

# Developing Undergraduates' Ability to Manage any Situation in Life in Tanzania Selected Higher Education Institutions

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## ABSTRACT

The purpose of this study was to determine the development of the ability to manage any situation in life from implemented instructional models in Tanzania higher education institutions. The study adopted the longitudinal design. The study used a questionnaire to collect data in phase I and Phase II. Data were analysed using Yehs Index of Perception (YIP). A total of 183 student respondents participated in phase I and 70 respondents participated in phase II. Two institutions running undergraduate programmes using two different implemented instructional models, the Elusive Competence-Based Model (ECBM) in institution M2, and the Elevated Traditional Model (ETM) in institution D were included. The ECBM showed growth of the ability to manage any situation whereas the ETM showed deterioration. Respondents in institution M2 had low YIP scores in phase I and II; however, they had gradual improvement. In contrast, respondents in institution D had medium YIP scores in phase I and II; however, they showed deterioration although they remained with medium YIP score. Consequently, Tanzania studied higher education institutions graduates seem to complete the undergraduate education cycle without developing their ability to manage any situation in life beyond medium YIP score. This study concludes that the implemented instructional models do not develop the ability to manage any situation beyond Medium YIP score. To improve the YIP scores, the study recommends professors to find mechanisms that make students fully participate in whatever learning process strategy.

**Keywords:** *Implemented instructional models, Managing any situation, Higher education, Elusive competence-based model, Elevated competence-based model.*

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### Highlights of this paper

- The objective of this study was to determine the development of the ability to manage any situation in life from implemented instructional models in Tanzania higher education institutions.
- The study adopted the longitudinal design.
- This study concludes that the implemented instructional models do not develop the ability to manage any situation beyond Medium YIP score.

## 1. INTRODUCTION

Ability to solve problems one faces in life has been assumed to be one of the most important skills to present day graduates. In order to develop this ability and other related skills, there have been efforts to change the way universities teach their students both at undergraduate and post-graduate levels. The change has been geared toward using competency-based education, which emphasizes the use of learner-centered methods (active methods). Despite the pervasive adoption of the Competence-Based Model in education systems, little is known on whether the expected learning outcomes, namely lifelong learning, employability and good citizenship (Hadiyanto, 2016) are being achieved through the competency-based education, particularly in the higher education arena. In the view of this, though the competency-based education in many parts of the world receives a green light in higher education, in some places it faces resistance and it is assumed to be time-consuming among faculty members (Justo and Delgado, 2015). Managing to solve problems in various situations is one of the important features of lifelong learners, and the competency-based model is believed to develop lifelong learning orientation among learners (Voorhees, 2001).

In essence, a covert predominant message from literature is that the competency-based teaching and learning provides the ability to do jobs based on prescribed standards, both present-day jobs in society and future jobs i.e. jobs to emerge (Chinyere *et al.*, 2014; Nikolov *et al.*, 2014; Pasakovic *et al.*, 2015; Obwoje, 2016; Ait *et al.*, 2017). Importantly, competency-based teaching and learning creates highly flexible and adaptive graduates; the graduates who can cope with rapid changes happening in all spheres of life, namely economy, culture, technology, society and politics (Westera, 2001; Kennedy *et al.*, 2009; Makulova *et al.*, 2015; Todorovski *et al.*, 2015; Waychal, 2015; Hadiyanto, 2016; Zaytseva, 2016; Virtanen *et al.*, 2017). From these secondary data, competency-based teaching and learning is a form of pragmatic education that makes a graduate employable because s/he has received relevant education for the job market, but also, beyond that, the graduate is equipped with tools to survive in turmoil happening at any point in life. In the view of this, a graduate from competency-based teaching and learning is a never failing entity; s/he is a soldier with all forms of weapons to face all forms of unpredictable situations. The implication of this perspective of understanding a graduate from a competence-based instructional model is that graduates have to develop into independent and lifetime learners (see (Voorhees, 2001; Weimer, 2002; Kennedy *et al.*, 2009; Dano-Himosolongo and Vedula-Dinagsao, 2014)). Without doubt, literature gives a subtle message that graduates from competence-based teaching and learning can manage any situation in life. Thus the ability to manage any situation in life is one of the key outcomes from competence-based teaching and learning in education systems. These expected outcomes from competence-based teaching and learning have not gone without impact globally.

