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The Pedagogy of Teacher Education in Ethiopia: Reconstructing Understandings and Practices on Teaching about Teaching and Learning to Teach

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Abstract

There is an argument that Marshal McLuhan's 'the medium is the message' adage is more likely to be underpinned in the context of teacher education since pedagogy is not only a means of delivering content in teacher education but also the content (what) in teachers' professional preparation. The quality of teacher education depends heavily on the practice of teacher educators and the learning experiences of student teachers: Pedagogy of teacher education. The pedagogy of teacher education is conceptualized as teaching about teaching and learning to teach. Using primary data from teacher educators and student teachers and secondary data sources (documents and research studies), the paper examined and reflected on Ethiopian teacher education pedagogy. Questionnaire, interview and observation were used to collect primary data. The findings revealed ingrained assumptions that student teachers learn to teach by learning theories and facts of different courses through lectures, discussions, and group work. Teacher educators in the study characterized their typical classroom as a combination of 'reviewing of the previous lesson, explanation, discussion, and lesson summary' which inherently reflects features of a typical classroom in Ethiopian schools. When asked which pedagogies help student teachers to learn to teach, teacher educators mentioned group work, discussion, lecturing, oral questioning and classwork, quiz, and practicum (ordered in terms of frequencies). It is argued that teaching about teaching and learning to teach are customarily reduced to the delivery and learning of course contents rather than the 'how' of teaching through teacher educators' modeling and reflection, student teachers' school experiences, or other pedagogies that develop learning to teach among student teachers. Teacher educators' practices, however, in some cases demonstrated elements of active learning techniques aimed at improving mastery of content and practicing teaching skills. However, their interview responses on preparing teachers largely lack pedagogies relevant to learning to teach. Efforts to improve the quality of education in general and teacher education, in particular, should prioritize the critical examination and reform of teacher educators' preparation, professional developments, and pedagogical practices at teacher education colleges and universities.

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Introduction

Though lauded for its progress in dramatically improving access to general education and higher education, reducing gender and other social disparities at various education levels, Ethiopia's education system has struggled to improve poor learning outcomes, accountability, and

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teacher quality. The general education system has undertaken many large-scale reforms in the areas of curriculum, teacher education, school improvement, inspection, and assessment to improve the quality, equity, and relevance of the general education.

The General Education Quality Improvement Program (GEQIP), which aims to improve the quality, efficiency, and equity of the general education sector, has been designed and implemented by the government and development partners to support rolling five-year Education Sector Development Programs (ESDPs). Despite improvements in access to education and educational equity, the efficiency of the education system and the quality of learning have remained key challenges. For example, Early Grade Reading Assessments (EGRA) consistently show that students' fluency and reading comprehension levels in mother tongue are below average and have declined in the most recent 2021 EGRA. Early Grade Reading Assessment 2021 found that 67.9% and 51.1% of sampled Grades 2 and 3 students were defined as zero readers (Educational Assessment and Examinations Service, 2022). Worse still, the proportion of zero readers in the EGRA 2021 (59.5%) is significantly higher than from the previous three EGRA results in 2014 (42.2%), 2016 (32.1%), and 2018 (37.2%). Parents and other concerned entities point the problem squarely at educational leaders, teachers' low competence and motivation, students' learning habits and interests, and the politicization of the education system that is said to be undermining meritocracy, depriving professionalism, and loosening accountability.

Quality of education is conceptualized in many different ways. In Ethiopia, 'student learning outcomes' is one of the criteria used in the education sector development programs and policy documents (see Education Sector Development Programme (ESDP I-VI). A multitude of in-school and out-of-school factors influence student learning. There is a firm consensus among educators and researchers that the quality of an education system depends to some extent on the quality of teachers (Kyriakides et al. 2014). Content knowledge, pedagogical content knowledge, general pedagogical knowledge, teacher beliefs and commitment, and experience are typically associated with better student achievement although studies are inconclusive on the effect of these variables on student learning (Harris & Sass, 2011).

Of the quality-related indicators for teachers, certification and possession of a major degree in the subject to be taught appear to improve student achievement significantly (Darling-Hammond, 2006). It should be noted that certification does not mean the mere completion of a course of study at a specific teacher training college or university. Rather, it is a quality assurance process for teacher education that graduates of teacher education have to go through before entering the profession. Attempts to do this in Ethiopia through licensing and re-licensing of teacher education college graduates, teachers, and school leaders showed that only 24% managed to pass paper and pencil exams administered after graduation, indicating that most of the graduates from teacher education colleges do not have the necessary academic competence to teach in schools (Ministry of Education, 2021b).

Efforts to improve teacher quality in Ethiopia have focused on upgrading or raising teacher qualifications from certificate to diploma, diploma to undergraduate, and undergraduate to graduate degree, with the assumption that improving teacher qualifications will result in better

prepared teachers who can improve student learning outcomes (Education Sector Development Programs I to V. Until the recent roadmap-initiated change in the required qualifications for primary, middle and secondary school teachers, it was reported that 92.4% of male and 85.5% of female teachers were adequately qualified to teach grades 1 to 4 (minimum diploma in teaching) (Ministry of Education, 2019). The percentages of male teachers and female teachers with teaching diplomas were 48% and 63% respectively in 2013/14, indicating the massive upgrading that took place in five years. The same document shows that more than 86% of second cycle primary teachers are qualified for grades 5-8. Likewise, 98.8% of male and 80% of female teachers in grades 9 and 10 meet the qualification requirements (undergraduate degree). However, the question remains whether the mass upgrading of teachers to improve teaching and learning practices in schools and student learning has paid off. Notwithstanding the fact that student learning is influenced by many in-school and out-of-school factors, the evidence on student learning at the beginning of this section does not build confidence that simply upgrading teachers with the same modality and process leads to the improvement of the current learning crisis in Ethiopia.

So the question is, what are the reasons that most of the teachers who are prepared in colleges and universities fail the licensing and relicensing quality assurance system? Why isn't EGRA performance improving even though school teachers have been consistently promoted to diploma and undergraduate level for more than a decade? As mentioned earlier, several complex factors explain student learning. However, since teachers are one of the most important factors, teacher educators and teacher education institutions need to examine their practices. Educators and researchers, in most cases, prefer to point the finger at the structure and curriculum of teacher education. As a result, teacher training programs have been the target of many different reforms and have become a soft target for simplified restructuring and reform. What have come under less scrutiny, knowingly or unknowingly, are the practices of teacher education institutions. These institutions are where student teachers and in-service teachers develop their teaching and learning skills. This problem appears to be the case in most parts of Africa, as efforts to improve quality are less focused on the how of teacher education which is a key factor to foster teacher competencies that meet the learning needs of students in real classrooms (Pryor, Akyeampong, Westbrook, & Lussier, 2012).

Studying the practices of teacher educators is fundamental if teacher education is to develop teaching and learning to teach skills to student teachers and teachers. It is equally important that teacher educators review their practices and engage in professional development activities to continuously develop their own practices and in turn support teachers.

Pedagogy of Teacher Education: Why Is It Critical?

The effect of teacher education on the beliefs, skills and knowledge of student teachers or teachers depends on many variables such as teacher education candidates' profiles, teacher educators' practices, teacher education program design, and other institutional conditions. It

appears that teacher education can bring change to student teacher knowledge, beliefs, and skills when teacher education programs deliberately challenge student teachers' beliefs and attitudes about learning and teaching, when program components are coherent, and when teacher educators support student teachers in learning to teach, and teacher educators model effective pedagogies to student teachers (Darling-Hammond, Hammerness, Grossman, Rust, & Shulman, 2005). Empirical studies also show that the design of teacher education and teacher educators' modeling of pedagogical practices contribute to developing teaching skills and how to learn to teach skills among student teachers (Acquah, Szelei, & Katz, 2020; Baran, Canbazoglu, Albayzrk Sari, & Tondeur, 2019). For this to happen, teacher educators have to develop their own professional identities and roles.

Many teacher education researchers agree with Darling-Hammond that “Teacher educators must worry about not only what to teach but also how to teach so that knowledge for teaching shapes teachers' practice and enables them to become adaptive experts who can continue to learn (Darling-Hammond, 2006, p. 305).” Korthagen, Loughran, and Lunenberg (2005) noted that teacher educators not only have a role to support student teachers in learning about teaching but also to model the teacher's role through their practices. Loughran and Berry (2005) underscored the repeated call for teacher educators to be mindful of their practices, citing the adage that teacher educators must ‘walk the talk’ and ‘practice what they preach’.

