ADDIS ABABA UNIVERSITY

COLLEGE OF HEALTH SCIENCES

SCHOOL OF PUBLIC HEALTH

AWARENESS AND ADHERENCE TO HEALTH CARE FACILITY STANDARDS AMONG HEALTH WORKERS IN PRIVATE MEDIUM CLINICS IN ADDIS ABABA, ETHIOPIA

BY: ASHEBIR GUDINA (BSC in public health)

Advisor

Primary Adivisor:- Adiam Nega(MPH)

Secondary Adivisor:- Mesfin Addissie (MD,MPH)

ADDIS ABABA UNIVERSITY

COLLEGE OF HEALTH SCIENCES

SCHOOL OF PUBLIC HEALTH

AWARENESS AND ADHERENCE TO HEALTH CARE FACILITY STANDARDS AMONG HEALTH WORKERS IN PRIVATE MEDIUM CLINICS OF ADDIS ABABA, ETHIOPIA, 2019

A RESARCH THESIS SUBMITTED TO ADDIS ABABAUNIVERSITY SCHOOL OF PUBLIC HEALTH IN PARTIAL FULLFILMENT OF THE REQUIREMENTS FOR MASTER DEGREE OF PUBLIC HEALTH IN HEALTH SYSTEM MANAGEMENT.

By: Ashebir Gudina Signature _____ Date _____

Approved by the examining board

Name	Signature	Date
Chairperson, Department Graduate Committee	_____	_____
Advisors:		
Mesfin Addissie (MD, MPH)	_____	_____
Adiam Nega (MPH)	_____	_____
Internal examiner:		
1.	_____	_____
External Examiner:		
1.	_____	_____

ACKNOWLEDGEMENTS

I would like to express my appreciation to Dr. Mesfin Adisse and Ms. Adiam Nega, my primary advisors, for their technical support, guidance, review and valuable comments in preparing this research thesis since the research topic has been selected. I am grateful to AAU for providing me with this opportunity. Thanks to all my family, friends and colleagues for your outstanding support.

I would like to thank all my data collectors who engaged themselves with a lot of interest and participated in this study having been accountable and effectively filling the questionnaire.

I would also like to thank the owners of the private medium clinics and the health workers interviewed for their full cooperation in providing valid and relevant study information.

TABLE OF CONTENTS

Contents……..……...…….Page

LIST OF TABLES

LIST OF FIGURES

Figure ……..…...Page

ACRONYMS

AAU	Addis Ababa University
AOR	Adjusted Odds Ratio
CHS	College of Health Science
CI	Confidence interval
EFMHACA	Ethiopian Food Medicine Health Care Administration and Control Authority
FMOH	Federal Ministry of Health
GDP	Gross Pomestic product
HCPs	Health care providers
HCWs	Health care workers
HRM	Human Resourse Management
HSDPs	Health Sector Development Plans
IEC	Information Education and Communication
MCH	Maternal and Child Health
OPD	Out Patient Department
OR	Odds Ratio
SPSS	Statistical Package for Social Science
SOP	Standard Operating Procedure
WHO	World Health Organization

Abstract

Background: Health workers adherence to health care facility standards are complicated processes. So when health professionals comply with standards, they must first become aware of the standards, then intellectually agree with them, and then decide to adopt them in the care they provide, then regularly adhere to them at appropriate times.. Health workers can simply not be familiar with standards because they have not been communicated clearly. Commonly, providers are aware of standards but may hold beliefs or attitudes that inhibit them from adhering to standards.Nevertheless, evidence on awareness and adherence to healthcare facility standards among health workers working in private health facility in low income countries is poor.

Objectives: The aim of this study was to assess level of awareness and adherence to healthcare facility standards among health workers in selected private medium clinics in Addis Ababa.

Methods:A Facility based cross-sectional descriptive study design was used to conduct the study and the study units were selected using simple random sampling technique. Descriptive statistics including frequencies and percent were used in order to summarize variables. To determine the association between each variable binary logistic regression model was used and variables with p-value less than 0.05 were considered as statistically significant. OR and CI was used to see the strength of the association between the independent variables and awareness and adherence.

Result; A total of 250 participants were included in the study which makes the response rate 89.6% with mean age of 26.82 years. The majority which 62.8% of them were female, 67.2 % were heard about Ethiopian medium clinic standards, even though 98.4% of them had no on job trainings on it. Further, 22.4% and 44.8% of the study participants had good level of awareness and adherence respectively. Factors such as being the age interval of 21-25 years (AOR 0.19, 95%CI (0.06, 0.60)) and 26-30 years of old (AOR 0.06, 95% CI (0.01, 0.32)) had statistical significance association with level of adherence as compared to 20 years and below age group. But not participated in informing about Ethiopian medium clinic standard (AOR 1017.49, 95% CI (35.99, 28768.10)) was the only variable which had statistically significant association with level of awareness.

Conclusion and recommendation; the current study result indicated that almost more than half of participants had poor level of awareness and adherence toward Ethiopian medium clinic

standards.Therefore, providing continuous pre-recruitment and on job educational training on Ethiopian medium clinic standared by the health institutions is essential.

Keywords: awareness, adherence, healthworkers and healthcare facility standard.

CHAPTER 1: INTRODUCTION

1.1 Background

A health care system is the organization of individuals, institutions, and resources to provide health care services to meet the health needs of target populations.A wide range of health care system through out the world, with as many backgrounds and organizational structures as there are nations(1).

In order to optimize health care services, numerous standards and guidelines have been provided by many organizations globally and nationally. For example, there are four HSDPs in Ethiopia to improve the quality of the country's health sector, and the former EFMHACA has established various guidelines, directives and standard operating procedures (SOPs).

Health care facilities, like other sectors, share knowledge according to a set of standards and are established methods to connect health systems together(2).

According to a research conducted on Knowledge towards standard precautions among healthcare providers of hospitals in Amhara region, Ethiopia, 2017, 74.3% of halth care workers had good knowledge toward standard precaution and 85% of the respondents had adhering of standard precaution and only (42.7%) of study participants involved in Standard Precautions had training programs (55).

According to a study conducts on Infection control knowledge, attitudes, and practices among healthcare workers in Addis Ababa, only 69% of healthcare workers had good knowledge towards standard precautions(53) and the other study done on Assessment of knowledge and practices of healthcare workers towards infection prevention and associated factors in healthcare facilities of West Arsi District , South east Ethiopia only 53.7 % of healthcare workers had good knowledge towards standard precautions(51).

And also according to the other study done on Knowledge , attitude , and practice of healthcare professionals regarding infection prevention at Gondar University referral hospital , north west Ethiopia only 57.4% of healthcare workers had good knowledge towards standard precautions(54). According to the study conducts on Knowledge of standard precautions and barriers to compliance among healthcare workers in the Lower Manya Krobo District, Ghana

only 37.0% of health care workers had awareness towards standard precautions(38).And according to a study conducts on Knowledge and practice of standard precautions among health care workers in the Federal Medical Centre , Asaba , Delta State, Nigeria only 37.7% of HCWs had good knowledge towards standard precautions(52).

Standards are used to measure the particular organization and ability to deliver healthcare facilities that are capable of delivering the service (3). Standards and guidelines support the clear, effective use of scientific evidence for treatment provided by health professionals when used by direct providers (4).

Awareness of health workers to the quality of the health care facility is the capability of health workers to specifically know and interpret, feel, or be aware of standards and guidelines of the health facility or a level of awareness of the content of the standards and guidelines of a health facility.

The states of awareness are often related to the states of experience in such a way that the structure of awareness is reflected in the structure of experience. It is also defined as a state where certain information is known in a subject when that information is directly available to bring to bear in the direction of a wide range of behavioral actions(5).

Adherence of health workers towards health facility standard is the degree to which health workers obey the standard or guidelines in real life or in day-to-day health service delivery activities.(6).

Awareness and adherence to health care facility standards by healthcare workers is essential to ensuring that patients achieve optimum clinical benefits through successful diagnosis and treatment to maintain good health quality(7).

1.2 Statement of the Problem

Ethiopian Federal food, medicine healthcare administration and control authority (EFMHACA) developed healthcare facility standards to improve the health care service for clients and health care providers. But according to (Heiby 1998; Kelley et al. 2000) awareness of health care facility standard and adherence toward standard is poor in developing countries health systems including Ethiopia(8). Healthcare facility standard awareness and use avoids the resource wastage but in most of the private medium clinics denied to use it which leads to resource wastage and shortage in the clinics and as a country.

Lack of awareness and adherence with national minimum requirements among health care workers in medium clinics has a number of problems like scarce of resources especially over and under use of health professionals and medical products, doing professional mal practices or unprofessional incidents, unknowing scope of practices, unknown work or job descriptions, unknown organizational structure and processes, increase patient stay mostly due to lack of estimated turnaround time(TAT) at laboratory and imaging services, lack of equity of service delivery, lack of proper management of life- threatening emergency conditions like shock, coma, bleeding etc., lack of knowledge about threatening waste at a site of generation and disposal mechanisms.Fore instance,even in highly developed countries, medical error is the third highest leading cause of death and patient harm from medical error can occur at an individual system level. Forexample as research conducted on surgical medical error claim reported from 125 case decisions by Ethiopian federal ethics committee, 57.6% of death claims, 21.6% of the claimants associated the error with bodily injury were reported(49). In addition, in Addis Ababa only 30.4% of medical doctors had good practice of professional code of ethics(48).

