An Assessment of Teachers' Self-Efficacy in the Implementation of the Competency-Based Curriculum in Imenti North Sub-County Public Primary Schools, Meru County, Kenya

Mucoka M. Irene., Dr. Laban Murithi Mutwiri (PhD)

Department of Education, Mount Kenya University

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ABSTRACT

This study assessed teachers' preparedness for implementing the Competency-Based Curriculum (CBC) in public primary schools in Imenti North Sub-County, Meru County, Kenya, focusing specifically on teachers' self-efficacy. A descriptive survey design within a mixed-methods approach was employed to describe teachers' readiness and identify factors influencing CBC implementation. The target population comprised 30 head teachers, 80 teachers, and one Sub-County Quality Assurance and Standards Officer (SCQASO). A sample of 34 respondents was selected, representing 30.6% of the total population. Stratified random sampling selected teachers and head teachers to ensure representativeness, while the SCQASO was purposively included for their supervisory expertise. The sample size was deemed sufficient according to Mugenda and Mugenda's (2003) recommendation that 30% of a small population is adequate for descriptive studies. Data were collected through questionnaires and semi-structured interviews and analyzed using descriptive statistics and thematic analysis. Instrument validity was ensured through expert review and pilot testing, and reliability was confirmed with a Cronbach's alpha coefficient of 0.82. The findings revealed that most teachers had adequate academic qualifications but moderate self-efficacy, particularly in adapting to learner-centered approaches and designing competency-based assessments. Teacher confidence significantly influenced CBC implementation, showing a positive correlation ($r = .56$, $p < .05$) between self-efficacy and implementation success. The study concluded that teachers' self-efficacy is a pivotal determinant of CBC success, affecting instructional innovation, adaptability, and learner engagement. It recommended continuous professional development, peer mentorship, and leadership support to enhance teacher confidence and capacity. This paper contributes to the body of knowledge on teacher preparedness and curriculum reform by highlighting the critical role of teacher self-efficacy in competency-based education.

Keywords: Teacher Preparedness, Competency-Based Curriculum, Self-Efficacy, Pedagogical Competence, Professional Development, Teacher Confidence.

INTRODUCTION

Education is globally recognized as a fundamental pillar for human and national development, equipping learners with cognitive, social, and technical competencies vital for societal transformation. In the twenty-first century, education systems are shifting from traditional, content-focused curricula toward Competency-Based Curriculum (CBC) frameworks that emphasize learner-centered instruction, problem-solving, innovation, and adaptability (Gouëdard, 2020). CBC models aim to produce learners capable of applying knowledge to real-world contexts through critical thinking, collaboration, creativity, and communication.

Internationally, countries such as Finland, Singapore, and Canada have demonstrated that the success of curriculum reforms depends significantly on teacher preparedness encompassing academic qualifications, pedagogical competence, subject mastery, and self-efficacy (Darling-Hammond & Rothman, 2011). Finland integrates rigorous theory with practicum experiences in teacher education, while Singapore prioritizes continuous professional development to maintain teacher confidence and innovation. These global best practices affirm that teachers' confidence and professional growth are key drivers of curriculum transformation.

Across Africa, similar competency-based reforms have been implemented to improve education relevance and employability. Rwanda's 2015 CBC introduced learner-centered pedagogies emphasizing creativity and scientific literacy (Republic of Rwanda, 2015). In South Africa, ongoing teacher training programs have supported the shift toward formative assessment and student engagement. Such experiences underscore that teacher preparedness extends beyond qualifications, it encompasses confidence, adaptability, and professional resilience.

In Kenya, the CBC was introduced in 2017 to nurture critical thinking, digital literacy, communication, and self-efficacy among learners (Republic of Kenya, 2017). However, studies show that teacher readiness remains uneven due to inadequate training, limited instructional resources, and uncertainty in assessment strategies (Kaviti, 2018; Ndolo, 2018). Within Imenti North Sub-County, these challenges are intensified by rural–urban disparities in teacher training access and school support structures.

This study draws from Constructivist (Piaget, 1936; Vygotsky, 1978) and Social Learning (Bandura, 1977) theories. Constructivism posits that learners actively construct knowledge through experiences, requiring teachers to facilitate knowledge connections. Bandura's Social Learning Theory emphasizes self-efficacy teachers' belief in their capability to organize and execute teaching tasks as essential in motivating and guiding learners. Teachers with strong self-efficacy are more likely to persist through challenges, adopt innovative teaching strategies, and improve learner outcomes (Tschannen-Moran & Hoy, 2001).

Despite national efforts to strengthen teacher capacity, disparities persist in CBC implementation across Kenya (Sossion, 2018; KICD, 2017). Understanding how teachers' self-efficacy affects curriculum delivery is crucial for designing sustainable professional development models. Therefore, this study examined how teachers' self-efficacy influences the implementation of the Competency-Based Curriculum in public primary schools in Imenti North Sub-County, Meru County, Kenya.

METHODOLOGY

The study employed a mixed-methods approach combining quantitative and qualitative paradigms to gain a comprehensive understanding of teachers' self-efficacy in CBC implementation. A descriptive survey design guided the research, allowing systematic data collection and analysis without manipulation (Mugenda & Mugenda, 2012).

The study was conducted in Imenti North Sub-County, Meru County, a region characterized by diverse school environments, ranging from urban to rural contexts. The area was purposively selected because it reflects variations in teacher training, access to resources, and leadership support affecting CBC implementation.

