Designing Learning Interventions that Last

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Agenda

1. Case for Learning Design
2. Systematic Design Process
3. Examples of Blended Learning
4. Monitoring and Evaluating Your Programs
Designing Learning Interventions that Last

Case for Learning Design
What is Learning Design?

“Tell me, and I will forget. Show me, and I may remember. Involve me, and I will understand.”

“What we have to learn to do, we learn by doing.”
GDLN Workshop

Systematic approach for designing learning

Increase learning effectiveness
Reduce costs
Make learning more engaging
Reach more learners

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Reduce costs

Example of traditional workshop

- Topic 1: Expert 1
- Topic 2: Expert 2
- Question session
- Topic 3: Expert 3
- Topic 4: Expert 4
- debate

Participants and speakers travel to site
Varying degrees of entry level knowledge

The workshop re-designed

Before workshop
- Multi Media + e-learning materials

During workshop
- Discussion on how to apply knowledge
- 2 hour face-to-face with expert guide

= blended learning

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How to do learning design?

ADDIE Model

1. Define Outcomes & Learning Objectives (Analyze/Design)
2. Identify Learning Methods (Design)
3. Select Tools (Design)
4. Assemble Program (Develop)
5. Monitor & Evaluate Program (Evaluate)
Behaviorists: 
*Learning is acquisition of new behavior*

Cognitivists: 
*Learning is Process of Acquiring and storing knowledge*

Social Constructivists: 
*Learning is A social process*

Constructivists: 
*Learning is active construction of knowledge*
The Principles of Andragogy

Adults

1. are autonomous and need the freedom to direct themselves
2. know their goals
3. connect learning to their own experience
4. must see a reason for learning something: apply the new knowledge in their work or life.
Designing Learning Interventions that Last

Systematic Approach to Learning Design
1. Define Outcomes & Objectives
   - Identify the audience
   - Set the learning objectives

2. Identify Learning Methods
   - Choose the appropriate methods to reach the objectives

3. Select tools
   - Pick the appropriate delivery modes
   - Select the tools that best facilitate the identified methods

4. Assemble program
   - Group and organize methods in a series of events
   - Assemble the events to a program

5. Monitor and evaluate the program
   - Determine what level of evaluation is appropriate
   - Compare actual with desired outcomes
A Needs Assessment can be a formal, in-depth study, or an informal review.
Common Learning Outcomes

- Raise Awareness
  - General understanding of issues

- Facilitate Consensus and Teamwork
  - Get people working together to address the relevant issues

- Assist in Formulating Policy/Strategy
  - Build greater knowledge of specific issues and approaches

- Implement Plans/New Approaches
  - Apply the new knowledge, skills and attitudes to work environment

- Enhance Skills
  - Enhance specific skills necessary to implement the initiatives

- Foster Networks
  - Facilitate interactions between knowledgeable persons to promote best practices

Smaller initiatives may address one or two outcomes

Comprehensive initiatives can address several types of outcomes
Identifying the Audience

General audience characteristics:
- Size of audience
- Geographical distribution
- Cultural Background
- Position in Society
- Level of Literacy
- Gender
- Language

Baseline knowledge:
- Level of existing knowledge of topics

Identify who can influence change:
- Who needs the specific knowledge, skills or attitudes
- Work roles and responsibilities

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Learning Objectives

Learning objectives are statements that describe the specific actions that a person will be able to perform once they complete the learning experience.

For example: “Identify the precise range of environment impacts and estimate their relative importance.”
Bloom’s Taxonomy: Cognitive Levels of Thinking

- Knowledge
- Comprehension
- Application
- Analysis
- Synthesis
- Evaluation

Higher level processes build on the lower levels.
Writing Objectives

Know
- arrange, define, describe, label, list, memorize, recognize

Comprehend
- explain, reiterate, classify reword, summarize, discuss, interpret, paraphrase

Apply/Analyze
- use, apply, compare, implement, manage, produce, interpret, structure, examine,

Create
- establish, assemble, modify, integrate, re-arrange

Evaluate
- assess, compare, review, justify, defend

Knowledge
- Comprehension
- Application
- Analysis
- Evaluation
- Synthesis
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Learning Methods

Brainstorming
Buzz Session
Case-based Learning
Concept Maps
Demonstration
Discussion Forum
Expert Panel
Expert Speaker
Follow Up
Game-based Learning
Interview
Listening teams
Problem-based Learning
Project-based Learning
Role Play
Scenario Comparison
Simulation
Tests
Other Methods...

Glossary
Readings

Basic pedagogical building blocks of our activities

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Learning methods are format-independent

Example: Case Study

Case Document
Case Documentary Movie / Interviews
Case Story Via Audio Narrative
Multimedia case presentation
Face to face Case presentation
Case study on location
GDLN Workshop

Desired Outcome:

- **Knowledge & Learning Outcomes**
  - **Raise Awareness**
  - **Consolidate**
  - **Apply, Analyze**
  - **Evaluate**
  - **Create**

**Cognitive Levels of Thinking**
- **Remember**
- **Understand**
- **Apply, Analyze**
- **Evaluate**
- **Create**

**Objectives**
- **Review, justify, assess, present a case for, defend, report on, investigate, direct, appraise, argue, project-manage**
- **Review, arrange, define, describe, label, list, memorise, recognise, relate, reproduce, select, state, explain, reiterate, reword, critique, classify, summarize, illustrate, translate, review, report, discuss, re-write, estimate, interpret, theorize, use, apply, discover, manage, produce, implement, construct, change, prepare, conduct, perform, react, respond, role-play, analyse, break down, catalogue, compare, quantify, measure, test, experiment, exercise, relate, graph, diagram, plot, extrapolate, value, divide, simulate, propose, establish, assemble, integrate, re-arrange, modify**