Failure to perform according to standards has other negative consequences as well: dissatisfied patients, loss of staff and patient time and most importantly lost opportunities. Given limited resources, effective interventions and strategies to enhance performance according to standards are vital for achieving sustainable and quality health services(9). The long term impact of non-adherence and use of national minimum healthcare facility standard is drug resistance, increase mortality and morbidity rate(10).

The growth of private health facilities may be linked to society's health-care needs, private sector customer management, and the private health sector's ability to provide greater access to advanced

and up-to-date medical services facilities and technologies. Furthermore, the private sector is more likely to recruit highly skilled professionals and medical care practitioners than the public sector. Technology and the acquisition of advanced skills usually go hand in hand. Existing ad hoc research suggests that many clinicians believe these factors have a significant impact on their practice.

Political stability and the government's commitment to supporting the private sector were also important factors in promoting private sector growth. Ethiopia's federal government is now a proponent of the private sector, with favorable laws and regulations for health-care investors. Biomedical instruments and facilities are tax-free, and the government is generous with land for hospital building.

As previously noted, despite the fact that the private health sector has expanded dramatically, it continues to face numerous challenges. The most serious issue that all providers face is a scarcity of qualified physicians, especially doctors in specialty fields Africa Health Workforce Observatory (AHWO) 2010. It is important to recruit and retain skilled and qualified staff in order to provide high-quality care. The growth of health human resources and their preparation has not kept pace with the growing number of facilities, according to private providers.

There is a widespread lack of skilled professionals, particularly in certain areas of specialization, because such highly specialized and sub-specialized medical training is not widely available in the country. As a result, the private sector has been forced to recruit from other nations, but they lack the ability to do so. The availability of medicines is also the second significant factor.Regulated drug development, delivery, and importation. The number of pharmaceutical firms is small, and there is a large difference between drug demand and supply.

The availability and expense of skilled manpower, the availability and cost of medications, the availability, cost, and maintenance of bio-medical equipment and technology, and the cost of capital and funding structures are some of the critical factors affecting private providers.

This study carried out to assess the level of health workers awareness toward health facility standard and also proper utilization of that standard by health workers . The study result will help the clinic managers or owners, health professionals, Addis Ababa FMACA, Addis Ababa City Administration Health Office and other responsible bodies to know the status of the level of health workers awareness and adherence toward health facility standard and appropriate intervention mechanisms for future improvements.

1.3 Significance of the study

This study sought to provide scientifically sound evidence on the existing level of minimum standard utilization of health care facility that will be the useful input for policy makers, administrators, researchers and academia,private and public health facilities. Standardized healthcare service delivery improves the trusts of clients/patient and healthcare provider satisfactions and resource abuse.

Assessing awareness and adherence to healthcare facility standards among health workers in private medium clinics has immediate relevance for the management of health services and also it is a turning point for health workers working in any health care facility to update themselves in order to aware and adhere to the national minimum requirement healthcare facility standards and saves also the professionals from doing mal practices which is currently the issue of medico-legal and also it will be guarantee for health workers to do with the recommended work descriptions and scope of practices.

The national medium clinic minimum requirement standard mainly focuses on 4p's which is assessing of premise, professionals, product and practices.

Therefore, this study will help the clinic managers or clinic holders, health workers, FMOH, Addis Ababa food medicine health care administration and control authority (AFMHACA) and other responsible bodies to know the status of the implementation and design, appropriate intervention mechanisms for future improvements and it will be important to establish whether there is any gaps in compliance with minimum requirement standards in order to take corrective actions.

The study will also mainly focusing in Addis Ababa, where there could be relatively better private health facilities, experienced health workers and where the private health sector has relatively better capacity and organized.

CHAPTER 2: LITERATURE REVIEW

2.1 Theoretical literature review

Since there is no study findings on previous works on awareness and adherence to healthcare facility standards among health workers especially working in medium clinics; the literature review was focus on each contents of Ethiopian medium clinic standard first edition which was formulated in 2012 G.C and the highlight of private clinics in Ethiopia.

2.1.1 Medium Clinic

Is the next level to primary level of the healthcare in ambulatory health service that provide mainly curative service and preventive and promotive services.

It is also in primary care and is operated by a qualified, individual (e.g. GP or BSc nurse and upgrade health officer/nurse practitioner with minimum 5 years). The medium clinic provides outpatient care from diagnosis to treatment of acute conditions but also follow-up of chronic conditions such as TB, HIV. These solo practitioners manage all conditions ordinarily managed in a general practice, with referral to higher levels as required. A medium clinic provides preventive and curative services along with general medical services such as routine examinations, minor surgical services and nursing services(26).

2.1.2 Ethiopian medium clinic standards

The Ethiopian medium clinic standard first edition was prepared by the Ethiopian Food, Medicine & Healthcare Administration and Control Authority (EFMHACA) and published by the Ethiopian Standards Agency (ESA) in the year 2012 G. C.

Like other national health care facility minimum requirement standards, Ethiopian Medium clinic standard (ES3613:2012) is mainly designed according to the 4P's.

- **Premises**
- **Professionals**
- **Products**
- **Practices**

And should provide safe and proper treatment for patients, families, staff and visitors to reduce and control threats and to achieve this aim. Human resource managers, leaders or other stakeholders must manage the physical facility, personnel, medical equipment and other

resources according an effective plan influenced by national minimum requirement standards(26).

The Ethiopian medium clinic standard has classified in to twelve sections and the first section covers the general behavior of the standard which is scopes, normative references, terminologies and definitions.

The rest of the sections from two to twelve covers the minimum requirements with respect to practices, premises, professionals and products or materials put into use for medium clinics(26).

There are some critical words in Ethiopian medium clinic standards,these are:

- Shall --- The term "shall" indicates mandatory requirement (s).
- May --- The term "may" indicates permission.
- Should --- The term "should" indicates recommendation (s).
- Optional --- not mandatory but whenever there is a need to provide a given service, the 4p's shall be fulfilled as stated in the standard(26).

2.1.3 Implementation of the Ethiopian medium clinic standard

Each of the medium clinics in Ethiopia is expected to implement the standards fully so as to provide quality healthcare services. Because the Ethiopian standard shall be applicable for all medium clinics new and existing, governmental and non-governmental which means there is no double standard all over the country(26).

2.1.4 The role of medium clinic standards

Is mainly to ensure quality and safety, create clear communication between different parties, promote investment, promote uniformity of practice, enhance better resource utilization and competitiveness, serves as a vehicle for technology transfer, encourage and support innovation, provide requirements for consumer protection, maintain confidence on products and services, facilitates regulatory compliance and offers consumer protection and serves as a guarantee for the consumer and aso to promote an improved quality of life by contributing to safety, human health and the protection of the environment(11).

The availability and adherence or use of health care facility standards for patient safety by health workers can serve several purposes. They can either establish minimum levels of performance or can establish consistency or uniformity across multiple individuals and organizations. Another purpose for standards is that they set expectations. The process of developing and adhering

standards by health workers can set expectations for the organizations and health professionals affected by health workers utilize the standards(36)**.**

2.1.5 The nature of the Ethiopian medium clinic standard

Is a minimum standards / minimum requirements, mandatory standards (Not for Accreditation), regulatory Standards (ensures quality & Safety).

The medium clinic standard also provides minimum requirements for the establishment and maintenance of medium clinic in order to protect the public interest by promoting the health, welfare and safety of individual. Should focus greater attention on patient safety. Generally, can be used to define a process or outcome of care(36).

Ethiopian medium clinic minimum requirement standard is focus on known gaps in evidence-based treatment for a specific clinical condition (11). Guidelines are documents that provide recommendations for optimizing patient care. They are informed by a systematic review of evidence and an assessment of the benefits and harms of alternative treatment approaches(12). The aim of all health facility standards and guidelines is to provide concise guidance on how to provide health care services and to ensure that quality care is given to all patients with the same clinical condition, regardless of their location(11).

The difference between standard and guideline is that standard is a consistency or achievement level, while guideline is a non-specific rule or principle that offers guidance to action or behavior.

Standard and guideline adherence or use by health professionals working in health care facilities are complex processes. National Cancer Institute, 2005). Pathman et al. (1996) indicates that they must first become aware of the guidelines when healthcare professionals comply with the standards and guidelines, then intellectually agree with them, and then decide to follow them in the treatment they provide, then conform to them consistently at appropriate times(16).

Factors that can promote or hinder standard application and uses have been identified in few studies conducted with healthcare staff at the level of healthcare facilities. There are internal factors and external barriers, such as knowledge of quality and practice guidelines, attitudes about practice, and willingness or lack of motivation to do so among health professionals working in health care facilities(17).