From the above understanding, there has been an overarching need to change the way higher education is provided to cope with social, economic and industrial rapid changes happening in the world (Nikolov *et al.*, 2014). As a solution to this speed of light changes, the substitution of traditional instructional model (moves from lecture to seminars) with the Competence-Based instructional model, which is assumed to provide quality education, has been seen as a matter of necessity rather than choice. Based on the literature, quality higher education the

Competence-Based Model can offer is that which helps students cope with global changes happening in workplaces and other situations in life including facing with baldness the problem of unemployment (Westera, 2001; Obwoye, 2016). As has been noted, it is education that is provided through creative methods, curricula and it responds to present and future jobs requirements; this is to say it bridges a gap between what is offered in the mainstream education system and the real life (Nikolov *et al.*, 2014). As it stands, the kind of education offered through competency-based teaching and learning produces an all weather graduate; a graduate who can solve problems in any setting without difficulties because his/her mind is trained to think in such a way that she/he can manage any situation in life. Given the importance of managing any situation in life, the researchers were interested to know whether or not undergraduate students developed an ability to manage any situation in life from the training they receive through implemented instructional models in Tanzania higher education institutions<sup>1</sup>. This study is important because the ability to solve problems including those which are unexpected is one of the core competencies of Competence-Based Education (Hadiyanto, 2016).

Indeed, most of the available literature is more of information giving about what we should expect from competence competence-based instructional model rather testing whether or not what we expect to achieve as learning outcomes materialise. A few scholars (Potvin *et al.*, 2012; Tientongdee, 2018) have examined the development of problem-solving skills when active methods are used in teaching and results have shown promising improvement in terms of the development of the skills. However, these studies were subject to specific research. The present study attempts to understand whether or not the implemented instructional models in Tanzania develop ability to manage any situation among year-one undergraduates. This is especially important when the study includes institutions which officially are recognized as applying the Competence-Based Model (CBM), those under National Council for Technical Education (NACTE), and those which have just begun to adopt the CBM, those under the Tanzania Commission for Universities (TCU). In this regard, the implementation of the CBM from the latter, it has remained traditional in many respects in practical terms. In other words, experience has shown that higher education institutions under TCU still use the traditional model (TM), "lecture to seminar model." In bid for understanding whether or not the CBM and the TM develop ability of students to manage any situation, it should be put clear that scholars identify three implemented instructional models in higher education in Tanzania, namely the Elusive Competence-Based Model<sup>2</sup> (ECBM), the Elevated Traditional Model<sup>3</sup> (ETM) and the Concentrated Competence-Based Model<sup>4</sup> (CCBM). Therefore, the examination on whether students' ability to manage any situation develops, stagnates or deteriorates from implemented models is based on these three implemented instructional models generated from two higher education institutions. as such, the question is, are implemented instructional models in Tanzania higher education institutions promote the development of ability to manage any situation in life?

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<sup>1</sup> These are institutions under NACTE or TCU mandated to confer degree

<sup>2</sup> The instructional model operating in an officially recognized competence-based institution, but in practice it moves from lectures to group and individual assignments without seminar sessions followed by final exams

<sup>3</sup> The instructional model that moves from lectures to seminars sessions, but the seminar sessions are active only in some courses in programmes followed by final exams

<sup>4</sup> The instructional model that concentrates on students' presentations in all contact hours and formative assessment dominates i.e. no examinations but publishable works from students' presentations