The extension of this argument for some authorities is that teacher education processes are more important than the content of teacher education (Lunenberg, Korthagen, & Swennen, 2007). In Grossman's terms, in teacher preparation and professional development ‘The medium is the message’ (Grossman, 2009). Therefore, for a teacher educator teaching subject-specific or general methods or even content area courses, the way a teacher educator designs and teaches the course is at least as important as the content of the course. Cochran-Smith, Grudnoff, Orland-Barak, and Smith (2020, p.20) stated:

...teacher educators need to have knowledge of the pedagogy of teacher education. This does not emerge naturally from knowing how to teach in P-12 schools, even when teachers have attained the level of expertise that some would label “master teacher.” Likewise, knowledge of the pedagogy of teacher education is not an automatic result of scholarly expertise in an area that is relevant to teaching and learning, even when teacher educators have or are in the process of earning PhDs in those areas. Rather the practice of teacher education... requires teacher education pedagogies such as mentoring, coaching, and mediated interactions involving feedback, critical dialogue, and guided self-reflection.

Loughran (2006) postulated that the pedagogy of teacher education is based on two interrelated components of knowledge and practice: teaching about teaching and learning about teaching. According to Loughran (2014, p.275):

Teaching about teaching encompasses “a serious focus on pedagogy, conceptualizing teaching as being problematic, making the tacit nature of practice explicit (for oneself and others—especially students of teaching), developing a shared language of teaching and

learning, and the ability to articulate principles of practice. Learning about teaching is concerned with the knowledge and practices related to how students of teaching come to learn from, and then develop as a consequence of, their teacher education experience.

Teacher educators should design activities for student teachers to examine teaching and make teaching a subject of research and study so that student teachers and teacher educators reflect on teaching skills and practices. “Such inquiry opens teaching to questioning, probing, reflection and critique that goes way beyond the technical” (Loughran, 2007, p. 2). However, teacher education practice does not always live up to the expectation that teacher educators should not only teach student teachers about teaching, but also teach them how to teach. Despite much evidence that theories learned in teacher education cannot be easily transferred to teacher practice in schools, many teacher education programs still reflect the traditional ‘application of the theory model’. Ben-Peretz (1995) shared Grossman's view that the medium is the message in teacher education and also emphasized the need for experimentation, reflection and coherence in the teacher education curriculum. However, “the hidden curriculum of teacher education tends to communicate a fragmented view of knowledge, both in coursework and in field experiences. Moreover, knowledge is “given” and unproblematic” (Ben-Peretz, 1995, p.456).

Another central theme in the pedagogy of teacher education is its similarity and differences with teaching in schools and higher education institutions. Teacher educators have different roles compared to school teachers (Dinkelman, Margolis & Sikkenga, 2006a; Dinkelman, Margolis & Sikkenga, 2006b; Wood & Borg, 2010). One of the challenges for teacher educators is the transition from the role of teacher-to-teacher educator (Murray & Male, 2005). Wood and Borg (2010) characterized this transition ‘a rocky road’, pointing its difficulty and the lack of organized support for teacher educators in developing pedagogies and roles appropriate to teacher education. Due to lack of support, teacher educators use their experience as school teachers which does not adequately reflect their role as teacher educators. Wood and Borg (2010, p.7) found that “Conflict arises within the teacher educator when they begin to recognize that first order practice [teaching in schools] is not sufficient for teaching students about teaching, and that they now need to include the practices and discourses of both school teaching and teacher education.” Murray and Male (2005, p.17) emphasized that pedagogical knowledge gained from schools does not easily transfer to the teacher education preparation and teacher educators should have ‘...new and different types of professional knowledge and understanding, including extended pedagogical skills from those of school teachers.’ Teacher educators who have experience in schools should receive support in the transition from a classroom teacher to a teacher educator (John, as cited in Murray & Male, 2005).

Based on analysis of effective teacher education programs, Darling-Hammond and Bransform (2006) identified pedagogical approaches to teacher preparation that involve both teaching about teaching and learning to teach. One important pedagogy is continuous and developmental clinical experiences. In Ethiopia, there is a tendency to conceptualize clinical or supervised student teaching experiences as a one-off phenomenon that occurs towards the end of

a teacher education program. Clinical experiences should be integrated into various course works and sequenced developmentally so that student teachers can continuously reflect on their experiences. According to Darling-Hammond and Bransford (2006), the success of clinical experiences depends on:

- clarity about the goals of the experience, including the performances and practices to be developed;
- modeling of good practices by more expert teachers in which teachers make their thinking visible;
- frequent opportunities for practice with continuous formative feedback and coaching;
- multiple opportunities to relate classroom work to university coursework;
- gradual responsibility for all aspects of classroom teaching; and
- structured opportunities to reflect.

Another important pedagogy in teacher preparation is performance assessment strategies. Teacher education should support student teachers to develop teaching practices and learning to teach skills through micro-teaching, performance tasks, and teaching portfolios. Assessment in teacher education should allow student teachers to demonstrate skills and attitudes and to reflect on their experiences. Learning to teach requires opportunities to practice and demonstrate instructional activities and reflect on their experiences so that teacher education cultivates the way and culture for continuous professional development of teachers. Student teachers also need opportunities to analyze teaching and learning using student work samples, cases, video tapes of classroom practice, video cases, and curriculum materials. Action research and autobiography are also important pedagogies that prepare student teachers to learn to teach by examining their practices in a systematic and purposeful manner. Attempts to flesh out the core principles and practices of teacher education have been going on for two decades. This is discussed in the next section.

Evolution of Teacher Education Approaches

Teacher education's approach in the preparation of teachers has been characterized by different approaches over the last century. These are: the academic orientation, school-based or practice-based teacher education, the competency-based education, and inquiry-based teacher education. Currently there is a movement towards core teacher education practices. There is a shift from knowledge needed for teaching to the use of that knowledge in practice (Grossman & Dean, 2019). One of the overriding arguments in the design and pedagogy of teacher education program has been the integration of theory and practice (Tighe & Korthagen, 2004). Most teacher education programs are based on the teaching of theories to student teachers who are expected to put these into practice in schools during internships and teaching in schools. This rational theory approach is dominant in teacher education practice although its effectiveness deviates a lot from evidence on learning to teach.

As a result of the limitations associated with the theory-based design and program of teacher education, the focus shifted to the organization of practical experiences of student teachers and school-based or practice-based teacher education (Tigchelaar & Korthagen, 2004). Critics, however, argue that a practice-oriented approach resulted in mentors and school practices being adopted rather than reflecting on them and integrating theory and practice (Cole, 1997).

The Ethiopian teacher education program that came closest to practice-based teacher education program was during the early stages of Teacher Education System Overhaul (TESO). One of TESO's five priority areas was "to plan a strategy to involve teacher education institutions in schools." (Ministry of Education, TESO Handbook, 2003). TESO further argues:

It is important that strong and mutually beneficial links between TEIs [Teacher Education Institutions] and schools should be developed both for the development of teacher educators' knowledge and understanding of the type of school for which the student teachers are being prepared and to provide teacher educators with the opportunity to undertake some school teaching to develop their expertise (p. 10).

In addition to conceptualizing school-based teacher education as a means to enhance the professional development of teacher educators, TESO outlined that tutor teachers 'become part of the program [teacher education], especially on the methods aspects, and develop collaborative studies by teachers and teacher educators.' The practicum, which was intended to offer student teachers with opportunities to observe and reflect on school practices and school teachers, had a dual purpose to learning from mentor teachers and serving as an object of reflection based on learned theories in teacher education colleges. The duration of the practicum and the structure embedded in teacher education colleges and schools are also additional indications that TESO dominantly approached a practice-based teacher education program although it had also elements of reflection which were largely limited to the practicum component of TESO.

The third approach in the design of teacher education program is the competency-based education in which teacher education programs identify specific instructional knowledge, beliefs and skills for student teachers to master (Zeichner, 2013). Proponents of this approach emphasized that teacher education can prepare teachers who meet the specific skills and beliefs required in actual workplace situations while opponents have criticized the approach as reductionist and rigid (Kerka, 1998). In Ethiopia, competency-based education is emphasized in technical and vocational education and has also been an agenda during the revision of higher education curriculum, including teacher education programs. Teacher education programs and the licensing and relicensing directorate in the Ministry of Education had also developed a thorough list of general and subject specific competencies to guide the teacher preparation and certification.

The fourth approach is the inquiry-oriented approach, which aims to develop teachers' capacity to reflect on teaching and learning practices. It also emphasizes the unpredictability and problematic nature of teaching (Zeichner, 2013). Teacher educators and student teachers examine their practices through self-study, action research, and other reflective techniques.