External factors are those beyond the professionals that exist. These may be important to a patient situation, the work environment, the organization, or the guideline itself. The internal barrier to

the use or adherence of standard is a lack of understanding of the nature of a standard or lack of knowledge of the content of a standard. On the other hand, health professionals familiar with both the guideline and the standard may disagree with the interpretations of the guideline(18).

Insufficient administration or peer encouragement may hinder standard and guideline adherence efforts. A lack of approval by human resource managers or clinic holders for a guidance can adversely affect its acceptance and use (19). Of course, expectations must be clearly presented, realistic and open to healthcare professionals in order to achieve expected health results, so that health workers can easily be informed and familiar with guidelines and standards(20). Providers are generally aware of standards, but may have attitudes or perceptions that prevent them from adhering to them (21).

Awareness is a subjective term that can be based on an internal state, such as a visceral sensation, or on external events by sensory perception. It's similar to sensing something, which is distinct from observing and perceiving (which requires a simple process of familiarizing ourselves with the things we see)(35).

Specially, Gutwin and Greenberg (1999) state that awareness is:-

- Knowledge of a certain state of the work environment over a short period of time and space, as well as changes in that environment.
- All connections between team members and the environment are maintained..
- A component of an operation (completing a task, working on something). The aim of an operation is not to maintain awareness; rather, it is to complete a mission.Therefore, awareness is a process that summarizes and updates information derived from an environment as a result of interactions between participants and their surroundings.

  Gbefwi (2004) defines awareness as the recall of information, which is a prerequisite for appropriate behavioral change and an important tool in that regard.. The cognitive behavior theory states that behavior is regulated by cognition, and that perception is important but not sufficient to achieve behavioral change. (Glanz&Rimer 2001).

In a small portion of time and space, awareness is knowledge of the state of the work environment, provides knowledge of changes in that environment, maintains all the connections between

teammates and the environment and part of an operation (completing a task, working on something). The purpose of an operation is not to maintain knowledge, but instead to complete a mission (13).

Awareness is therefore a mechanism that sums up and updates the information extracted from an environment through the interaction between participants and their environments (14). It also applies to information recall and is a requirement for appropriate behavioral change and an important instrument in that regard. In the theory of cognitive behavior, the relation between awareness and behavior is stating that behavior is mediated by cognition and that awareness is important but not sufficient to create behavioral change (14).

Adherence of health workers towards health facility standard is the degree to which health workers adhere to health facility standards in real life or in day-to-day practices in health care service delivery.

Awareness and adherence to health care facility standards by healthcare providers is core to ensuring that patients derive optimum therapeutic benefits through effective diagnosis and treatment to promote good quality of health.

Awareness is a relative term that can be based by sensory experience on an inner state, such as a visceral sensation, or on external events. It is equivalent to sensing something, a process that is distinct from observing and perceiving (which requires a fundamental process of getting to know it) (15).

According to study conducted on primary health care facilities in Gahna only 44% of health workers had full of adherence on standard treatment guide lines.Based on the study findings four factors were directily associated with adherence;these are age, specified diafnosis, type of health facility and health professionals years of experiences(38).

When care is ineffective, that is, when health workers do not adhere to standards, this may reflect a lack of knowledge of standards or a lack of compliance regardless of knowledge(22).
A study conducted on Addis Ababa only 30.4% of medical doctors had good practice of professional code of ethics(48).
Awareness is a subjective term that can be based on an internal state, such as a visceral sensation, or on external events by sensory perception. It's similar to sensing something, which is distinct

from observing and perceiving (which includes a basic process of familiarizing ourselves with the objects we perceive)(40).

People who work in health care have the responsibility of protecting and improving the health of the people in their communities. The global health workforce is made up of all of these health professionals with all of their diversity. It describes the workforce's size and distribution, as well as some of its features, such as how much it costs.

It is important to set and implement minimum requirement standards, and continuous improvement is encouraged(24). There is a general understanding and facts that human resources are the root and essence of successful health system results(25). The right to health can only be ensured if the community is rescued, if the health care system's professionals are well educated or qualified and are committed to universal ethical values and professional standards, if the system in which they operate is structured to meet minimum standards of need(11).

The standard establishes minimum requirements for the establishment and maintenance of medium clinics to preserve the public interest by supporting individual health, wellbeing and safety and should focus more emphasis on patient safety. Generally, it may be used to describe a treatment plan or outcome. A quality standard is specified by the Institute of Medicine as a minimum level of acceptable performance or results or excellent performance levels or outcomes or the spectrum of acceptable performance or outcomes(26).

Provision or distribution of care is an immediate output of inputs, such as health workers, procurement and supplies, and financing, into the health system. Increased inputs could contribute to enhanced service delivery and increased access to services.

Ensuring and maintaining access to health care that comply with a minimum quality level are core roles of the health systems. Availability is an element of comprehensiveness which relates to the physical existence or provision of facilities that meet a minimum requirement. Utilization is also characterized as the quantity of health care services used.

Medium clinic surveys may also assess the quality of specific services and whether or not all appropriate components are available to provide routine treatment. This refers to the ability of medium clinics to offer a particular service, assessed by the presence of tracer goods that include qualified employees, guidelines, equipment/supplies, diagnostic capability, medicines, facility physical fitness and commodities.(27).

The availability and adherence or use by health professionals of health care facility standards for patient safety can serve many purposes. They can either set minimum performance standards or continuity or uniformity can be defined across various people and organizations. Another goal for standards is that priorities are set.The process of establishing and adhering standards by health workers can set expectations for the organizations and health professionals affected by health workers the standards(28).

The structural quality assessment revealed that private clinics had high expectations in terms of cleanliness, space, drug and equipment availability, and comments from focus group discussions suggested that these were respected (‘‘you get all, pills, treatment, it's clean").

In private clinics, the wait time was usually 10–40 minutes, compared to 50 minutes to 3 hours in public clinics.

When comparing private clinics to public clinics, the patterns of use were remarkably different. Primary public health programs like immunization and tuberculosis care were not available at private clinics, so patients were referred to the public sector or to a general practice.

The immediate performance of the inputs into the health system, such as the health workers, procurement and materials, and funding is service provision or delivery. Improved service quality and access to services could result from increased inputs. A health system's main roles include ensuring the provision of health facilities that meet a minimum quality level and ensuring access to them.

Leaders in the health sector and politicians in charge of evaluating their countries' health systems should take part in the debate on how to evaluate these key characteristics in their own countries. Researchers should continue to experiment with approaches and interventions that will enable progress to be tracked over time in these critical areas.

Some concepts that have been used to assess health care in the past are still applicable and are included in the key characteristics. Terms like access, affordability, usage, and coverage, for example, are often used interchangeably to suggest whether or not people are accessing the services they need. Access is a broad concept with several dimensions; comprehensive evaluation of access necessitates a rigorous assessment of people's ability to use health care on physical, economic, and socio-psychological levels. The physical existence or distribution of

facilities that meet a minimum standard is referred to as availability, which is an aspect of comprehensiveness.

The quantity of health-care facilities used is often known as utilization, medicine shortages, unequal delivery of health care, and a lack of equipment or protocols must all be seen as part of basic service management.

Information on minimum requirements may be used to provide guidance to program managers for key programs. Identifying all equipment, on the other hand, is a big challenge. Smaller private facilities are more likely to be overlooked, so extra care must be taken to include them, especially in urban areas. With subsequent censuses, completeness is likely to increase. Other outlets, such as household surveys that ask respondents which facilities they use, may be used to find more centers. Having access to private facilities for the short interview can be challenging.

2.2 Emperical literature review

The World Health Report 2010 reported that about 20-40% of all resources in the health sector are wasted. The major causes of service delivery inefficiency include improper use of medications, lack or wastage of human resources, lack or wastage of medical supplies or equipment(23).
From the study conducted on reasons and consequences of low adherence standard precaution is linked to lacking life long learning, risk behavours of workers, in adequate provision of medical supplies and inadequate working conditions (44).
Most health care workers who participated in the study, according to Amoo et al.,60 participants had a high level of knowledge about universal precaution or standard precaution. However, cleaners and a few laboratory professionals had the lowest percentage of awareness, which was attributed to two factors: an inadequate number of cleaners to cover their job and longer working hours by the health care workers.

These two factors, according to Amoo et al.,60, affected the degree of education that health care workers can have, as cleaners are unable to attend workshops or training lectures about universal precaution or standard precaution leading to a shortage of staffing, and other health care workers can decline to attend due to weakness from the extra duty hours.

However, the generalisation of Amoo et al.,60 is questionable, because of their sampling method (56). From another study conducted on analysis of medical claims in Ethiopia out of 60 compliants 39 compliant was reported to death and 15 compliants were related to disability(28).
In Ethiopia study conducted on Oromia region Bale zone only 45.6% of health professionals had good level of adherence of professional ethical practices(50).
As part of basic service management, shortages of medications, inadequate use of healthcare facilities, and the unavailability of equipment or guidance must all be taken into account. Usually, a general facility survey focuses on a wide variety of key health services and collects information on facility health employees, equipment and supplies, support programs, management systems, and adherence to standards and guidelines by providers.