**Methods**
- **Demonstration, Walk through, Expert guest speaker**
- **Glossary (reading), Lecture, Panel of experts, Readings, Case based Learning (Description)**
- **Case based Learning (Analysis), Visualization, Game based learning, Interviewing, Debates, Peer Review / Peer Assist**
- **Survey, Test (match items), Test (fill in blanks), Test (find/identify), Test (cor/true/false), Test (multiple choice), Test (put into order)**
- **buzz Session, Conceptual map, Listening Team, Journaling, Peer Review / Peer Assist, Report, Summary, Debriefs, Peer Review / Peer Assist, Project based learning, Role play, Brainstorm (Reflection), Buzz Session, Discussion Forum (Analysis), Problem based learning, Scenario Comparison, Simulation, Discussion Forum (Evaluation), Follow Up, Summary, Survey, Report (Evaluation)**
- **Action Plan, Brainstorming (Evaluation), Buzz Session, Case based Learning (Performance), Problem based learning, Scenario comparison, Simulation, Discussion Forum (Evaluation), Action Plan, Brainstorming, Scenario comparison, Simulation, Discussion Forum, Project based learning**
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The Types of Delivery Modes

Face to Face

Delivery modes are the channels through which participants interact with each other or with the content and with the experts.

E-Learning

Video Conferencing

Broadcast Media (Radio & TV) and Print
The Characteristics of Delivery Modes

**SYNCHRONOUS**
- “Live” interactions
- Face to face
- Video
- Conferencing
  - Dialogue
  - Discuss
  - Debate
  - Role play

**ASYNCHRONOUS**
- Interactions not at same time
- E-learning
- Print
- Broadcast
  - Reflect
  - Interact
  - Follow Up

**Build Trust**

**Time for Reflection**
Selecting Delivery Modes - constraints influence selection

- **Audience Access to Technology** (electricity, technical equipment, Internet)
- **The External Environment** (war, natural disasters, environment)
- **Cost** influences the Channel Selection

![Graph showing constraints and budget impacts on delivery modes]

- **Budget**
- **Constraints**
- **Participants reached**
- **E-learning**
- **VC**
- **F2F**

Blending Delivery Modes

- Face to Face
- E-Learning
- Video Conferencing

BLENDED LEARNING
Tacit vs. Explicit Knowledge

Explicit Knowledge Dimension

- Print/Presentation Tools
  - Brochure
  - Workbook
  - Checklist
  - PowerPoint Presentation
  - Excel Spreadsheet
  - Case Document
  - Facilitation Guideline
  - Newsletter

- Audio-Visual Tools
  - Video Clip
  - Audio Clip / Podcast
  - Multimedia Presentation
  - Simulation / Model
  - Game
  - Video/Audio Live Stream
  - AV Newsletter
  - Radio

Tacit Knowledge Dimension

- Direct Interaction Tools
  - Facilitation Techniques
    - Activities using flipcharts, post-its, polling tools, etc.

- Distance Interaction Tools
  - Web-based Tools
    - E-Discussion Forum, Email, Blog, Wiki, E-Survey, Live Collaboration Tools, Existing Social Networking Platforms
  - Interactive Video Conference Tools
    - Facilities, such as GDLN that use multi-screens, documents cameras, etc.
What is the right tool for my purpose?
How do I use it in the best possible way?
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   - Set the learning objectives

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Phase 4: Assemble Program

Event
(a set of objects, each consisting of objective, method, tool + delivery mode)
Phase 4: Assemble Program
Examples of Blended Learning Discussion
1. Define Outcomes & Objectives
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What is monitoring and evaluation?

Monitoring and evaluation is a formal process for evaluating a learning program.

Investigating the value of a learning event or learner’s performance compared to what was expected.

Monitoring – when “cook” evaluates the product
Goal – improve quality

Evaluation – when “guests” evaluate the product
Goal – determine real world results
Evaluation

How well participants liked a learning intervention?

Level 1
Reaction

Level 2
Learning

Level 3
Behavior

Level 4
Results

Questions about:
- Usefulness
- Relevance
- Satisfaction
- Background Information

Donald Kirkpatrick
Evaluation

How much did participants learn?

Level 1
Reaction

Level 2
Learning

Level 3
Behavior

Level 4
Results

Changes in knowledge
Pre-test
Post-test

GDLN Workshop

Evaluation

Did participants change workplace behavior as a result of the learning intervention?

Level 1 Reaction

Level 2 Learning

Level 3 Behavior

Level 4 Results

Learning Event

Supervisors’ comments

Observations

Transfer

Work Behavior

Evaluation

How did learning intervention affect organization?

- Level 1 Reaction
- Level 2 Learning
- Level 3 Behavior
- Level 4 Results

Consider evaluation from the beginning when writing objectives

Improvements in:
- Quality
- Quantity
- Efficiency
- Costs
- Morale

Consider evaluation from the beginning

- **Know**
  - arrange, define, describe, label, list

- **Comprehend**
  - explain, reiterate, classify, reword, summarize, discuss, interpret, paraphrase

- **Apply/Analyze**
  - use, apply, compare, implement, manage, produce, interpret, structure, examine,

- **Create**
  - establish, assemble, modify, integrate, re-arrange

- **Evaluate**
  - assess, compare, review, justify, defend

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