The target population comprised 30 head teachers, 80 teachers, and one SCQASO (N = 111). A total of 34 participants were sampled, representing 30.6% of the population. The sample size was determined using the 30% guideline (Mugenda & Mugenda, 2003), considered adequate for small-scale educational research. Stratified random sampling ensured proportional representation of teachers and head teachers, while the SCQASO was purposively included due to expert input.

Table 1. Sampling Frame

Population Category	**Target Population**	**Sample Size**	**Percentage (%)**
Primary School Teachers	80	24	30.0
Head Teachers	30	9	30.0
SCQASO	1	1	100.0
Total	**111**	**34**	**30.6**

Two research instruments were used: teacher questionnaires and semi-structured interviews with head teachers and the SCQASO. Questionnaires gathered quantitative data on self-efficacy indicators using a five-point Likert scale, while interviews explored perceptions of confidence, motivation, and institutional support.

Instrument validation and reliability: To ensure validity, the instruments were reviewed by three education experts from Mount Kenya University specializing in curriculum studies and educational psychology. Their feedback guided refinement of question structure and clarity. A pilot study was conducted in two schools outside the study area to pretest clarity and reliability. Results informed minor revisions to enhance clarity and construct validity. Reliability analysis produced a Cronbach's alpha coefficient of 0.82, exceeding the 0.70 benchmark recommended by Creswell (2018), confirming high internal consistency.

Data were analyzed using descriptive statistics (means, percentages, and standard deviations) and Pearson correlation to determine relationships between self-efficacy and CBC implementation. Qualitative data were thematically analyzed to complement quantitative results. Ethical protocols included informed consent, anonymity, voluntary participation, and adherence to NACOSTI research guidelines.

FINDINGS AND DISCUSSION

Response Rate

All 34 targeted participants responded, achieving a 100% response rate, which enhanced the study's reliability and validity (Babbie, 2020).

Table 2. Response Rate by Category of Respondents

Respondent Category	Targeted	Responded	Response Rate (%)
Teachers	24	24	100%
Head Teachers	9	9	100%
SCQASO	1	1	100%

Influence of Teachers' Self-Efficacy on CBC Implementation

Teachers' self-efficacy was measured using statements assessing confidence in CBC teaching and assessment.

Statement	SA (%)	A (%)	N (%)	D (%)	SD (%)
I feel confident in my ability to implement CBC successfully	37.5	29.2	16.7	8.3	8.3
I am confident that I can implement CBC in my classroom	33.3	37.5	12.5	12.5	4.2
I believe I can overcome CBC-related teaching challenges	29.2	41.7	12.5	8.3	8.3
My confidence influences how I implement CBC strategies	45.8	29.2	8.3	8.3	8.3
I believe I can positively impact student learning through CBC	41.7	33.3	8.3	12.5	4.2

Approximately 66.7% of teachers reported confidence in implementing CBC, and 70.8% expressed belief in overcoming instructional challenges. A moderate positive correlation ($r = .56$, $p < .05$) indicated that self-efficacy significantly influenced CBC implementation effectiveness.

Qualitative Results from Interviews

Head teachers emphasized that confident teachers demonstrate initiative, creativity, and resilience. One respondent remarked, "Teachers who believe in themselves try out new CBC ideas." Another added, "CBC

works better when teachers are not afraid to innovate." A third commented, "When a teacher believes they can handle CBC, even pupils respond with enthusiasm and curiosity."

The SCQASO observed that self-efficacy grows through mentorship and recognition, stating, "Confidence improves when teachers are supported and allowed to learn from each other." These sentiments reflect Bandura's (1997) four constructs of self-efficacy:

- Mastery experience (successful CBC lessons that reinforce confidence)
- Vicarious experience (observing successful peers)
- Verbal persuasion (encouragement and feedback from colleagues)
- Emotional state (managing anxiety and maintaining positive emotions).

Together, these factors reinforce teachers' motivation, persistence, and adaptability core requirements for CBC implementation.

Table 3. Thematic summary from Interviews on Teachers' Self-Efficacy

Theme Identified	Frequency (HTs)	Supporting Quotes
Confident teachers show initiative	7/9	"Teachers who believe in themselves try out CBC ideas." – HT E
Teacher confidence boosts outcomes	6/9	"CBC works better when teachers are not afraid to innovate." – HT F

Note. HT = Head Teacher.

SUMMARY CONCLUSION AND RECOMMENDATIONS

Summary

The study established that teachers' self-efficacy plays a critical role in effective CBC implementation. Approximately 66.7% of teachers demonstrated confidence in applying CBC principles, and 75% believed their confidence positively influenced student outcomes. Teachers with high self-efficacy were more innovative, adaptive, and collaborative in their teaching practices.

Conclusion

Teachers' self-efficacy significantly influences their ability to implement the CBC effectively. Confidence in instructional capability enhances creativity, engagement, and innovation, making self-efficacy an indispensable factor in achieving CBC goals.

Recommendations

1. Strengthen teachers' self-efficacy through continuous professional development, mentorship, and reflective practice.
2. Encourage peer collaboration and feedback culture to reinforce teacher confidence.
3. Institutionalize supportive leadership frameworks that recognize and reward instructional innovation.

Suggestions for Further Research

- Conduct longitudinal studies to examine how teacher self-efficacy evolves over time.

- Undertake comparative studies across counties to explore regional variations in teacher preparedness.
- Explore the relationship between teacher education programs and long-term CBC implementation outcomes.

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