A general facility survey generally collects data on facility facilities, equipment and materials, support structures, management systems, and provider adherence to requirements, and it focuses on a wide variety of key health services. In the survey of child health services, facility surveys can also assess the consistency of particular services and whether all appropriate elements are present to provide routine care; for example, immunization and diarrhoea treatment.

The core questionnaire is focused on internationally agreed health-care principles, such as the United Nations Children's Fund (UNICEF) immunization recommendations and the healthy motherhood initiative's standards, with local variations as required. Tangibility (Groonroos 2000) is described by Irene Aikins Kumasi Polytechnic (Faculty of Business and Management Studies) as the physical environment of health facilities, the appearance of staff, and the equipment and resources used by healthcare professionals to provide high-quality treatment.

Johnson (1997) defines reliability as health professionals' organized practices. This is vital for delivering high-quality health care. Their actions are performed correctly the first time, with no errors in the treatment of patients/clients. This goes a long way toward improving client satisfaction.

Responsiveness concerns the preparedness of health professional in proving service to clients. Timeliness of activities of health professionals, making sure clients go through successful review, providing immediate services to patients/clients/ payment of suppliers (Gronroos 2000).

Patient satisfactions are affected by the skills and politeness of health professionals. This includes details such as job capability, competency levels, how clients are managed and treated, and the overall attitude toward the needs of patients. Patients, on the other hand, can feel comfortable when reviewing healthcare delivery (Fitzsimmons and Fitzsimmons, 2001).

A high-performing health workforce is made up of a diverse group of employees (including volunteers) who are evenly dispersed, effective, attentive, and knowledgeable in order to deliver the best health outcomes possible given the resources and circumstances.

More than half of all drugs are prescribed, dispensed, or marketed improperly, according to the World Health Organization (WHO), and about 50% of all patients do not take their medicines correctly (WHO 2009).

It was predicted that, for example, proper use of the standard treatment guidelines (STGs) would minimize inconsistency in prescribing practices, direct acceptable medication choices, and eventually increase the quality of care in the health sector if health practitioners were aware of and adhered to medium clinic standards.

According to a study conducted to assess adherence to standard precaution practices among health care workers and factors inhibiting the practice in Dawuro zone, SNNPR, South western part of Ethiopia, only 22% of health care workers adhere to standard precaution practices.
The study found that health care workers with less than or equal to 5 years of experience were 2.5 times more likely to follow standard precaution practices than those with more than 5 years of experience.
The study conducted in Bihar Dar found that health care workers with more than 10 years of experience were 1.48 times more likely to follow standard precaution practices.
National standards and guidelines: In general, organizations should obey the country's health standards and guidelines, including care protocols and critical medication lists, when responding to disasters(57).
Many factors, including behavioral, social, and organizational factors, as well as the nature of healthcare activities and their environment, make it difficult to motivate and enable health workers to perform to expectations.
There is no single best intervention or technique for achieving standard-compliant health worker results. Rather, a wide range of approaches have been shown to improve conformity to

expectations in comprehensive trials. Multiple interventions have been shown to be more successful than single interventions, particularly when initiatives to improve health provider knowledge and understanding are paired with interventions to promote and strengthen standards-based performance in daily practice.

Since adherence to evidence-based criteria is correlated with better health outcomes (Grimshaw and Russell 1993), and since failure to provide clinical treatment in compliance with standards has significant negative effects on patient outcomes, the definition of quality focuses on performance according to standards (Walker et al. 1988).

One of the most challenging problems in delivering quality healthcare is inspiring and encouraging health workers to perform according to expectations.

Individual physicians in primary care, on the other hand, are often faced with a broad range of problems and illnesses, and their practice conduct can be more heavily affected by patient expectations (Wensing et al. 1998).

Individual health worker decisions on meeting expectations are often highly affected by whether they work for a healthcare facility that has significant control over their practice or work independently as a private practitioner. The likelihood of encouraging health providers to operate according to expectations is also affected by the degree of government oversight or regulation of health service delivery.

Absenteeism of health worker's cheats government of up to 40% of their time of employment. This malpractice affects the quality of patient care and destroys team work. Staff absenteeism arises from late coming on duty and early departure from duty, Negligence of duty and dual employment or practice.

According to a reaserch conducted on compliance with precautions and associated factors among health care workers in Gonder university comprehensive specialized hospital;

Health professionals worked in Government hospital were nearly three times more likely to practice infection prevention compared with those working in private higher clinics According to this study, Health professionals having experience of less than ten year were nearly four times more likely to practice infection prevention than those who have experience of more than ten years.

Although there has been relatively little research on guideline use specifically among nurses, some barriers have been identified. Lyons et.al. investigating the role of information technology

in guideline implementation among nurses, physicians, and administrators, found that nurses identified lack of time and lack of access to computers as significant barriers to guideline utilization, surveying nurses in Singapore, found that 73% said they lacked the material resources necessary to implement a clinical practice guideline addressing fall prevention. A study by Sinuff et.al. found that a lack of awareness that a guideline existed and a lack of familiarity with guideline content or research findings were major barriers.

A Scottish study of the use of nursing best practice statements by 15 nursing leaders involved in their development found that even for this group, implementation was challenging.

Barriers included lack of time and other resources, lack of training, resistance to change, and lack of "local champions." It stands to reason that, for guideline implementation and use to be optimal, more research evidence specifically from the unique perspective of nurses is essential.

A skilled, motivated and adequately supported health workforce is critical. Health care providers want to deliver the best possible care to their patients. Often, however, the systems and environments they work in make this task difficult.

Guideline or standard adherence are complex processes. In several studies conducted with physicians, is a lack of familiarity with a guideline's content or with the relevant research literature. On the other hand, there is evidence that clinicians who are familiar with both the guideline and the relevant research might disagree with the guideline's interpretation.

Clinicians have also expressed concern that the uniformity of clinical practice guidelines encourages "cookbook" or formula-driven medicine. If clinicians feel their current practice is adequate, they may lack the motivation to adopt a guideline's recommendations. And many practitioners report relying on colleagues for decision support, a practice that may decrease the use of evidence-based guidelines and increase reliance on experience-based decision making.

One external barrier to guideline or standard adherence or use is a confusing or overly complicated guideline format.

2.3 Overview of Ethiopian private Health facility

Many low- and middle-income countries are increasingly looking at private sector engagement as a way to enhance economic growth and development. Ethiopia's private sector has been actively engaged in agriculture, manufacturing, construction, and trade. Indeed, the private sector has become an engine for growth, increasing from virtually no private sector activity in 1980s to contributing 80% of gross domestic product (GDP) when including the informal sector. 2016/17, MOH report indicates that 6% of all health facilities are in Addis Ababa, of which 6% are public facilities and 94% are private (58)

Having a growth rate of 2.4% annually, Ethiopia has a population of 105+ million people with a trend of doubling every 25 year, which creates a huge burden on health service delivery. Ethiopia is undergoing a demographic and epidemiologic change at the moment.

There is a triple disease burden: communicable disease, non-communicable disease, and accidents. Non-communicable diseases are expected to increase in the next 14 years as communicable diseases decline.

According to the Ethiopian Ministry of Health, the national budget allocation to the health sector is 11.5%, demonstrating the country's reliance on foreign assistance and funds. In the base and high case scenarios, the total expense of the Health Sector Transformation Plan for (2015/16 – 2019/20) is expected to be $15.6 billion and $22 billion, respectively.

In Sub-Saharan Africa, the private health sector ranges from traditional healers, pharmacies and shop keepers selling health care products, to non- profit and for - profit clinics and hospitals. People use the private health sector for a number of reasons, including convenience, perceived efficiency, and confidentiality, or because there is nothing else available.

Furthermore, private health care in Sub-Saharan Africa is not limited to the wealthy. Africans from all socioeconomic backgrounds seek health services from the private sector (59). According to a recent report from the International Finance Corporation, a World Bank member, health spending in Sub-Saharan Africa is projected to double over the next ten years, requiring investments of $25–30 billion, with the private sector playing a key role.

The research report's key findings are that the private sector already plays a major role in providing and funding health care; on average, it provides 50% of the industry's goods and services, with 60% of those goods and services coming from private sources.

African health expenditures are projected to more than double over the next 10 years, from billions in 2005 to about $35 billion in 2016, with 60% expected to come from the private sector(60). Meeting the health-care needs of Sub-Saharan Africans is a huge challenge for health ministries. Ethiopia is a low-income country in Sub-Saharan Africa with a poor health-care system and a rapidly expanding population. The root causes of major health issues in poverty are a shortage of education and inadequate access to health care. Furthermore, the health-care delivery system is ineffective and poorly planned in terms of coverage (61).

People have no choice but to seek out private facilities in the absence of a well-funded health system that provides free care. In Ethiopia, the private provision of health services has been legalized as a way of mobilizing capital and improving the health system's productivity(62) .

