

Learning Objectives

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Why It Matters

When designing instruction, you should start by creating clearly-defined, measurable learning objectives that:

- Provide clarity of purpose and goals to learners, instructors, designers, and all stakeholders
- Identify what will be measured in the assessment
- Drive all design decisions, including the amount and type of content to convey, the amount of practice and application, multimedia approaches, and testing strategies.

Our Recommendation

Ensure that your learning objectives include three key components:

1. Task: What task must the learner perform?
2. Condition: How will the task be performed? Under what circumstances will the task be performed?
3. Standard: How well should the task be performed? What are the criteria for success?

Sample Revision Process

You might already have a list of topics in mind that you'd like to cover. How do you turn those topics into a list of learning objectives? The following table illustrates a revision process that you might undertake.

Moving from general topics to specific learning objectives
First draft: Lewis Structures, VSEPR Theory, Valence Bond Theory
Tip: These are <i>topics</i> the learner should <i>know</i> , but we're interested in <i>tasks</i> the learner needs to <i>do</i> .
Revision: Know about Lewis Dot Structures.
Tip: Choose a more specific verb. "Know" is difficult to measure. Try using the list of action verbs as a guide (see below).
Revision: Draw and interpret a Lewis Dot Structure.
Tip: These are actually two objectives (i.e. " <i>Draw</i> and <i>interpret</i> "). Focus on one at a time.
Revision: Draw a Lewis Dot Structure.
Tip: Under what condition should this task be performed? In this case, what information is the student given?
Revision: Given a molecule, draw a Lewis Dot Structure.
Tip: Are there any standards that must be met? What is the criteria for success?
Revision: Given a molecule, draw a Lewis Dot Structure that best represents the arrangement of bonds and valence electrons.

Sample Verbs

The following table provides a list of suitable action verbs at each level of Bloom's Taxonomy.

Knowledge	Comprehension	Application	Analysis	Synthesis	Evaluation
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Arrange	Classify	Apply	Analyze	Arrange	Appraise
Define	Compare	Change	Appraise	Assemble	Argue
Describe	Convert	Choose	Breakdown	Categorize	Assess
Identify	Defend	Complete	Calculate	Collect	Attach
Label	Describe	Compute	Categorize	Combine	Choose
List	Discuss	Construct	Compare	Comply	Compare
Match	Distinguish	Demonstrate	Contrast	Compose	Conclude
Memorize	Estimate	Discover	Criticize	Construct	Contrast
Name	Explain	Dramatize	Debate	Create	Defend
Order	Express	Draw	Diagram	Design	Describe
Outline	Extend	Employ	Differentiate	Develop	Discriminate
Recall	Identify	Illustrate	Discriminate	Devise	Estimate
Recognize	Indicate	Interpret	Distinguish	Explain	Evaluate
Record	Infer	Manipulate	Examine	Formulate	Explain
Relate	Locate	Modify	Experiment	Generate	Interpret
Repeat	Paraphrase	Operate	Identify	Manage	Judge
Reproduce	Predict	Practice	Illustrate	Organize	Justify
Select	Recognize	Predict	Infer	Plan	Measure
State	Restate	Prepare	Inspect	Prepare	Relate
Tell	Rewrite	Produce	Inventory	Propose	Predict
Underline	Review	Relate	Model	Rearrange	Rate
	Select	Schedule	Outline	Reconstruct	Revise
	Summarize	Show	Point out	Relate	Score
	Tell	Sketch	Question	Reorganize	Select
	Translate	Solve	Relate	Revise	Summarize
		Use	Select	Rewrite	Support
		Write	Separate	Set up	Value
			Subdivide	Summarize	
			Test	Synthesize	
				Tell	
				Write	