Recently, there is a movement to identify core principles and practices of teacher education (Ball & Forzani, 2009; McDonald, Kazemi, & Kavanagh, 2013; Forzani 2014). The focus of the core principles and practices effort is developing "...tasks and activities that are essential for skillful beginning teachers to understand, take responsibility for, and be prepared to carry out to enact their core instructional responsibilities" (Ball & Forzani, 2009, p. 504). According to Ball and Forzani (2009, p. 503) teacher education needs to 'shift from knowledge to practice:

To make practice the core of the curriculum of teacher education requires a shift from a focus on what teachers know and believe to a greater focus on what teachers do. This does not mean that knowledge and beliefs do not matter but, rather, that the knowledge that counts for practice is that entailed by the work.

Grossman, Hammerness, and McDonald (2009) noted that teacher educators are responsible for facilitating the learning of core practices through a pedagogy of practice for teaching. This pedagogy of practice involves a cyclical process to (i) introduce and learn the activity or practice through case studies, videos, and teacher educator modeling, (ii) prepare and rehearse the activity through collaboration and micro-teaching, (iii) enact the activity through the collaboration of teacher educators, student teachers and teachers, and (iv) analyze and reflect on the activity carried out. According to these authors, the selection of practices should take into account the following criteria:

- Practices that occur with high frequency in teaching;
- Practices that novices can enact in classrooms across different curricula or instructional approaches;
- Practices that novices can actually begin to master;
- Practices that allow novices to learn more about students and about teaching;
- Practices that preserve the integrity and complexity of teaching; and
- Practices that are research-based and have the potential to improve student achievement.

Similarly, Kazemi, Franke and Lampert (2009, p.15) identified responsibilities for teacher educators to facilitate the learning of core instructional activities in mathematics. Teacher educators are responsible to:

- exhibit and demonstrate an instructional activity;
- situate the activity in theoretical and empirical evidence that it is likely to result in student learning;
- give student teachers the opportunity to deliberately practice instructional activities with proper coaching;
- structure collaborative work on problems of teaching practice;
- scaffold student teachers' preparation for doing the activity with students;
- rehearse and deliberate the enactment of the plans; and
- assess and reflect on student teachers' practices.

In sum, studies on how student teachers and teachers learn to teach have shifted the focus from learning of theories on teaching and learning to making practice a subject of the knowledge base of teacher education pedagogy.

Teacher Education Pedagogy in Ethiopia: Evidence from Observations and Studies

The scholarship of teacher education in Ethiopia differs considerably from the global professional debate and discourse on teacher education. The political and academic discourse usually neglects teacher education practices and deals excessively with structural issues such as duration of teacher education program, the modality of teacher education, and the inclusion or exclusion of courses deemed essential to teacher preparation. While there is an understanding that teacher education can assume alternative program designs and features, the debate in Ethiopia is reduced to a dualist argument as to whether an integrated or a consecutive model of teacher education program best prepares school teachers. Teacher education program design issues are reduced at times to the identification of teacher education courses and preparation of course breakdown. While current research in teacher education focuses heavily on how theory and practice are integrated in a teacher education program, the discourse in Ethiopia is on how many of the courses should be subject area and how many of the courses should be general pedagogy and specific method courses. In addition, although the practicum in Ethiopian teacher education was designed to be developmental so that students could feed forward their courses and experiences in teacher education with field experiences from schools, most teacher education institutions have decided to have a three-month practicum at the end of the program. There is also a move towards specialization in the preparation of primary school teachers although evidence in many parts of the world shows primary school teachers are prepared to teach at least two subjects. In general, teaching about teaching and learning to teach do not surface as a common agenda in teacher education discourse. The simplistic and reductionist views on changing the duration, structure, and composition of the knowledge bases of teacher education courses are central ideas in policy making and practice debate. This, however, does not mean that these components of teacher education are not important. Rather, it should be emphasized that changing these components of teacher education without changing assumptions and practices of teacher educators and student teachers regarding teaching about teaching and learning to teach would not suffice to change teacher education.

Teacher education also seems to be one of the ‘soft targets’ for policy makers and leaders as they tend to change the structure and program arrangements without giving serious thought to how and why the changes are introduced. Hence, although teacher education is one of the priority areas in Ethiopian educational policy and educational discourse, it is starved of informed, in-depth and impactful academic scholarship and strategic leadership.

With regard to the roles and responsibilities of teacher educators, Ministry of Education Guideline (2017) indicates that teacher educators are required to assume teaching responsibilities, conduct research, offer community services, and bridge partnerships between colleges of teacher

education and schools. All teacher educators are required to be certified in Higher Diploma Program (HDP) which is aimed to develop the pedagogical skills of teacher educators. Teacher educators are also required to participate in English language improvement programs.

Apart from a few articles that examine Ethiopian teacher educators' professional development, little attention has been given to teacher education pedagogy both in the preparation of student teachers and upgrading of in-service teachers. Some of the studies conducted on teacher education reported that despite reform agendas such as 'active learning', 'competence', 'participatory', 'paradigm shift' and 'system overhaul', teacher education in Ethiopia during TESO followed technical rational model (Tessema, 2007). Others pointed to imbalance and lack of coherence among the components of teacher education programs, and permeability of teacher education to underprepared students (Mekonnen, 2008). Negasi (2015) argued for a competence-based teacher education and proposed a strong alignment between the teacher education curriculum and competencies of school curriculum. Semela (2014) criticized that teacher education reform efforts failed to maintain minimum quality standards although they managed to supply teachers in improving access to and equity of education. Areaya (2016) called for a teacher education policy and the establishment of teacher education universities and centers of excellence to inform policy making on teacher education and improve the practice of teacher education.

Some studies also reported that teachers pedagogical content knowledge are not adequately addressed both in the design of teacher education courses, teacher education practices, and practicum supervision (Tesfamichael & Mulugeta, 2018). In relation to teacher educators, Barnes, Zuilkowski, Mekonnen, and Ramos-Mattoussi (2018) examined teacher educators' preparation of local language teachers and concluded that teacher educator professional development programs should be designed to develop teacher education pedagogies and role identification as teachers of teachers. Wamisho (2021) reported that there is clear direction on the recruitment and development of teacher educators and recommended apprenticeship model in the preparation of teacher educators and development of additional capacity building programs for teacher educators. Assefa et al. (2021) used questionnaire and observation to assess the use of behaviorist and constructivist methods and assessment practices in higher education institutions. While it appears too simplistic to categorize teacher education pedagogies along two dichotomies and may not as such capture the teaching specific pedagogical practices such as coaching, reflection, modelling, Assefa et al. (2021) reported that about 81.4% of college instructors used the constructivist approach in the implementation of the teacher education curricula.

Evidence on teacher education casts doubt on the relevance and effectiveness of teacher education programs unless teacher education programs intentionally and continuously provide student teachers with a wide-range of opportunities to examine their beliefs about teaching and learning, to observe, model, and reflect on teaching practices, act and reflect on their own and other educators' practices (Darling-Hammond, Hammerness, Grossman, Rust, & Shulman, 2005). However, as already mentioned, the design of teacher education and the pedagogy of teacher education in Ethiopia are reduced to some structural matters and do not receive the necessary attention in teacher education reforms or programs. Considering the above reasons, this paper

intends to examine the pedagogy of teacher education in Ethiopia so that teacher educators and researchers can contemplate and reflect on their practices as much as other teacher education challenges such as quality of the candidates, resources, and teaching and learning environments.

At a teacher education reform workshop organized by the Ministry of Education a few years ago, most of our fellow teacher education colleagues argued that teacher educators in Ethiopia have many years of experience in working in colleges of teacher education and are ‘senior experienced staffs to prepare teachers effectively if the modality and duration of teacher education was improved.’ Such a view that we have everything is the antithesis of the pedagogy of teacher education: hence we should continuously reflect on our practices. In fact, if we mirror our usual practices in teacher education colleges in the form of lectures, power point presentations, group discussion, paper-pencil based testing of trainees’ knowledge and our understandings of how teachers change and learn with the evidence on effective teacher education programs and practices, there is too much to bridge.

In sum, teacher education reforms and research in Ethiopia have largely focused on changing structural and curriculum components and paid little attention to changing practices of teacher education institutions with the exception of TESO. TESO attempted to reorient the roles of teacher educators in Ethiopia by outlining teacher educators’ competencies, roles and introducing professional development program (Ministry of Education, 2003, Mekonnen, 2008). The global teacher education literature, on the other hand, strongly upholds that the pedagogy of teacher education (teaching about teaching and learning to teach) is a fundamental component in the design and practice of teacher education.