But data shows that private health sector expanded its activities in urban areas especially in the capital city. The numbers of private health facilities are increasing steadily, In Ethiopia currently the number of operational private facilities are 5,401 primary clinics, 62 hospitals, 536 specialty clinics and 1,308 medium clinics(63).According to 2009 EFY health and health related indicators in Addis Ababa alone, there are 28 private hospitals and 882 all type of clinics.(64)

2.4 Conceptual framework

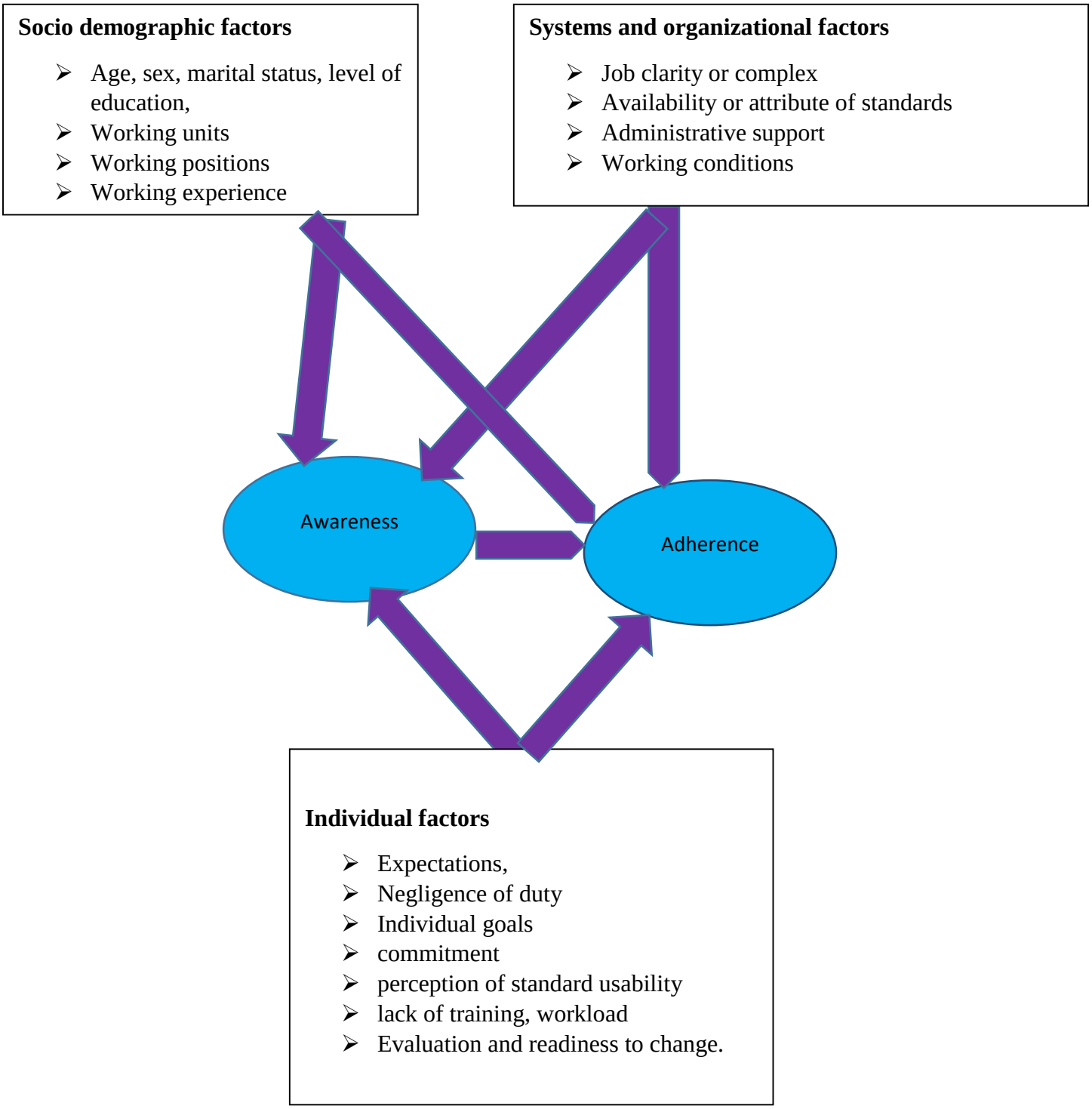

Figure 1. Conceptual framework which shows the association between different factors with awareness and adherence which is developed from different literatures.

CHAPTER 3: OBJECTIVE

3.1 General objective

- To assess awareness and adherence to health facility standards among health workers in selected private medium clinics in Addis Ababa Ethiopia 2019.

3.2 Specific objectives

- To assess awareness of health workers to health facility standards among health workers in selected private medium clinics in Addis Ababa Ethiopia 2019.
- To assess adherence of health workers to health facility standards among health workers in selected private medium clinics in Addis Ababa Ethiopia 2019.

CHAPTER 4: METHODS

4.1 Study area and Period

The study was conducted in Addis Ababa the capital city of Ethiopia, with the total population 3,515,678. Addis Ababa has ten independent sub cities and one hundred seventeen Woreda. Its area is estimated to be 530 Km2 with altitudes ranging from 2,200 to 3,000 m above sea level, average temperature of 22.8°C and average rainfall of 1,180.4 mm and has seven functional public General hospitals and three under construction, 98 functional public health centers and 23 health centers under constructions, 22 private general hospitals and 3 private primary hospitals, 1,071 all types of private clinics including 290 private medium clinics and 816 drug stores and pharmacies(29).The data was collected from July to August 2020 at selected private medium clinics of Addis Ababa, Ethiopia.

4.2 Study design

Facility based descriptive cross-sectional study design was conducted.

4.3 Source population

All health workers working in private medium clinics in Addis Ababa city administration.

4.4 Study population

Selected health workers who were working in private medium clinics in Addis Ababa city administration during the study period.

4.5 Inclusion criteria

All health workers who were working in the selected private medium clinics in Addis Ababa city administration during the study period and worked at the institution for at least three months were included to the study.

4.6 Exclusion criteria

Health workers who were working at dental medium clinics, optometry medium clinics, ophthalmology medium clinics and other clinics such as home based or mobile clinics were excluded from the study.

4.7 Sample size determination

Sample size was determined by using single population proportion formula, 95% confidence interval with 5% margin of error.

$$n = Z(\frac{\alpha}{2})^2 \frac{p(1-p)}{d^2}$$

Where

P = no previous study was found on the proportion of awareness and adherence of health workers towards FMHACA medium clinic standard. So, to obtain maximum sample size 50% proportion was used by considering good awareness and adherence.

d = margin of error = 0.05;

$Z\alpha/2$ = the value of Z in the standard normal distribution that corresponds to 95% confidence level=1.96

n = the required sample size

So, $n = 1.96^2 \frac{0.5(1-0.5)}{0.5^2} = 384$

Since the total eligible study unit in study area was less than 10,000 which was740, correction formula was required by using population correction formula the sample size became 253

$$n = \frac{n_0}{\left(1 + \frac{n_0}{N}\right)}$$

Where

no = is the initial and adjusted sample size (calculated sample size);

nf = is the final sample size;

N = is the total no of eligible

Then by considering 10% non-response rate the final sample size becomes 279.

4.8 Sampling procedures

There were 290 private medium clinics in Addiss Ababa city administration and first by having all the lists of the clinics; two sub cities which was Kolfe Keraniyo and Nifas Silk Lafto were selected using a simple random sampling technique from the total of ten sub cities found in Addis Ababa city administration. Among all the clinics, a total of 148 private medium clinics (82 private medium clinics found in Kolfe keraniyo and 66 private medium clinics found in Nifas silklafto sub cities).Among these a total of 56 private medium clinics which 31 private medium clinics from Kolfe Keraniyo sub city and 25 private medium clinics from Nifas Silk Lafto sub-city as a study area were randomly selected from the lists of the clinics and proportionally allocated to both sub-cities. Then a total of five respondents from each selected private medium clinics; one respondent was selected using lottery method from each department (HRM, OPD room, Emergency/injection room, Laboratory room, recording room and housekeeping room) until the calculated sample size was achieved.

.