## 2. METHODS

This study employed a longitudinal design. The data were collected twice at the beginning of the semester I and at the end of semester II. This was a duration of approximately eight months of training processes in selected programmes and institutions. The design was used because it is useful in understanding changes to happen overtime. The study employed questionnaires to collect data from year-one undergraduates from two different higher education institutions. The questionnaire was adapted from (Kirby *et al.*, 2010). There were four likert items to measure ability to manage any situation. The contents of which were: ability to deal with unexpected problems; ability to deal with uncertain situations; ability to handle confusing situations and ability to generate a number of solutions for a problem. The study used whole sampling technique to get the sample size. The technique was adopted because longitudinal studies are usually characterised by a decline of respondents over time. From this, the researchers decided to include all prospective respondents who were willing to participate in the study through the study’s phases of data collection. In this study, the researchers used a ‘blank cell technique’ to identify respondents who did not fill in the questionnaire in a sincere way. In this technique, the researchers included blank cells in the questionnaire and required the respondents to read the likert item before filling it in. In this situation, if a respondent filled in even the blank cells the researchers would assume that the respondent did not read the likert items before filling in them. Such questionnaires were not analysed. In phase I, for example, 15 out of 198 (8%) questionnaires were not analysed for the same reason whereas in phase II 76 out 146 (52%) questionnaires were not analysed. In the view of this, in phase I, the sample size was 183 and it was 70 in phase II. Moreover, this study included two programmes which were purposively selected for data that required observation and interviews, which are not part of this extract of the whole part of the study. The same applies to institutions included in this study; they were purposively selected and their names are in pseudonyms as shown in Table 1. Table 1 clarifies expected and reached respondents by phases, programmes and institutions.

Table-1. Expected and reached respondents by phases, programmes and institutions.

| Phases | Respondent category | Programme & institutions | Expected respondents | Reached respondents | Percent reached | Remarks    |
|--------|---------------------|--------------------------|----------------------|---------------------|-----------------|------------|
|        |                     | Institution M2           |                      |                     |                 |            |
| I      | Students            | B Ed                     | 100                  | 80                  | 79              | Suspicious |
| II     | Students            | B Ed                     | 100                  | 23                  | 23              | suspicious |
|        |                     | Institution D            |                      |                     |                 |            |
| I      | students            | BA Ed                    | 300                  | 103                 | 33.33           | Suspicious |
| II     | students            | BA Ed                    | 103                  | 47                  | 45.6            | Suspicious |

In addition, this study used ‘the odd out technique’. In this technique, the respondents were asked to star an item they felt that they did not understand its meaning. The purpose was to discriminate from analysis items which respondents did not understand in order to increase the reliability of findings. However, there was no such event in both phases. In this study, the data were analysed using the Yehs Index of Perception (YIP). The decision rule for the YIP was that below 0.20 is very low; 0.20-0.39 is low; 0.40-0.59 is medium; 0.60-0.79 is high and 0.80 and above is very high.

## 3. RESULTS

As has been noted earlier, in this study two higher education institutions were included; these were institution M2 which implemented the ECBM and institution D which implemented the ETM. As such, the findings are presently based on institutions. The findings from institution M2 are presented first and the findings from institution D are presented thereafter. As it is, Table 2 shows that the ability of student respondents from

institution M2, which used the ECBM, had low ability to manage any situation in life in phase I; however, their ability on the same appeared to improve or to develop toward a positive direction in phase II though it remained low. Table 2 shows a summary of the results.

Table-2. Development of ability to manage any situation in phase I and II: B Ed in institution M2.

| Dimension and Likert items   | Likert item responses in % phase I |           |       | Likert item response in % phase II |           |       | YIP-I | YIP-II |
|------------------------------|------------------------------------|-----------|-------|------------------------------------|-----------|-------|-------|--------|
|                              | Disagree                           | Undecided | Agree | Disagree                           | Undecided | Agree |       |        |
| Managing any situation       |                                    |           |       |                                    |           |       |       |        |
| Can deal with unexpected     | 13.75                              | 22.5      | 63.75 | 13.6                               | 18.2      | 68.2  | 0.50  | 0.54   |
| uncomfortable in uncertainty | 58.75                              | 18.75     | 22.5  | 18.1                               | 36.4      | 45.5  | 0.36  | 0.27   |
| Can make meaning in disorder | 17.5                               | 22.5      | 60.00 | 9.1                                | 13.6      | 77.3  | 0.42  | 0.68   |
| Prefer one solution problems | 36.25                              | 16.25     | 47.5  | 50.0                               | 4.5       | 45.5  | 0.11  | -0.04  |
| <b>Average for YIP</b>       |                                    |           |       |                                    |           |       | 0.35  | 0.38   |

Source: Created by researchers through field data, 2018.

