Guide

Diagnoser Tools

Indicates a research-demonstrated benefit

Overview

Tools to elicit students' initial ideas, lessons to engage those ideas, assessment items, and reporting structures for students and teachers.

Type of Method	Instructional strategy, Curriculum supplement
Level	**Designed for:** Teacher Professional Development , Middle School , Teacher Prep Course, High School **Can be adapted for:** Intro College Calculus-based, Intro College Algebra-based, Intro College Conceptual, Intermediate, Upper-level Undergraduate
Setting	**Designed for:** Lecture - Small (<30 students) **Can be adapted for:** Lecture - Large (30+ students), Recitation/Discussion Session, Lab, Homework, Studio
Coverage	Few topics with great depth
Topics	Mechanics, Waves / Optics, Other Science, Pedagogy
Instructor Effort	Medium
Resource Needs	Computers for students, internet access
Skills	**Designed for:** Conceptual understanding **Can be adapted for:** Problem-solving skills, Making real-world connections, Using multiple representations, Designing experiments, Metacognition
Research Validation	**Based on research into:** theories of how students learn , student ideas about specific topics **Demonstrated to improve:** conceptual understanding , beliefs and attitudes , retention of students **Studied using:** classroom observations , analysis of written work , research at multiple institutions , research by multiple groups
Compatible Method	PBI
Similar Method	None

Developer(s)	FACET Innovations
Website	http://www.Diagnoser.com
Intro Article	4322
Intro Article	Designing Diagnostic Assessments