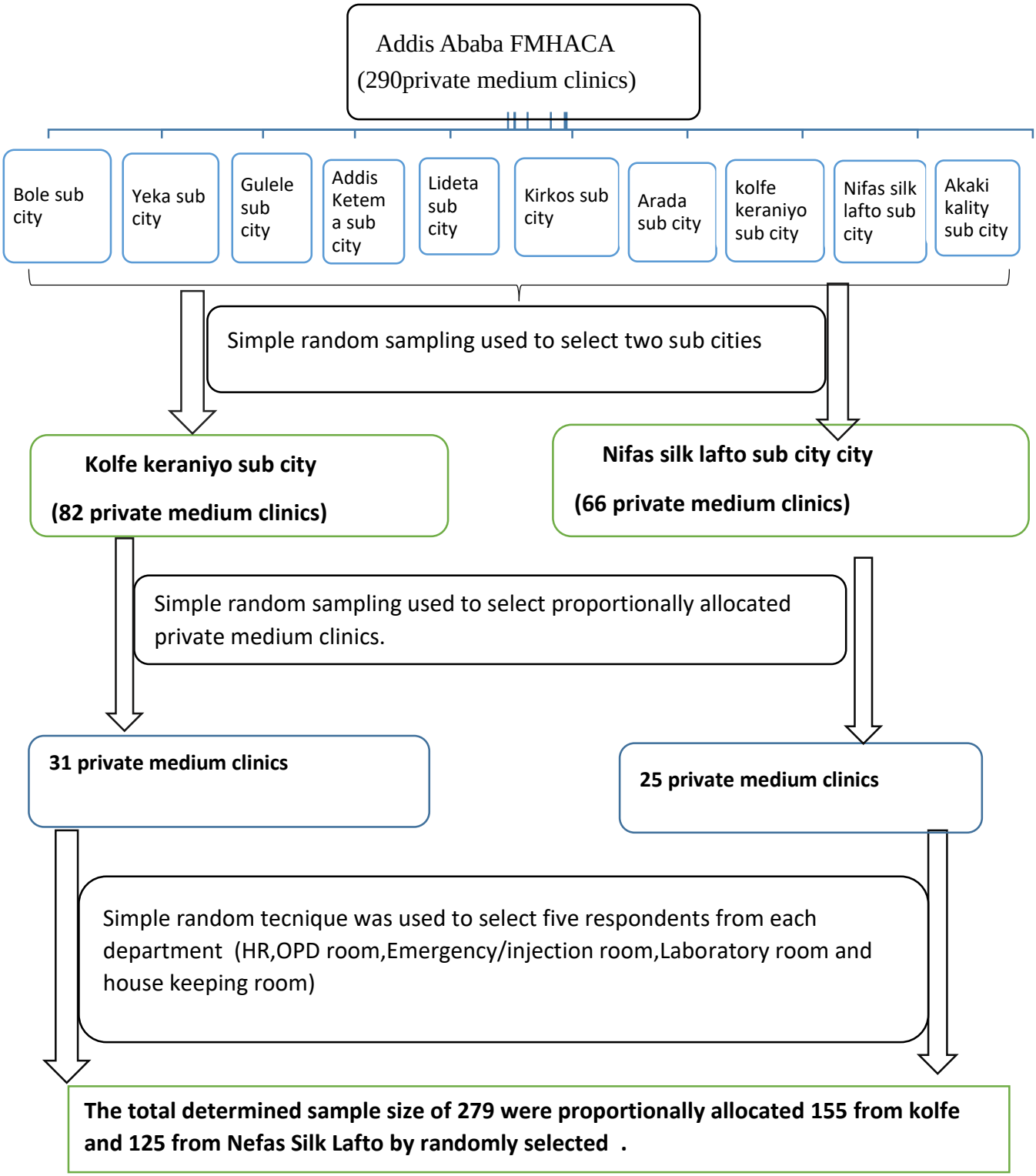

Figure 2. Schematic presentation of sampling procedures 2019 .

4.9 Study variable

4.9.1 Dependent variable

- Awareness of health workers to healthcare facility standard.
- Adherence of health workers to healthcare facility standard.

4.9.2 Independent variable

- Socio demographic factors; age, sex, marital status, level of educational, working unit, working positions and working experience.
- System and organizational factors;
    - System; administrative support, working condition.
    - Organizational; monitoring system, adequate manpower, working load, working environment, general organizational climate, availability or attribute of standards, training, supervision, self-assessment, professional turnover and communication mechanisms.
- Individual factors;
    - Provider motivation; expectation, negligence of duty, individual goals/values, commitment, perception of standard usability and readiness to change.
    - Provider competencies; lack of knowledge, lack of awareness, lack of training, workload and evaluation.

4.10 Operational definitions

Healthcare workers; All health work forces working in the private medium clinic at a time of data collection.They may include medical doctors, health officers, BSC and diploma nurses, laboratory professionals, recoring and house keeping workers.

Health professionals:- All medical professionals working in a medium clinic who serve, diagnosis, care,counselling and prevention of human disease, disability and other physical and mental impairments or services directly to patients.Or all health workersworking in a medium clinic excluding receptionist and janitors.

Minimum requirement: -a criteria or qualification that a medium clinic must have in order to put in use. (Ethiopian medium clinic minimum requirements)

Private clinics:- refers to private-for-profit medium clinics

Awareness: - Having knowledge or well informed about the Ethiopian medium clinic minimum requirements. So, those who were scored above the mean score of the awareness related questions were considred as having a good awareness and those who scored below the mean score were categorized under poor level of awreness.

Adherence:- The action of making practical and effective use of Ethiopian medium clinic minimum requirement standard. Based on this those who scored 75% and above were grouped under 'good' , those scored 51% to 74% are grouped under 'medium' and those who scored 50% and less are grouped under'low'.

Non Health:- All peoples working in a medium clinic whose educational backgrounds are other than health or not health related and or peoples who does not delivers care or services directly to patients or not involving or concerned with medical care or the field of medicine.

4.11 Data collection procedures

The quantitative self-administered written questionnaire was used to collect the data which was developed from the EFMHACA (Ethiopia food medicine health care administration and control authority's medium clinic minimum requirements ES3633.2012) guideline. Ten BSc nurse or/and public health professionals were recruited as data Collectors and four health professionals recruited as supervisors.Both data collectors and supervisors were trained on the aim of the study, the study procedures, data collection instruments, and research ethics.

The data collection instrument was pre tested for clarity and to know the time it took to complete the data of private medium clinic requirements other than the study areas and then revised accordingly. The questionnaire, includes questions on socio-demographic characteristics of respondents, specific practice area and questions to assess the level of health workers awareness and adherence toward the Ethiopian medium clinic minimum requirements.

4.12 Data processing and analysis procedures

The data was coded, typed and entered in to Epi.Data3.1 software and exported to SPSS version 21for final analysis**.** Descriptive statistics including frequencies and proportion was used in order to summarize variables. To determine the association between each variable binary logistic regression model was used. Bivariate analysis was done in between each explanatory variable and the outcome variables.Then these variables which had an association at p-value less than 0.05 were considered for furthere multivariate analysis.Variables with p-value less than 0.05 during

multivariate analysis were considered as statistically significant. Both crude odd ratio(OR) and adjusted odd ratio(AOR) with 95% confidence interval was used to estimate the association between variable and control for possible confounding factors. Data was presented in texts, tables and figures.

4.13 Data Quality Assurance

A pre-tested structured questionnaire was used to assure data quality prior to data collection, two days training was given to the data collectors and supervisors in order to fill the questionnaire appropriately. Additionally, the questionnaire was translating from English to local language Amharic and back-translate to English using standard procedure to check its validity. Each data collector was checked the questionnaires frequently for completeness and consistency. At the end of the day, the supervisors were checked all the filled questionnaires and the data was entered in to Epi-info version 7 and data cleaning was conducted before actual analysis of data. The principal investigator was cautiously observing and follow the overall activities of the study.

4.14 Ethical considerations

The study was conducted after obtaining official approval letter from Addis Ababa University, college of health sciences, school of public health research review committee, Addis Ababa FMHACA and FMHACA sub city office, FMHACA Woreda health office. Participants were received information on the purpose of the study, respondent selection procedures, and harms and benefits of the study. The respondents were informed of their right to refuse or agree to participate in the study, or discontinue their participation whenever they feel the need. Privacy was maintained or assured during data collection, and confidentiality of the data was also be assured. And they were asked to participate in the study as well as they voluntarily sign in an informed written consent form.

