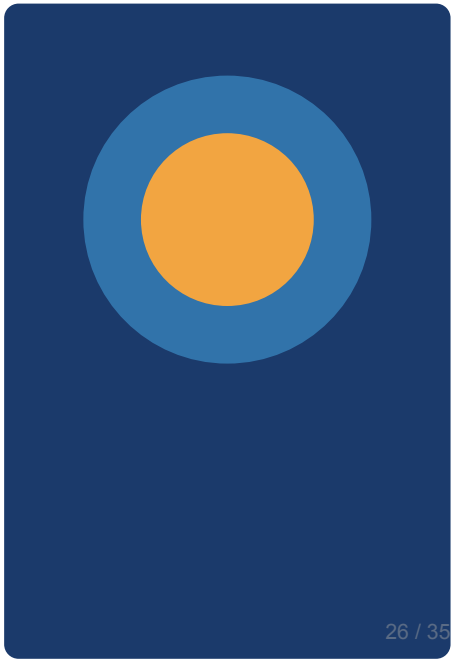
SECTION 5 OF 5

Instructional Design and Universal Design for Learning

Frameworks that make digital learning effective and accessible to all

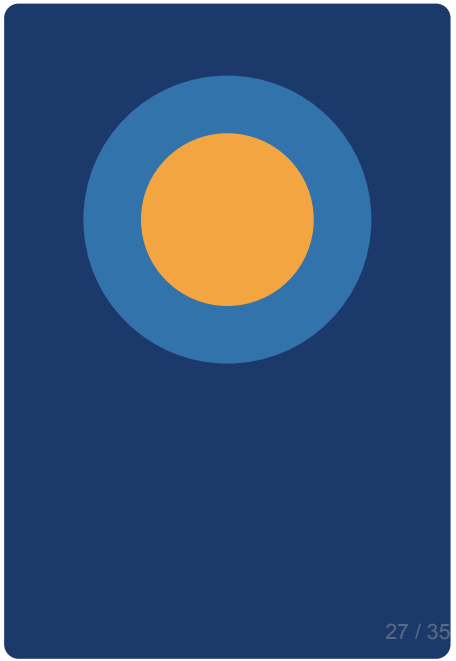
Instructional Design (ID) Principles

- Systematic approach to creating learning experiences
- Grounded in learning theory and needs analysis
- Focuses on clear, measurable outcomes
- Iterates based on learner performance data



Universal Design for Learning (UDL)

- Framework designed to reach all types of learners
- Removes barriers before they arise
- Rooted in research on how people learn
- Builds flexibility into goals, methods, and materials



UDL: Three Core Principles

1

Engagement

- The “why” of learning
- Sparks interest & motivation

2

Representation

- The “what” of learning
- Multiple ways to present content

3

Action & Expression

- The “how” of learning
- Multiple ways to show skill

Applying ID and UDL Together

1

Structured Foundation

Use ID to plan clear goals, content, and assessment

2

Inclusive Flexibility

Layer UDL to offer multiple paths to success

3

Shared Outcome

Accessible, effective learning for every learner

The Community of Inquiry Framework

1

Social Presence

- Learners feel part of a group
- Open, trusting communication

2

Cognitive Presence

- Construct meaning through dialogue
- Reflect, question, and connect ideas

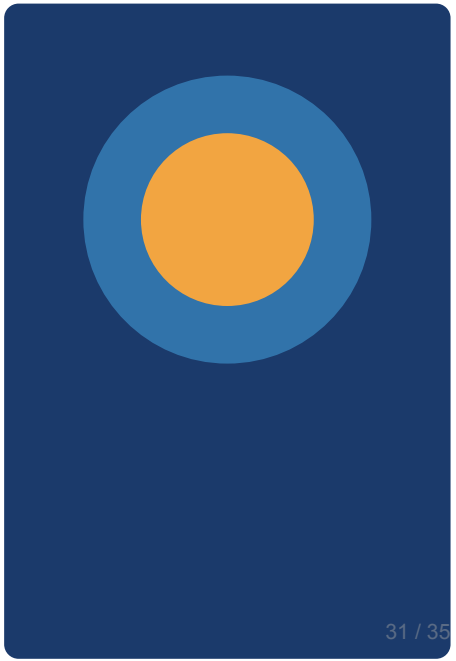
3

Teaching Presence

- Design, facilitate, and guide
- Keep discussion focused on goals

Learning Management Systems (LMS)

- Central hub for content, grades, and communication
- Automates enrollment, tracking, and reporting
- Supports discussion boards and collaboration tools
- Examples include Moodle, Canvas, and Google Classroom



Assessment Strategies in eLearning

1

Formative Assessment

Ongoing checks like quizzes and polls

2

Summative Assessment

Final exams and graded projects

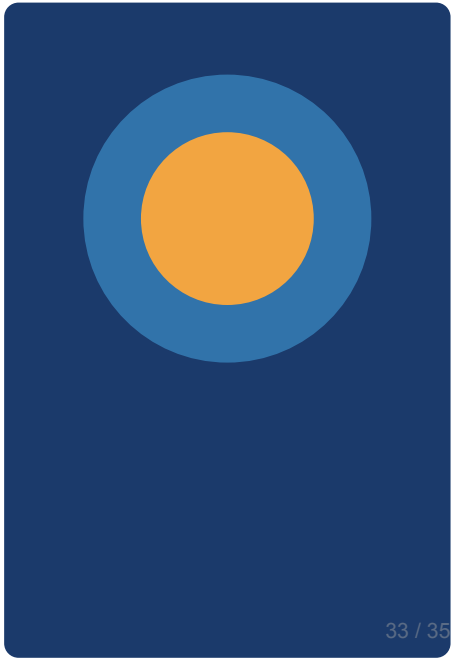
3

Authentic Assessment

Real-world tasks and portfolios

Common Challenges in eLearning Design

- Maintaining learner motivation without a classroom
- Ensuring equitable access to devices and internet
- Preventing cognitive overload from poor design
- Measuring engagement and real learning outcomes



Future Trends in eLearning

1

AI Personalization

Adaptive paths matched to each learner

2

Microlearning

Short, focused lessons for busy learners

3

Immersive Technology

VR and AR bring hands-on practice online

Key Takeaways

1. Strong principles ground effective eLearning design
2. Models like ADDIE and SAM guide structured development
3. Blended and flexible modes meet diverse learner needs
4. ID and UDL together ensure quality and accessibility

Thank You