In institution D, Table 3 shows that respondents had the medium ability in managing any situation in life when they joined the institution in phase I of data collection. However, the respondents appeared to dramatically develop toward a negative direction (deteriorated) through the ability remained medium. The implemented instructional model for this programme, BA Ed and institution was ETM.

Table-3. Development of ability to manage any situation in phase I and II: BA Ed in institution D.

| Dimension and Likert items   | Likert item responses in % phase I |           |       | Likert item responses in % phase II |           |       | YIP-I | YIP-II |
|------------------------------|------------------------------------|-----------|-------|-------------------------------------|-----------|-------|-------|--------|
|                              | Disagree                           | Undecided | Agree | Disagree                            | Undecided | Agree |       |        |
| Managing any situation       |                                    |           |       |                                     |           |       |       |        |
| Can deal with unexpected     | 9.7                                | 12.6      | 77.7  | 10.6                                | 4.3       | 85.1  | 0.67  | 0.74   |
| uncomfortable in uncertainty | 17.5                               | 20.4      | 62.1  | 19.1                                | 27.7      | 53.2  | 0.45  | 0.34   |
| Can make meaning in disorder | 3.9                                | 19.4      | 74.7  | 6.4                                 | 21.3      | 72.3  | 0.72  | 0.66   |
| Prefer one solution problems | 32.0                               | 21.4      | 46.6  | 38.3                                | 31.9      | 29.8  | 0.14  | -0.08  |
| <b>Average for YLLAIP</b>    |                                    |           |       |                                     |           |       | 0.49  | 0.41   |

Source: Created by researchers through field data, 2018.

#### 4. CROSS-CASE ANALYSIS OF RESULTS

It appears that respondents in institution M2 had a lower ability to manage any situation when compared to those in institution D at the time they joined the institutions. Respondents in institution M2 had the low ability but showed steady development whereas those in institution D had the medium ability, but showed deterioration. It is surprising to find that the ability to manage any situation developed steeply toward a negative direction for respondents in institution D which used the ETM when compared to institution M2 which used the ECBM.

#### 5. DISCUSSION

The ECBM appears to contribute to the improvement of ability to manage any situation in life among students whereas the ETM culminates in deterioration of ability to manage any situation in life. These findings contrast those of scholars (Potvin *et al.*, 2012; Tientongdee, 2018) who report that active methods contribute to the improvement of problem-solving skills. One way to explain these findings is through the speculation that students in institution M2 participation rate in the group and individual assignments were genuine whereas in institution D despite the presence of seminar sessions and presentations in some courses; it seems the participation in individual and group assignments was spurious. That is to say in institution D a few students shouldered the responsibility to

learn and the rest of students copied assignments from their colleagues or they did not participate in preparing presentations. Furthermore, this implies that students in studied higher education institutions complete the undergraduate education cycle without developing their ability to manage any situation in life beyond the medium level. From the above discussion, this tells us that bachelor degree graduates cannot face the challenges they meet in life with boldness and efficiency. The majority are likely to remain unemployed because they cannot think creatively and in a prompt way how to address the challenge they face, and they are likely to be unable to solve problems in other spheres of life as well. To clarify, we can use an engine oil analogy. If the engine oil is full then the efficiency of the engine is likely to be 99%, but if the oil is just half of the stick the likelihood is that the efficiency of the engine will go down. In the same way, if the ability to manage any situation is medium this suggests low efficiency in handling problems in different situations and therefore the quality of life of a graduate and society is likely to be low.

## **6. CONCLUSION**

The implemented instructional models in studied higher education institutions in Tanzania result in very gradual or no development of student ability to manage any situation in life. As it stands, the development of the ability to manage any situation in life through the implemented instructional models does not go beyond Medium YIP score after completing the undergraduate education cycle.

## **7. RECOMMENDATIONS**

It is important for professors to find mechanisms that can make all students fully participate in assignments provided during training time. Moreover, a similar study can be conducted to compare year-one students and year-three students to see whether or not they have the same YIP scores in terms of the ability to manage any situation in life.

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