Standards-Based Assessment in Teaching

Lourdes Ferrer
University of Guam, USA

Accountability in teaching is satisfied by the use of standards. Standards define what all students should know (content), be able to do (skills), and should care about (attitudes and values). In the Science as Inquiry Standard, the student should be able to know how the world works and how to find out how it works; use imagination, inventiveness, logic, experimental evidence; and appreciate how human ideas have been transformed by scientific and technological revolution. The main objective of this study is to find out how teacher candidates perform in terms of content, skills and attitudes that are governed by the elementary education program standards for teaching science. Twenty teacher candidates in a science methods course were engaged in the development of a scientific play that assessed their knowledge, skills and appreciations of science and technology. Rubrics were used to measure both the product and process involved. The product assessment was focused on the presentation of the scientific play. The process assessment looked at two dimensions. The first was the knowledge application dimension that assessed both cognitive and creative skills. The second dimension was all about the candidates’ attitudes and appreciations of scientists’ contributions. The findings reveal basic performance in content knowledge but proficient performances in both skills and appreciations.