Objectives of the Study

Fifty years ago, the Academy of Pedagogy was founded with the support of UNESCO to prepare primary education teacher educators. Given the sparse current discourse on teacher educators’ pedagogy and preparation, the idea to prepare primary teacher educators with the necessary subject matter and pedagogical skills and knowledge was visionary. Except the Higher Diploma Program (HDP) which focuses on developing generic pedagogical skills among teacher educators, there is no organized program or research that centers on teacher education pedagogy. I had taught many teacher education courses such as curriculum, teaching methods, research methods, instructional media, action research, and reflective practitioner to student teachers and in-service teachers. Aside from sporadic efforts to develop some teaching skills using different method courses, I have not consciously and systematically examined teaching about teaching and learning to teach concepts until my readings informed me that most teacher education programs fail to bring the desired change among student teachers. This is probably true for most other teacher educators. Imparting contents (facts, principles, and theories) about method, curriculum, learning theories, and research and testing student teachers’ mastery of these contents in mid-exams, assignments, and final exams have been what most teacher educators typically do. Notwithstanding the limitations in how they are organized, lesson plan preparation, practicing

asking and answering oral questions, writing lesson objectives and test items, and practicing some rules of thumb about classroom management are, at best, the commonest opportunities for student teachers to learn how to teach. There are also efforts to develop action research and reflective skills among student teachers. Informed and thorough discussions on how student teachers learn to teach are unusual in Ethiopian teacher education.

In addition, teacher educators and their practices are not studied as extensively as teachers and students although they are one of the decisive elements in the quality of education. Schwillie and Dembele (2007) characterize teacher educators as follows:

- They play key role but they are a little-known group.
- They lack a clear conceptual framework of what it means to learn to teach.
- They lack formal preparation for their teacher educator role.
- They lecture while promoting active learning.

In this study I asked my fellow teacher educators in Ethiopia how they teach about teaching. I also observed their practices to understand the pedagogy of teacher education. I also interviewed student teachers about their experiences in teacher education colleges to get their views on how they learn to teach and how teacher educators facilitate their learning. A detailed account of teacher educators' practices helps to learn more about teacher educators' understanding of their roles and pedagogies.

Based on the above reasons, this study intends to:

- a) examine the pedagogies (teaching about teaching) used by teacher educators in the preparation of pre-service teachers and upgrading of in-service teachers;
- b) identify teacher educators' views or conceptions about which teaching practices they think are effective in helping student teachers learn how to teach and analyze them against the evidence from the literature;
- c) assess the voices of selected student teachers on their experiences of teacher education pedagogy;
- d) initiate further discussion and research on teacher education pedagogy among teacher educators and researchers; and
- e) draw lessons to be considered by teacher educators, teacher education colleges, and teacher education leaders and researchers so as to improve the pedagogy of Ethiopian teacher education.

Methods

Research Method

This study followed dominantly a qualitative approach to provide in-depth evidence on the pedagogy of teacher education in colleges of teacher education. In cases, when quantifying teacher

educators' profiles and generating evidence to supplement the qualitative data, percentages are used.

Data Sources

Forty-seven (47) teacher educators were drawn from 11 colleges of teacher education in Ethiopia. But only 37 of the response were considered for this study. The remaining ten questionnaires were not filled out correctly and completely. The teacher educators teach content area, subject methodology and general pedagogy courses. The teacher educators were selected to prepare primary school textbooks (in 2021) and modules based on certain criteria such as experience in preparing teaching and learning materials, experience in teaching in schools, and experience in supervising student teachers. Forty-seven teacher educators participated in completing open-ended questionnaire.

Eight student teachers who had completed teacher preparation courses were also involved in the study. The student teachers were selected from three teacher education colleges. The student teachers were selected in a targeted manner in order to collect as much comprehensive data as possible about their experiences at teacher education colleges. Therefore, deans of colleges of teacher education and department heads were consulted to identify student teachers who they believe can meaningfully assess and reflect on their teacher education experiences. The selected student teachers had high GPAs and were described as good performers in the practicum.

Table I.

Profile of the Teacher Educators

Teaches Content Area		Teaches Subject Methodology		Teaches General Education		Qualification			Taught in Schools		HDP Completion	
Yes	No	Yes	No	Yes	No	BSc	MA/Sc	PhD	Yes	No	Yes	No
27	10	29	8	11	26	3	31	3	35	2	37	

As show in Table 1, with the exception of two, all teacher educators have teaching experience in schools. All teacher educators had completed Higher Diploma Training. With the exception of three teacher educators, who teach physical education and music, the rest of the teacher educators have postgraduate degrees. Twenty-nine teacher educators (78.4%) teach subject methodology courses and 27 teacher educators (73%) teach content area courses. In most cases, teacher educators teach both content and subject methodology courses. Almost a third of the teacher educators teach general pedagogy courses. Seen against the qualification requirement to teach at teacher education colleges, 92% meet the requirements as they hold a graduate degree.

The study group also represents teacher educators who teach the three main knowledge bases of teacher education: general pedagogy, subject-specific and content area courses.

Data Collection Instruments

Open-ended Questionnaire

Most often classroom observations are used to examine teaching and learning practices. As a teacher educator and researcher, I observed many teacher education classes for monitoring and mentoring purposes. I have spoken to teacher educators how they feel when they are observed and whether classroom activities would be different without an observer. Many teacher educators have told me the teaching may not be entirely different but an effort is made to meet the observers' expectations. Hence, as someone who has worked closely with the teacher educators as a supervisor on module development and textbook preparation, I preferred to use an open-ended questionnaire as a primary tool to collect as much detailed information and as 'objective' data as possible about the pedagogy of teacher educators. The questionnaire was unstructured and asked teacher educators to:

- (i) Describe their typical teacher education class with a detailed overview of the main activities of teacher educators and students,
- (ii) Identify and justify the pedagogical approaches that they think are useful for student teachers to learn how to teach,
- (iii) Discuss the most useful experiences of student teachers in their courses or college of teacher education,
- (iv) Identify one of the courses they taught in the last semester and describe and explain the main assessment types and their weight,
- (v) If they taught subject methodology or general pedagogy courses in the last semester, explain the various activities and processes involved in the courses, and
- (vi) Identify major challenges affecting the pedagogy of teacher education or their practices in teacher education institutions.

The questionnaire data collection took place in two rounds. The first was carried out when teacher educators participated in module development for teacher education colleges. Teacher educators were given days to complete the questionnaire so that they would get adequate time to organize their responses. The second round of data collection was conducted when teacher educators gathered to develop primary school textbooks and teacher guides. In both cases, the teacher educators were supported in the form of clarifications of items. The questionnaire was prepared in Amharic.

Classroom Observations

Seven teacher educators, who taught either subject methodology or general pedagogy courses, were observed. The purpose of the observation was to triangulate questionnaire data pertaining to classroom practices. Observation was based on consent and no checklist was

employed. The observation was designed to collect data on the pedagogical practices of teacher educators.

Interview with Teacher Educators

In the study, seven teacher educators who had taught subject methods and general method were interviewed in person. The subject methods teachers were chosen because their primary objective is to support student teachers to learn how to teach; hence require teacher educators to model pedagogical practices appropriate to their respective subjects and student teachers to learn to teach. The teacher educators were asked about the pedagogical approaches they use when teaching student teachers in subject-specific methods courses, the most useful experiences student teachers get in these courses and the challenges they face in teaching these courses. The interview helped to capture additional information following actual classroom observations on why the teacher educators and student teachers interacted in the classroom along the observed processes and activities.

Interview with Student Teachers

Interviews were conducted with 8 student teachers. Student teachers were asked to discuss the following items:

- How do you assess the contribution of the general education and specific method courses in supporting you to learn to teach?
- What have you learned from these courses that which you think will be useful when you become a teacher?
- How did you mostly spend your college classes/ time in general? Tell me about your classroom experiences and other learning opportunities such as practicum, project work, and others.
- From your point of view or assessment, what were the most valuable experiences of your stay at the college of education?

Results

Teaching about Teaching and Learning to Teach in Teacher Education Colleges: Pedagogies and Conceptions

Teacher educators were asked to describe the main activities of their teaching. The results showed that teacher educators' teaching is highly structured and follows similar classroom activities, despite differences in the subjects and disciplines taught. The responses of the teacher educators also illustrate the use of active learning techniques with the intention of involving the students in the teaching and learning process.

Virtually Similar Lesson Activities Irrespective of Subject and Course type Differences

Teacher education classes have similar features in that they begin with a review of a previous lesson, followed by an explanation or lecture and a summary and assessment. A chemistry teacher educator who teaches subject methodology and other subject area courses and has 26 years of teaching experience (in schools and a college) summarizes the main activities of a typical class as follows:

We usually begin a lesson by reviewing previous content and introducing the lesson topic. I give some explanations about the content and ask the students to do different activities like group work or discussions. I end the lesson by summarizing the daily lesson and asking some oral questions or offering a quiz.

