Understanding teacher communication patterns: Case studies of talk in new teachers' science classrooms

Benjamin Shongwe, University of the Witwatersrand, Johannesburg

Abstract

Very little is known about new teachers' practice in relation to elicitation of learners' ideas in South African secondary science classrooms. Learners' ideas are important to elicit because learning occurs best when connections are made between them and new knowledge. The purpose of this study was to understand the communication patterns of new teachers and determine whether they were consistent with the aim in CAPS which encourages teaching from a constructivist view of learning. Constructivist view of learning involves creating opportunities for learners to make connections between their existing ideas and new concepts. These connections are best made through talk. Thus, teacher talk in teacherlearner interactions formed the basis of the investigation because it is the primary source of information. This study follows findings that experienced teachers often resort to knowledge transmission methods despite development programmes aimed at encouraging them to consider other alternatives. New teachers were of interest because they provided hope to change the status quo since teaching from constructivist perspectives was encouraged in their university modules. The study took place in two schools in Johannesburg where cases of two science teachers were investigated. Approximately 81 learners participated. Audio recorded data of classroom interactions and semistructured interviews were transcribed verbatim. Mortimer and Scott's analytical framework formed the basis for analysing teacher communication patterns, and Anne Raymond's model was used to thematically analyse interview data. The findings were that new teachers pose questions to elicit learners' ideas as encouraged in CAPS and that science beliefs, teacher education programmes, social teaching norms, and immediate classroom situation influence their practice. These findings were congruent with outcomes of other studies. The recommendation is that new teachers may need to be skilled in curricular saliency so that they engage with learners' ideas at high level of interanimation while covering curriculum content. The significance of the study is that it contributes to the understanding of new teachers' communication patterns in relation to the aim of CAPS.

Keywords

Learners' ideas; constructivist view of learning; communication patterns; teacher talk; analytical framework; thematic analysis; factors; and, curricular saliency