CHAPTER 5: RESULT

5.1 Socio-demographic characteristics of the respondents

A total of 250 participants were included in the study which makes the response rate 89.6%. The mean age of the respondents was 26.82 (SD=21.29) years. Among the respondents, relatively higher portion of them which 93 (37.2%) were in the age interval of 21-25 years, 157 (62.8%) were female, 136 (54.4%) were unmarried, 119 (47.6%) had diploma/level4 educational status, 77 (30.8%) were supporting staffs (none health professional) and 51 (20.4%) laboratory head with respect to the current position. Further, 121 (48.4%) had two years and below works experience within the institution, whereas 136 (54.4%) of them had 5 years and above as a total year of working experience. Regarding monthly income of the study participants 98 (39.2%) of them had 2000 and below of Ethiopian birr. (Table 1)

Table1:-Descriptions of socio demographic among health workers working in selected private medium clinics in Addis Ababa Ethiopia 2020

Variables		Frequency	Percent (%)
Age	20 years and below	50	20.0
	21-25 years	93	37.2
	26-30 years	59	23.6
	31-35 years	33	13.2
	36 years and above	15	6.0
Sex	Female	157	62.8
	Male	93	37.2
Marital status	Married	110	44.0
	Single	136	54.4
	Divorced	1	.4
	Widowed	3	1.2
Educational status	MD/BSC/BA	59	23.6
	diploma/level4	119	47.6
	12^{th} complete	37	14.8
	10^{th} complete	27	10.8
	less than grade 10	8	3.2
Profession	Medical doctor	9	3.6
	Health officer	38	15.2
	BSC nurse	13	5.2
	Clinical nurse	62	24.8
	Laboratory technician	51	20.4
	Supporting staffs	77	30.8
Current position	License holder	38	15.2
	Owner	12	4.8
	OPD/emergency head	49	19.6
	Laboratory head	51	20.4
	Janitor	50	20.0
	Reception	50	20.0
Work experience within the institution	2 years and below	121	48.4

	3-4 years	107	42.8
	5 years and above	22	8.8
Total years of experience	2 years and below	72	28.8
	3-4 years	42	16.8
	5 years and above	136	54.4
Income	2000 birr and below	98	39.2
	2001-4000 birr	73	29.2
	above 4000 birr	79	31.6
Year of establishment the clinic	at 2004 and after	140	56.0
	before 2004	110	44.0

5.2 Information about Ethiopian medium clinic standards related characteristics of the respondents

Regarding to information about Ethiopian medium clinic standards related response of the study participants, the majority 168 (67.2 %) were heard about Ethiopian medium clinic standards, even though 196 (78.4%) of them had no any training on it. Written documents (30.8%) are source of infromation. In addition, 264 (98.4%) them had no on job trainings on it. Also, though all of them were register at FMHACA, 200 (80.0%) of them were not participated in informing other staff about Ethiopian medium clinic standard. (Table 2)

Table 2:- Information on Ethiopian medium clinic standards related characterstics of health workers working in selected private medium clinics in Addis Ababa Ethiopia 2020.

Variables	Response	Frequency	Percent (%)
Heared about Ethiopian medium clinic standards	Yes	168	67.2
	No	82	32.8
Source of information	Through training	74	29.6
	Through department meeting	1	.4
	Through reading materials	77	30.8
	Through posted materials	8	3.2
	Through public medias	1	.4
	Through association gatherings	7	2.8
Taken training on Ethiopian medium clinic minimum requirement standard	No	196	78.4
	Yes	54	21.6
Having on job trainings on Ethiopian medium clinic minimum requirements	No	246	98.4
	Yes	4	1.6
Participated in informing other staff about ES3613 2012 standard	No	200	80.0
	Yes	50	20.0
Registered at FMHACA	Yes	250	100.0

5.3 Level of health workers awareness of about Ethiopian medium clinic standards

The current study revealed that the overall level of good awareness toward the Ethiopan medium clinics standards among health workers working at medium clinics was 22.4 %. (Fig.3)

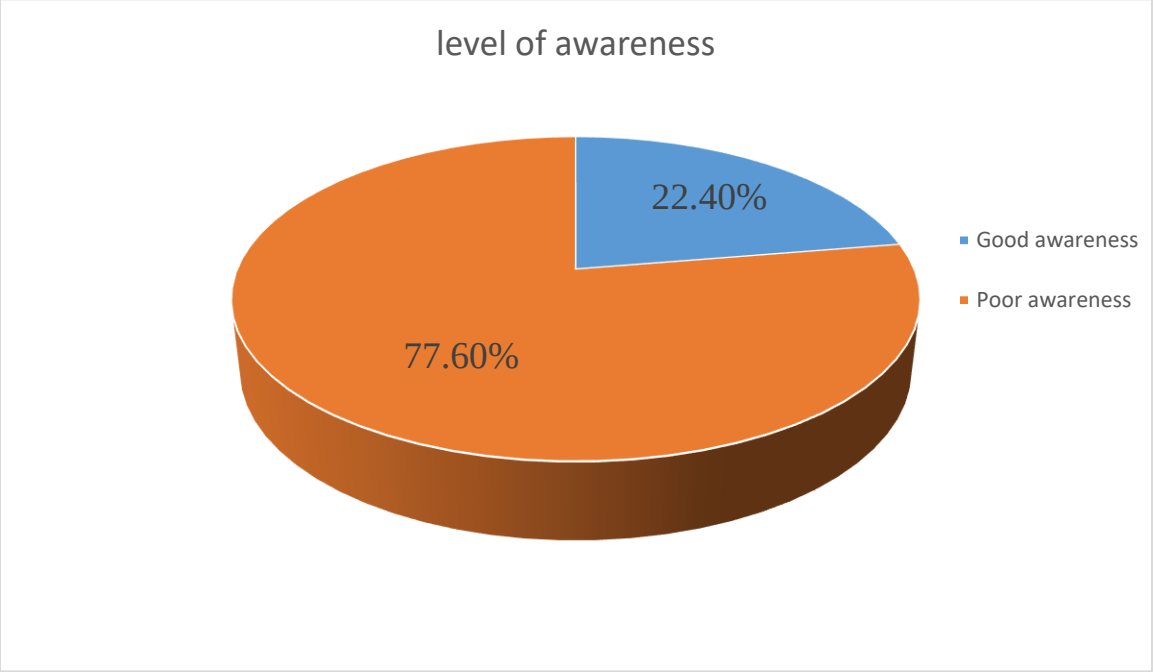

Figure 3; level of awreness on Ethiopian medium clinic standards among health workers working in medium clinics, in Addis Ababa, Ethiopia, 2020

5.4 Specific level of adherence to Ethiopian medium clinic standards

Regarding adherence toward Ethiopian medium clinic standards among the specific professionals participated in the current study, 41.2% health professionals,55.6% receptionists, 36.0% clinic owners,41.4%, professionals working at OPD, 46.2% laboratory professionals and 48.4% janitors had good level of adherence. (Fig.4)

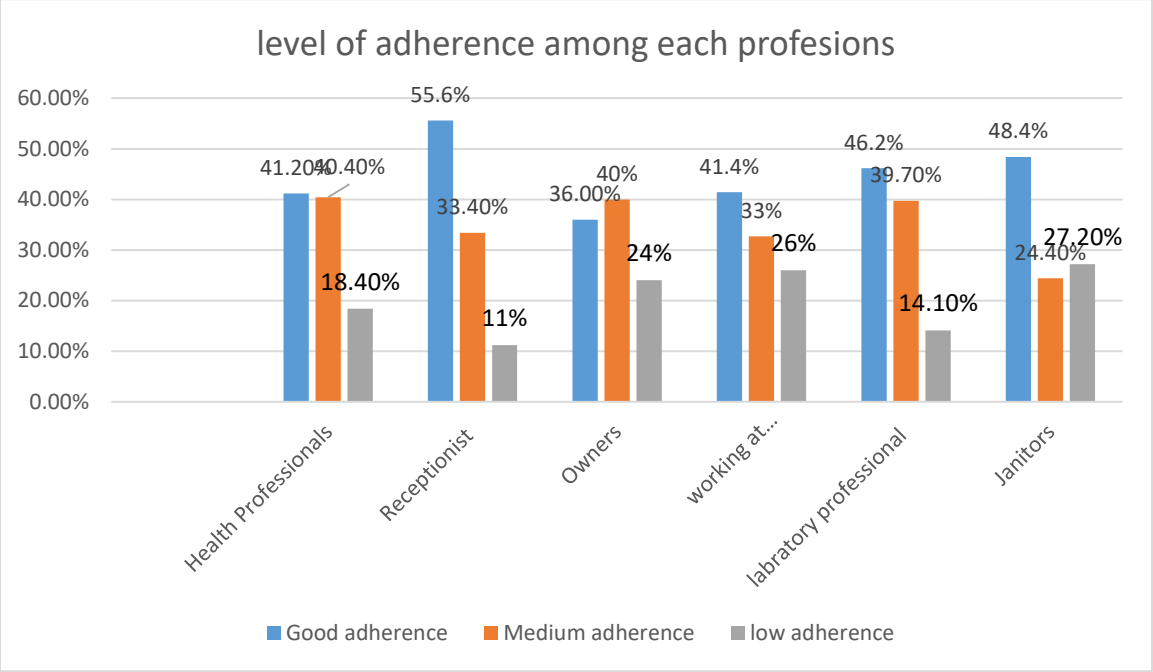

Figure 4. Specific level of adherence toward Ethiopian medium clinic standards among health workers working in medium clinics, in Addis Ababa, Ethiopia, 2020

5.5 Overall level of adherence toward toward Ethiopian medium clinic standards among health workers working in medium clinics

This study also, showed that 44.8% of the study participants had overall level of good adherence with the Ethiopian medium clinic standards. (Fig.5)