An English language teacher educator with 14 years of teaching experience in secondary school and college of education follows a similar pattern of lesson activities in his typical English language classroom:

Most often, our lessons begin with revision of the previous topic and introduction to the daily lesson. Much of the time is then used to explain the contents of the lesson. I then summarize the lesson and assess the student teachers orally or in the form of a quiz. In some cases, I give student teachers homework.

A mathematics teacher educator with 20 years of experience in secondary schools and teacher education colleges narrates his typical lesson as:

I usually ask the students to remember the points we learned in the previous lesson and show them the link between the day's lesson and the previous lesson. I explain some of the main important points and assign students to work in peers. A few selected students reflect on the discussion points. Then I ask some students to conclude the lesson. If there are points that are not clear to the student teachers, they will write in their notebook for next class or ask them in class if there is time.

Another mathematics teacher educator characterized his lesson with a list of activities:

- Revision of previous lesson and correction of homework if there is any
- Introducing the daily lesson
- Explaining different contents and assigning them group activities.
- Supporting them in group work and summarizing the lesson.

A local language teacher educator reported the following:

My lesson somehow depends on the contents. In most cases, I explain the contents and assign them to discuss in groups. I invite some student teachers to present their group discussion. When I use explanation, student teachers understand and learn better. I use that very often.

A geography teacher educator stated:

I use both participatory and lecture methods in most of my classes. I facilitate students to discuss the contents or activities in groups and pairs. I also assign them individual work to master the contents. Finally, I summarize the lesson by explaining the main points.

The above responses illustrate pedagogical practices in teacher education institutions. Observations of selected classes complement the above practices. A science teacher educator's class surfaced the following processes and practices:

The teacher educator writes on the black board the topic of the day's lesson: teaching science. The teacher educator asks questions about the characteristics of science. After receiving some answers, the teacher educator explains science and science teaching methods such as demonstration, observation, and laboratory as teaching methods. The student teachers then discuss in groups questions on science teaching. Two student teachers present the groups' discussion and the teacher educator summarizes the lesson.

After the classroom observation, the teacher educator was asked how the course helps student teachers to learn to teach environmental science or science in schools. "I teach them the biology-related teaching methods. They (student teachers) will use them when they become teachers. I use participatory methods so that they understand the methods. They understand the methods better when they learn them through active learning."

An observation of a language teacher educator's class revealed a similar pattern:

The teacher educator asks the student teachers to sit in groups of five. The teacher educator summarizes the previous lesson and asks the student teachers to read a section from the module and discuss the content and questions in groups. Group representatives then share what they understand about different methods of teaching reading. The teacher educator gives additional explanation on some of the methods. Finally, the teacher educator writes five questions as a quiz. The teacher educator collects the student teachers' answer sheets.

A similar question on the purpose of the lesson and how it helps student teachers learn to teach was asked for the teacher educator. "I think they *know* the reading methods well because we used discussion. I checked their understanding through the quiz. They will use these methods during practicum."

From the above cases, it is clear that teacher educators are more focused on transmitting knowledge on how student teachers should teach during practicum and their actual teaching later. It appears that the focus is more on helping student teachers understand and learn the methods rather than making an intentional and meaningful effort to demonstrate or model the teaching methods. As discussed in the background section, the pedagogy of teacher education requires that

teacher educators teach about teaching by focusing on the pedagogy, and that student teachers get opportunities to learn to teach through teacher educators' modeling and inquiring about the pedagogical practices and learning to teach.

...it is about teacher educators "doing" in their practice what they expect their students to do in their teaching. This means they must model the use of engaging and innovative teaching practices, rather than deliver information about such practice through traditional approaches. At another level, there is a need to offer student teachers access to the pedagogical reasoning, feelings, thoughts, and actions ... in a variety of ways, through think-aloud, journaling, discussions during and after class with groups and individuals, and questioning, probing, and inquiry created through pedagogic interventions during teaching and debriefing of shared teaching and learning experiences (Loughran and Berry, 2003, p.1).

Compared to the pedagogies expected of teacher educators and the opportunities student teachers or in-service teachers should be given to learn how to teach, it is imperative that teacher education pedagogies move away from transmission-based teaching or a mere discussion of teaching methods in the class. Opfer and Pedder (2011, p. 385) summarized the works and findings of many researchers and underlined that student teachers and teachers learn better

...when activities require them to engage with materials of practice, when activity is school based and integrated into the daily work of teachers, and when the pedagogy of professional development is active and requires teachers to learn in ways that reflect how they should teach pupils. Teachers are *less likely to change practice as a result of learning activities that occur via presentation and the memorizing of new knowledge*. [Emphasis added]

Efforts to Employ 'Active Learning Methods'

While the above teacher educators' responses and practices illustrate typical teacher education classes, there were also responses that indicated the use of active learning and pedagogical practices. Some teacher educators reported they use different active learning methods and specifically mentioned group work, project work, individual assignments, pyramid, and crossover techniques. An environmental science teacher educator with 22 years of experience stated:

I spend most of my class giving explanations on topics that the student teachers have to deepen through group work, projects, and presentations (microteaching). They read modules and prepare some presentations to help them practice presenting and asking questions, assessing students' progress, classroom management and reflection. I support student teacher to be good teachers.

A physics teacher educator emphasized the use of laboratories in teaching his course and described his classrooms as:

My class is mainly lecture and group discussion. In lab activities, I use demonstration. I also use projects, classwork, and presentations depending on the nature of the course. Students also present their project work.

Some teacher educators also underlined the use of active learning methods included in Higher Diploma Program. A social studies teacher educator who teaches a subject methodology course reported:

...I ask my students questions from the previous lesson. After collecting some responses, I introduce the daily lesson and group them in three or four. I will ask them to discuss for some minutes. I use the crossover method and other active learning techniques from the Higher Diploma Program. The students will then share their ideas with the class. They learn my courses through active learning methods.

It appears that active learning method – usually operationalized in Ethiopian schools as the use of discussion, individual and group assignments – is also conceptually ingrained in teacher education institutions. The challenge, however, is that teacher educators use these methods with the intent of helping student teacher to master facts and knowledge in their method courses rather than help them to learn to teach. Although this by itself would not be a problem, it is assumed to be the ultimate goal of teaching about teaching or learning to teach. For example, a teacher educator who taught a subject methodology course for many years reported:

In training teachers, I use explanation, classwork, homework, and project assignments. I use these methods to develop knowledge and skills of my trainees. I assess student teachers through tests, homework, assignments reports, and final exams.

One challenge in the professional development and practice of teacher educators is transition from a teacher to a teacher educator identity and its associated roles (Dinkelman, Margolis, & Sikkenga, 2006a; Murray & Male, 2005; Ritter, 2007; Wood & Borg, 2010; White, 2014; Zeichner, 2005). Zeichner (2005, p. 118) underscored that the role of teacher educators is not transmitting knowledge about good teaching practices. According to Zeichner (2005), the teaching of young children is also different from preparing adolescents or adults who would assume teaching other young children.

although some teacher educators (as I once did) see their role primarily as one of passing along knowledge about good teaching practices, the task of teacher education must also include the development of the novice teacher's ability to exercise his or her judgment about when to use particular practices and how to adapt them to the specific circumstances in which they are teaching.

Murray and Male (2005, p. 19) also underlined that teacher education "...demands new and different types of professional knowledge and understanding, including extended pedagogical

skills, from those required of school teachers.” The above results clearly show that the conceptualization of ‘active learning or teaching’ in Ethiopian schools has left its mark on the practice of teacher educators: teaching focuses on revision of previous lessons, question and answer, group work, and review or presentation of discussed ideas which are intended to help student teachers learn the contents of the subjects. Although the above responses demonstrate the efforts of teacher educators to involve student teachers in the teaching and learning process, it is also important to realize that they still focus on transmitting and mastering contents on good teaching rather than helping student teachers learn to teach through modeling of teaching practices, case studies, or reflective practices on offering cases about good teaching practices. This is not to belittle the active involvement of the student teachers in teacher education courses. In-depth content knowledge of the subject matter and other concepts of teacher education is an indispensable part of teacher preparation. But it should be underlined that content mastery through group discussion or presentation should not be seen as the ultimate goal of teacher education courses or practices.

Perhaps teacher educators who served for some years in schools need opportunities to re-conceptualize or redefine their roles as teacher educators and act as teacher educators. There is strong evidence in the literature that the transition from the role of teacher to teacher educator is challenging and requires focused professional support and self-study from teacher educators and institutions (Hamilton, 2018; McKeon & Harrison, 2010; Vanassche & Kelchtermans, 2016; Richter, Brunner, & Richter, 2021). McKeon and Harrison (2010) reported that teacher educators who used to be teachers in schools developed roles of teacher educators such as ‘to plan for student-teacher-led learning and to undertake modeling and more open discussion about their pedagogical practice and principles, following professional support programs and self-reflections.’ Such understanding of the roles of teacher educators emanates from teacher educators’ professional development and identity (Izadinia, 2014; Vanassche & Kelchtermans, 2016). These scholars conceptualize professional identity as “a lens through which teachers (educators) look at their job, give meaning to it and act in it” (p. 260). Hence, teacher educators’ professional identity shapes their perception of their roles and actions in professional practices.

In Ethiopia, very little is discussed about the professional identity of the teacher educator as separate from a higher education teacher or school teacher. This may have contributed to the absence of teacher education pedagogies such as modeling, case studies, reflection, coaching, and portfolios from teacher educators’ responses and practices when they were asked about their typical lessons and useful practices for student teachers (We will see more about this in later sections).

The Saga about Class Size and Content Coverage

The two most frequently mentioned challenges in Ethiopian education discourse in the use of pedagogies that promote student learning are class size and course contents or textbook contents. Educational research also shows that these are major problems in many school contexts (Ball &

Forzani, 2009; Cuseo, 2007; Mansour, 2007). The above results showed that teaching in teacher education institutions is largely designed as the development of knowledge and understanding of the mastery of different pedagogies that student teachers use in schools. As already mentioned, this in itself needs to be reconsidered as teacher education pedagogy differs from pedagogy in schools. It appears worthwhile to reflect if teacher educators' pedagogies vary as a function of differences in class size. In the observed lessons, the maximum class size was 43 and the minimum class size was 24. Although this issue may require another study with representative samples, the following observation extracts reveal two lessons of a teacher educator while teaching two different courses to a group of 24 student teachers and another group with 40 student teachers. The two courses are a language teaching method (general) and the other course was teaching speaking and listening in primary schools.

Language teaching method course lesson (40 student teachers):

The teacher educator writes topic on the black board. Teacher educator explains the topic for almost 15 minutes and asks few questions. Student teachers take notes. Teacher educator asks students to be in groups and carry out activities in the module. Student teachers discuss the activities. Teacher educator asks two student teachers from two groups to present their answers. The teacher educator informs the student teachers presentation will resume next week and assigns them homework.

Teaching Speaking and Listening Method course lesson (24 student teachers):

Teacher educator writes the topic on the blackboard and asks student teachers a question to remind what was discussed in the previous class. A student teacher answers and the teacher educator adds some additional points. The teacher educator asks if the other student teachers would like to say more on the previous lesson. Some student teachers raise their hand and the teacher educator invites two student teachers. Following this, the teacher educator begins explaining listening skill and the processes involved in teaching listening. Student teachers take notes. Teacher educator orders student teachers to be in pairs and discuss review questions in the module. Two student teachers from two pairs answer questions and reflect on some of the questions.

The above cases represent only two classes of a single teacher educator and do not represent how teacher educators teach in different class sizes. However, the above cases coupled with the evidence presented in the previous sections indicate that teacher education practices in Ethiopia follow similar orderly processes that vary little as a function of differences in the disciplines or other classroom conditions.

Another major issue raised in relation to teacher education practice is the content coverage of courses and/or modules. Teacher educators mentioned that due to the size of the modules (too much content), they could not cover contents on time and promote interactive learning. The fact that 'too much content' is an issue in general education and subject methodology courses says a

lot about the academic orientation of Ethiopian teacher education. In addition to this, the teacher educators identified other related critical factors affecting teacher education pedagogy. A language teacher educator stated:

There are two methodology courses I teach. The modules are very big for the allocated credit hours. Hence, we (the teacher educator and student teachers) cannot cover if we do all the module activities. I explain most of the contents and student teachers work selected activities in group or as project assignments. Most student teachers are not motivated to do individual tasks.

Sharing a similar view about content coverage of modules and lack of student teachers' readiness for self-learning, a teacher educator who teaches general pedagogy course mentioned:

The contents in the psychology course are too much to be covered in a three-credit hour. Most student teachers do not have the skills to learn by themselves. Hence, we use lecture method and group assignments to complete the module during the allotted time. I also teach assessment and evaluation course. The content is very broad. The students also are not interested to be teachers. It is just a last option to them. This also affects how I teach the course.

The responses appear to illustrate that teaching and learning the contents of the courses is a priority in the teacher education practices. In addition, teacher educators' responses focus on content mastery and rarely mention the importance of practicing or modeling specific teaching skills. Lack of interest and readiness to learn to teach repeatedly surfaced in teacher educators' responses. The challenge in Ethiopian teacher education pedagogy or in general teacher professional development is motivating teachers or student teachers to learn to teach when they have low interest to be teachers or work in schools.

There is strong evidence that educational systems, teacher working conditions, motivation, stress, organizational, and cultural factors influence professional learning or professional development and student learning (Avalos, 2011; Dolton and Marcenaro-Gutierrez, 2011; Evers, Van der Heijden, Kreijns, & Vermeulen, 2016; Kwakman, 2003; Opfer & Pedder, 2011; Scribner, 1999). The challenge in Ethiopian teacher education pedagogy is then how can teacher education colleges, teacher educators, and schools facilitate meaningful professional learning when student teachers and teachers have low motivation and interest to work as teachers. Much of professional learning requires self-direction (Kwakman, 2003). This requires rethinking the design and implementation of professional learning and prioritization in improving the professional identity and professional learning and development of teachers. In the absence of that, mere enrollment in teacher professional courses or continuous professional development activities may not bring about the desired change in teacher practice and learning outcomes. When student teachers, in-service teachers, and teacher educators lack the motivation and commitment to learn to teach and teach about teaching, reform efforts to address teacher education or school curriculum may not bring the desired changes.

Teacher Educators' Responses on the most Useful Teacher Preparation Pedagogies and the Teaching of Subject Specific and General Method Courses

Selected teacher educators who have taught subject methodology courses to student teachers or in-service teachers were asked to narrate the most useful pedagogies to learn to teach. Although, there are debates on whether pedagogical content knowledge develops from subject method courses or thorough understanding of the content of disciplines and social contexts of teaching. (Deng, 2018; Berry, Friedrichsen, & Loughran, 2015), subject method courses are one of the components of teacher education program mainly intended to develop teachers' pedagogical content knowledge (Niermann, 2017; Stender, Bruckmann, & Neumann, 2017; Rusznyak & Walton, 2011; Abell, Appleton, & Hanuscin, 2010). In view of this, teacher educators were asked about their intentions and practices on teaching subject specific method courses.

A Chemistry teacher educator who teaches a subject method course in science reported:

The most beneficial component was the subject method course, where I teach how to develop lesson plans and manage classes. The course provides student teachers to learn techniques to teach the subject and how to manage students in classrooms. When student teachers work individually and share their work in pairs, they develop very good understanding of the subject.

An English language teaching methodology teacher reported that active learning methods such as group work, pair work, and individual work and different assessment methods were the most useful pedagogies employed to help student teachers to learn to teach. A mathematics teaching methods course teacher educator identified the most useful teacher preparation pedagogies employed in his course as 'pair work, group work, brainstorming, pair assessment, and student presentation.' The teacher educator, however, noted that:

Student teachers are not interested or motivated to carry out those tasks that I think are helpful to improve their knowledge and skills. I design *methods or activities that help students to learn by themselves* but because of lack of motivation or interest, the methods are not successfully implemented. [Emphasis added]

Teacher educators also reported that the subject method courses are designed to teach the following major areas: understanding how the subject is taught, preparation of different lesson plans, assessment methods, and instructional materials. A mathematics teacher educator discussed the focus of the subject method courses and the student teacher activities as:

The course helps student teachers to learn the historical development of mathematics as a field of study. The historical development of mathematics education is also discussed. They will then learn about different teaching and learning techniques of mathematics. They are assigned individual/group assignment to present a paper on the different methods. The course allows student teachers to develop annual plan in groups and lesson plan individually. They learn then assessment methods in mathematics instruction. Some student teachers present the lessons.

A local language teacher educator reported:

I teach them first the different methods of language teaching. Then, they prepare lesson plans based on selected contents. Some of these students present in class their lesson. I test through quiz and tests their knowledge of methods. In the peer teaching, students learn from their peer comments.

An environmental science teacher educator stated:

My subject methodology courses deal with learning theories and teaching methods in the subject matter. We discuss active learning methods in schools. Student teachers learn about the use of demonstrations, laboratories, and discussions. They learn about objectives and lesson plan. Student teachers then prepare annual plan based on one of the primary grade curriculum. Some of them will practice teaching based on the methods we learned in the course.

A physics teacher educator described the teaching of subject methodology course as:

The course deals with the different teaching techniques and principles in physics. We also teach about planning, classroom management, and instructional material preparation. Then we will allocate some classes for peer teaching. Students then take tests and final examination.

In methodology courses, teacher educators' focus appears to be explaining the different teaching methods in their subjects, lesson plans, and peer teaching in which students are assigned to work in groups. As can be seen from the above response, teacher educators barely discuss about modelling methods for student teachers, coaching of student teachers, use of case studies, use of videos, and other pedagogies that demonstrate their role as teachers of teaching. Student teachers or teachers' professional learning will be effective when it involves reading and discussion of professional knowledge and skills, modelling by teacher educators and experimenting/practice by student teachers on diverse teaching skills and assessment, reflection by student teachers and teacher educators on these practices, and collaboration among teacher educators, student teachers, and school mentors (Opfer & Pedder, 2011).

Teacher educators were also asked to list the most effective pedagogies which help student teachers to learn to teach.

Table 2.

Teacher Educators' List on Effective Pedagogies to Learn to Teach

Pedagogies	Frequencies
Group work	87%
Discussion	78%
Explanation/lecture	56%
Oral question and classwork	51%
Quiz	44%
Practicum	43%
Project work	35%

Table 2 shows that group work, discussion, lecture, question and answer, and quiz are the most often used methods to prepare student teachers for teaching. While the use of these methods by teacher educators should be the subject of further research, this result suggests that teacher educators focus on using methods for content mastery even when they teach methods courses. There were limited response related to peer-teaching and micro-teaching (21%), presentations (15%), and reading assignments (14%).

Assessment Practices in Teacher Education: Focus on Paper and Pencil and Testing of Cognitive Domain

Teacher educators were asked to list the assessment techniques and the corresponding weighting they used when assessing student teachers.

Table 3.

Assessment Techniques Employed by Teacher Educators

Assessment Type	Reported Weight	Reported Frequency
Final exam (paper and pencil)	30-60%	100%
Mid exam (Paper and pencil)	15-30%	100%
Quiz or tests	5-15%	89%
Group Assignment	5-25%	87%
Class activities	5-10%	63%
Individual assignment	10-15%	55%
Microteaching or peer teaching	15-25%	18%
Presentation	10-25%	12%
Project work	10-25%	8%

As can be seen in Table 3, the most common assessment techniques used by teacher educators are midterm, final, quizzes or tests, group assignments, class activities, and individual assignments. The teacher education literature shows that portfolio, performance assessment, self-study, reflection, and case analysis are effective in facilitating teachers' professional learning

(Kessing-Styles, 2003; Campbell, Melenzyer, Nettles, & Wyman, 1999). Rooted in Schon's concept of 'reflection in action' and Lee-Shulman's concept of 'pedagogical reasoning and action', performance assessment is widely viewed as an assessment process that enhances teacher learning by analyzing student and teacher practices and changes (Chung, 2008). Of the teacher educators' assessment methods described above, microteaching/peer teaching, presentations and possibly project work may contain some elements of performance assessment, although much depends on whether the student teachers and teacher educator are actually involved in the planning, implementation, analysis, reflection, and improvement of teaching practices or other work-related activities when using these assessment techniques. Portfolios as an assessment tool were only reported by two teacher educators.

Although some performance assessment ideas like portfolios have become a component of Ethiopian teacher education discourse after the introduction of some reforms like TESO, Primary Teacher Education Framework in 2013 (MoE, 2013) and Postgraduate Diploma in Teaching (PGDT), performance assessment is rarely implemented in Ethiopian teacher education practice and not adequately institutionalized in assessment policies or guidelines. It is well documented in the assessment literature that assessment can have a negative washback effect if not aligned with learning and teaching priorities. While paper and pencil testing should remain to be a critical component in subject matter, foundation studies and other courses intended to develop student teachers in-depth understanding of the content knowledge, cognitive skills, and other related outcomes, its unquestioned dominance on the assessment of subject specific, method courses, and foundational courses that require students to demonstrate mastery of psychometric, cognitive skills, and teaching practices needs to be thoroughly revisited.

Student Teachers' Voices

The study sought to capture the voices of student teachers about their teacher education experiences. The student teacher interview did not produce rich information, which may be due to the nature of the interview items or the interview process. Student teachers were asked to describe the contribution of methods courses to learn to teach, what they learned from these courses, how they spend their time in the classroom, and their most valuable experiences in teacher education.

Contribution of Methods Courses

Student teachers emphasized that they learn teaching and assessment techniques from method courses. Commonly mentioned were how to teach, planning, and assessment techniques. A student teacher mentioned "I learn lesson plan format in subject methodology. I learn to motivate students in psychology courses. I also learn table of specification." Another student teacher emphasized learning "how to teach reading and writing and lesson plan preparation." Another student teacher also focused on learning "how to teach, active learning techniques, and continuous assessment." One student teacher mentioned 'learning portfolios and action research and how to

teach in schools.’ The responses focus on learning specific teaching skills and content, rather than skills that help to learn how to teach.

Experiences in Teacher Education Courses

Student teachers were asked how they spent their time in teacher education courses and what were the most valuable experiences they had during their stay. A student teacher summarized his class experiences are similar in different courses by stating “We read and discuss modules with my friends (classmates). The teacher asks questions and we work in groups and answer the teachers’ questions. We also do assignments from module.” Another student teacher described his classes as “...the teachers teach at the beginning using lecture. They give us group discussion in class and we present the discussion to the class. We also do module activities.” Another student mentioned that “the teachers teach us through discussion and group work. Teachers give us lecture in simple ways. The modules are not clear... We take short notes from the teacher and do group assignments. We present the group assignments.” One of the student teachers mentioned the use of peer teaching in method courses.

The responses illustrate the frequent use of group work and discussion methods in teacher education classes. These activities are similar to the teaching practices reported by teacher educators and from the classroom observations made. As already mentioned, the focus seems to be on mastering of method courses contents. When asked about their valuable experiences at teacher education colleges, student teachers named various academic and non-academic activities. Student teachers emphasized the socializing role that teacher education played in their lives. They stated that they learn to live with other people. They mentioned that they learn to manage challenges. They also mentioned the teacher education helped them to meet different types of people. When probed to focus on academic related experiences, school observation and practicum were mentioned as valuable experiences. Modules and handouts are also mentioned as valuable learning tools. Future research on teacher education pedagogy in Ethiopia may also examine what student teachers and in-service teacher learn from teacher education.

Major Challenges in Teacher Education Pedagogy

Teaching knowledge and Theories rather than Teaching about Teaching

One teacher educator captured the concerns of some of the teacher educators in identifying the focus on teacher education colleges is on teaching theories and knowledge. A physics teacher educator stated that:

The major problem is how we prepare student teachers. We teach to transmit facts and concepts in our disciplines and subjects. We don’t organize activities to support them to learn to teach. The focus is on knowledge acquisition.

Misuse and overuse of group assignments: Grazing on able students and a ‘coping mechanism’ for teacher educators’ burnout

A mathematics teacher educator reported that:

Except the written assessments which account more than 60% of students grade, the remaining assessment is carried out in the form of quiz, group work or group project. There is a tendency that some of the student teachers carry the group assignments whereas the remaining may not take part in the tasks. Group assignments are mostly designed to minimize the burden on teacher educators as they correct papers rather than to promote collaborative learning.

A teacher educator who teaches assessment and psychology courses also reported:

Student teachers are assessed on continuous bases through group work. More than half of the assessment is used for group activities. All student teachers do not actively take part in the group work. This has reduced academic standards and challenges student teachers must go through. Student teachers' assessment is carried out indifferently.

A physics teacher educator underlined the unintended harmful practices in using group work and project work:

Some student teachers appear to prefer to work group assignments or projects in group work. Selected few able student teachers would complete the tasks and present them in class. Some of the student teachers usually have minimal or no involvement in the tasks. Grades are based on the tasks and presentations; hence all group members tend to get a similar score. This happens usually when the teacher educators are tired or fatigued of teaching.

Student teachers at colleges of teacher education are grouped in pairs or in five in order to promote collaborative learning. Although collaboration is one of the proposed pedagogies in teacher professional learning and development, too much collaboration erodes responsibility, creativity, and accountability in teacher learning. Opfer and Pedder (2011, pp. 385-386) characterized collaboration as 'a double-edged sword' and argued that the extent of collaboration determines its usefulness for teacher learning as "too much collaboration and learning are stifling, too little collaboration and teacher isolation inhibit growth, just enough collaboration and receive the stimulation and support from colleagues necessary for change." While there is widespread agreement that collaboration promotes teacher learning through offering opportunities for reflection and creation of communities of practice, revisiting its application in Ethiopian colleges of education is overdue. Teacher educators emphasize that the overuse and misuse of group assignments has created a culture of dependence, unaccountability, and inflation of student teachers scores in assessments.

Group work and Practicum Inflate Student Teachers' Grades

It was repeatedly reported that group work and practicum are used to inflate student teachers' scores. A teacher educator reported that formative assessment is abused to meet one of

the criterion in the teacher educators' efficiency evaluation checklist: 'the teacher educator has enabled all trainees to score 50% and above'.

Student Teachers' Low Readiness and Teacher Educators' Lack of Competence

In relation to this, an English language teacher educator reported that student teachers' poor readiness, teacher educators' lack of competence to train teachers, and poor teacher preparation pedagogies are the major problems in the preparation of teachers. A geography and environmental science teacher educator also reported that most candidates do not have the foundational skills required for college education. "They don't have adequate reading and writing skills, neither they have the minimal numerical skills."

Absence of Internal and External Quality Assurance System: No Exit Exam and Poor Assessment Standards

Teacher educators also repeatedly pointed out that colleges of teacher education do not have a strong institutionalized quality assurance system, with the exception of repeated assessments. The entry requirements are compromised in many cases. Internal quality assessment mainly focuses on teacher educators' practices which are routinely done just for administrative purposes. Institutional self-assessment focuses on meeting quantifiable indicators rather than changing teacher education practices and quality of teacher learning.

Politicization of College Leadership and Administration

The politicization of university management was also discussed as one of the major problems. Although it was not clear how this affects the pedagogy of teacher education, it was mentioned that deans focus more on various non-academic matters than on the teaching and learning process. A teacher educator pointed out that academic standards are not being respected as colleges do not have autonomy in assessing students but follow instructions from the top.

Conclusions and Implications

Conclusions

Based on the above results and discussion, the pedagogy of teacher education in Ethiopia can largely be characterized as an academic tradition or rational theory approach, at best. The focus is on helping student teachers learn teaching facts, concepts and skills that will be used during practicum and actual teaching. The discourse of active learning and to some extent its practice has been ingrained in teacher education practices. This is in itself encouraging as it can help student teachers to master course content if properly used in colleges of teacher education. But it appears that this is seen as an ultimate goal of teacher educators' practices, which is why teacher education

and the teacher educators' and student teachers' responses are devoid of professional identities, roles, and practices that are essential to teacher preparation.

Both the practices reported by teacher educators and the responses of student teachers indicate that teacher education courses are often taught and learned in an orderly and very similar manner that includes 'revision of the previous lesson, lesson introduction, explanation, pair or group work, and summary of the lesson.' The practice of teacher education appears to have been programmed along lesson procedures from schools and lectures from universities with very little presence of teacher education pedagogies that support teaching about teaching and learning to teach. Apart from the practicum and some subject specific methods and techniques, teacher education in Ethiopia has not yet developed sufficient discourse and practices that are essential for teacher preparation. Teacher education is entangled by pedagogies and practices borrowed from classroom teaching in schools and higher education. Consequently, assessment in teacher education focuses on paper and pencil and group assignments. Performance assessments are rarely used in teacher education colleges. Group work assignments that nurture dependency among student teachers, inflation of student teachers' scores to meet efficiency criterion, and inflation of practicum components are seen as toxic cultures in teacher education assessment practices.

The above characterization of the pedagogy of teacher education is a result of many interrelated factors. Lack of adequate competence in teacher education pedagogy among teacher educators, burn out of teacher educators, low readiness of student teachers, absence of internal quality assurance system in enrollment, accreditation and exit exams, and the politicization of teacher education leadership are seen as major challenges affecting the pedagogy of teacher education in Ethiopia.

Implications

Bahir Dar University, particularly the College of Education, has a strong culture in teacher preparation and education in general. The then Academy of Pedagogy envisaged the need to prepare and develop teacher educators. However, the preparation and professional development of teacher educators and pedagogy of teacher education in Ethiopia still seem to be underdeveloped, both in terms of understanding the knowledge bases and designing teacher education curriculum and fundamentally in terms of research on teacher learning and teacher educators' practices. Teacher learning and teacher education pedagogy in Ethiopia is one of those areas where common sense still dominates its discourse and practice. Building on the science and mathematics teacher education program and the need to move away from simplistic inclusion of generic education courses (curriculum or research methods) into the preparation of teacher educators and current research on how student teachers learn to teach, the College of Education should fill the critical gap on the pedagogy of teacher education and professional development of teacher educators. This necessitates building institutional capacity on teacher education, reorganizing teacher education departments, developing standards of practice aligned with effective teacher education programs, and staff development on teacher education pedagogy.

In addition, the evidence clearly shows that the pedagogy of teacher education dominantly focuses on the teaching and testing of facts and theories. College classes appear to be engineered to reflect a typical content transmission process of ‘lesson revision, explanation of the new topic, group or pair discussion, and review of lesson.’ It is essential that a teacher education based professional development program is introduced in colleges of teacher education that clearly develops teacher educators’ understanding and practice of the pedagogy of teacher education, their professional identities as teacher educators, and their corresponding roles. Teacher educators will need to re-conceptualize their identity as teacher educators which is different from a classroom teacher in that they don’t teach about teaching but teach student teachers to learn to teach and that they learn also teaching about teaching. Particular attention should be paid to how their roles must respond to the demands of teacher education pedagogy.

One way to reconstruct teacher educators’ roles could be to develop a standard of practice for teacher educators that is aligned with the roles of teacher educators in teacher preparation. The performance appraisal system in teacher education colleges also needs to be revised so that it focuses on pedagogical approaches to teacher education and not just clichés such as continuous assessment, tutorial class, or active learning. This can support the implementation and institutionalization of teacher education pedagogy. This should be complemented with strong teacher educator preparation program and professional development opportunities in which teacher educators can come into light with the knowledge base of teacher education. Hence, it is imperative that teacher education programs grounded on the knowledge of teacher educators’ roles and competencies are designed and used to prepare teacher educators. To this end, revising teacher education preparation programs and designing teacher educators’ professional development program aligned with teacher educators’ roles and identities is imperative. The Higher Diploma Programme (HDP) is a generic teacher education professional development and does not respond to the content and specific discipline needs of teacher educators. It happens to be also a one-shot teacher education program as teacher educators are certified once and for all. Hence, launching a continuous professional development program responsive to the roles and practices of teacher educators is also imperative.

In addition, teacher education colleges and teacher educators should make teacher education pedagogy a subject of their research as part of their role reconstructions. Research on teacher education in Ethiopia mainly focuses on the problem of teacher quality and structural issues of teacher preparation. Even the limited research publications on teacher education are indifferent to practices of teacher educators. Research guidelines of teacher education colleges should stipulate that teacher education practice should be a central theme of teacher educators’ research engagements and research conferences.

Although there is no empirical data to reflect on in-service teachers upgrading practices, I would like to use my observations and experiences to bring teacher upgrading practices to the attention of the Ministry of Education, regional education bureaus, and teacher education colleges. Current summer upgrading programs do not offer adequate opportunities, both in teacher education curriculum content and pedagogical practices, to support in-service teachers develop their teaching

skills and content mastery. The teacher education curricula for pre-service teacher preparation and in-service teacher upgrading are practically the same both in content and pedagogy. In fact, the in-service upgrading is almost lecture based as a course has to be completed usually in less than two months. There is a need to develop a teacher education curriculum grounded on in-service teachers' experiences, professional development needs, and credentials. It is also imperative to put in place appropriate quality assurance mechanisms during the selection of teachers to be upgraded and the certification of teachers after upgrading.

Finally, challenges related to the pedagogy of teacher education such as low motivation of student teachers, problems of competence and burnout among teacher educators and weak institutionalization of teacher education pedagogy show the need to deal with the teacher education system and professionalization of teaching. Piecemeal approaches and other quick fixes will not result in a system level change in teacher education practices and teaching in general. Hence, efforts to improve teacher education should primarily aim at professionalizing teaching and improving the professional status of teachers. These are prerequisites for any subsequent efforts to improve the quality of education in Ethiopia.

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