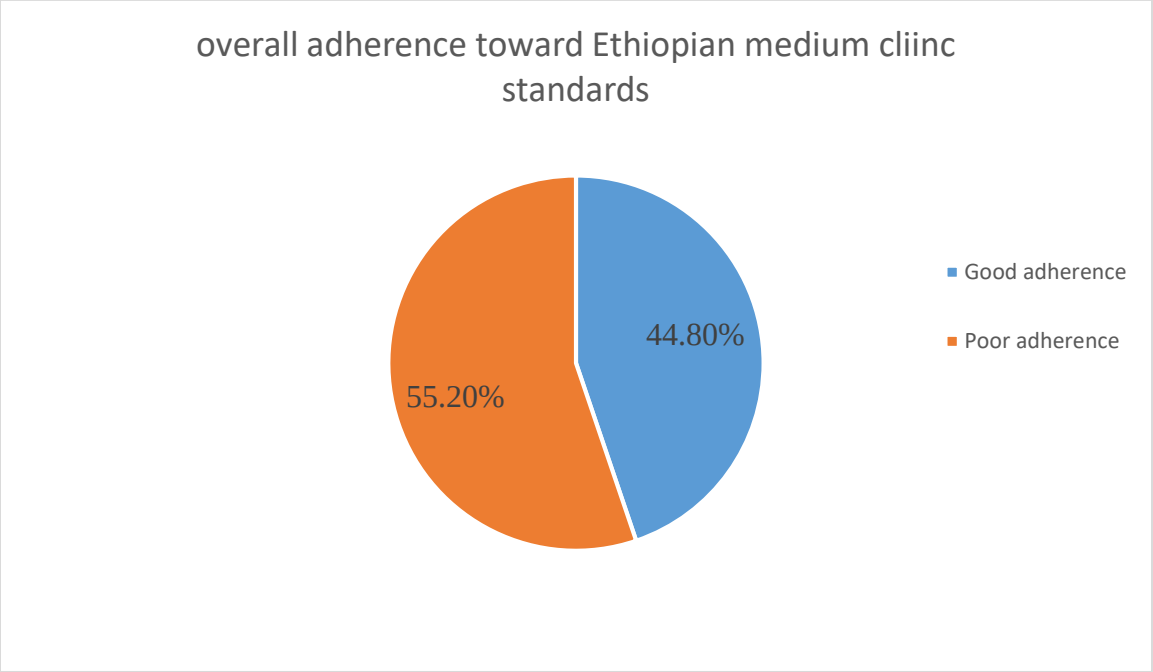

Figure 5. Overall level of adherence toward Ethiopian medium clinic standards among health workers working in medium clinics, in Addis Ababa, Ethiopia, 2020

5.6 Factors associated with awareness and adherence toward Ethiopian medium clinic standards among health workers working in medium clinics.

5.6.1 Bivariate Analysis

For each explanatory variable, bivariate analysis was done and socio-demographic factors such as age, sex, highest level of educational status, take training on Ethiopian medium clinic minimum requirement standard, participate in informing other staff about Ethiopian medium clinic standard, awareness, monthly income and work experience within the institution are variables which were fulfilled the minimum requirement of p-value < 0.05 significance level for further multivariate logistic analysis for level of adherence.

Further, factors such as age, sex, marital status, participate in informing other staff about Ethiopian medium clinic standard, adherence, monthly income, work experience within the institution and total years of experience were variables fulfilled the minimum requirement of p-value < 0.05 significance level for further multivariate logistic analysis for awareness.

5.6.2 Multivariate Logistic Analysis

Assessment was done and it showed that the model adequately fits the data for awareness and adherence as p-value from Hosmer and Lemeshow test was 0.002 and 0.032 respectively. During the multivariate analysis; factors such as those who were in the age interval of 21-25 years and 26-30 years had statistically significant association with adherence toward Ethiopian medium clinic standards. But being participated in informing other staff about Ethiopian medium clinic standard were the only factor had statistically significant association with awareness during the multivariate analysis. (Table 3 & 4)

By using multivariate (Adherence) logistic regression, health workers who were in the age interval of 21-25 years (AOR 0.19, 95%CI (0.06, 0.60)) and 26-30 years of old (AOR 0.06, 95% CI (0.01, 0.32)) had statistically significant association with adherence. In addition, during multivariate (awareness) logistic regression, individuals who were not participated in informing other staff about Ethiopian medium clinic standard (AOR 1017.49, 95% CI (35.99, 28768.10)) had statistically significant associated with awareness.

Table 3; Factors associated of adherence toward Ethiopian medium clinic standards among health workers working in medium clinics, in Addis Ababa, Ethiopia, 2020

Explanatory Variables	Adherence		COR,95%(CI)	AOR,95%(CI)	p-value
	good	Not good			
Age					
20 years and below	18	32	1	1	
21-25 years	55	38	0.39 (0.19, 0.79)*	0.19 (0.06, 0.60)**	0.004
26-30 years	36	23	0.36 (0.17, 0.78)*	0.06 (0.01, 0.32)**	0.001
31-35 years	2	31	8.72 (1.87, 40.76)*	0.37 (0.03, 5.27)	0.466
36 years and above	1	14	7.88 (0.96, 64.91)	0.38 (0.01, 11.81)	0.580
Sex					
Female	83	75	1	1	
Male	29	63	2.40, (1.40, 4.12)*	1.47 (0.66, 3.26)	0.347
Marital status					
Single	70	67	1	1	
Other	42	71	1.77 (1.06, 2.93)	1.18 (0.47, 2.98)	0.725
Highest level of education					
MD/BSC/BA	8	51	1	1	0.708
diploma/level4	71	48	0.11 (0.05, 0.24)*	1.36 (0.28, 6.69)	0.809
12th complete	19	18	0.15 (0.06, 0.40)*	0.78 (0.11, 5.68)	0.842
10th complete	11	16	0.23 (0.08, 0.67)*	0.81 (0.10, 6.67)	0.539
less than grade 10	3	5	0.26 (0.05, 1.31)	2.26 (0.17, 30.40)	0.708
Take training on Ethiopian medium clinic minimum requirement standard					
No	108	88	0.07 (0.02, 0.19)*	0.11 (0.00, 7.72)	0.313
Yes	4	50	1	1	
Participate in informing other staff about ES3613 2012 standard					
No	109	91	0.05 (0.02, 0.18)*	0.19 (0.02, 2.26)	0.189
Yes	3	47	1	1	
Awereness					
Good awereness	5	51	1	1	

Poor awerenss	107	87	0.08 (0.03, 0.21)*	3.19 (0.05, 225.50)	0.593
Monthly income					
2000 birr and below	47	51	1	1	
2001-4000 birr	45	28	0.57 (0.31, 1.06)	0.83 (0.29, 2.37)	0.722
above 4000 birr	20	59	2.72 (1.43, 5.17)*	1.25 (0.34, 4.62)	0.736
Work experience within the institution					
2 years and below	64	57	1	1	
3-4 years	46	61	1.49 (0.88, 2.51)	2.23 (0.98, 5.10)	0.057
5 years and above	2	20	11.23(2.51,50.16)*	0.95 (0.07, 12.33)	0.970

* Significant association (p-value < 0.05 in bivariate) **-significant association (p-value<0.05in multivariate analysis)

Other marital status = married, divorced and widowed ; not good adherence = low & medium

Table 4; Factors associated of awareness toward Ethiopian medium clinic standards among health workers working in medium clinics,in Addis Ababa, Ethiopia, 2020

Explanatory Variables	Awareness		COR,95%(CI)	AOR,95%(CI)	p-value
	Good	Poor			
Age					
20 years and below	1	49	318.50(26.75,3792.32)*	33.66 (0.00, 747896.44)	0.491
21-25 years	4	89	144.63 (24.04, 870.02)*	34.44 (0.01, 227767.80)	0.430
26-30 years	9	50	36.11 (6.94, 187.88)*	13.07 (0.00, 50002.94)	0.541
31-35 years	29	4	0.89 (0.15, 5.53)	0.10 (0.00, 360.05)	0.578
36 years and above	13	2	1	1	
Sex					
Female	10	148	14.80 (6.92, 31.64)*	3.68 (0.41, 32.79)	0.963
Male	46	46	1	1	
Marital status					
Single	8	129	1	1	
Other	48	65	0.084 (0.03, 0.19)*	6.86 (0.31, 152.92)	0.725
Participate in informing other staff about ES3613 2012 standard					
No	7	193	1351.00 (162.29, 11239.82)*	1017.49 (35.99, 28768.10)**	0.189
Yes	49	1	1	1	
Adherence					
Good	5	107	1	1	
Low & medium	51	87	0.08 (0.03, 0.21)*	0.494 (0.09, 2.91)	0.436
Monthly income					
2000 birr and below	2	96	78.40 (19.99, 341.71)*	7.35 (0.112, 464.68)	0.346

2001-4000 birr	5	68	22.21 (8.05, 61.33)*	2.18 (0.17, 27.59)	0.546
above 4000 birr	49	30	1	1	
Work experience within the institution					
2 years and below	8	113	141.25 (27.93. 714.32)*	0.48 (0.00, 449027.28)	0.916
3-4 years	28	79	28.21 (6.20, 128.50)*	3.84 (0.00, 2374910.78)	0.843
5 years and above	20	2	1	1	
Total years of experience					
2 years and below	1	71	42.60 (5.74, 316.04)*	2.72 (0.01, 1095.83)	0.744
3-4 years	4	38	5.70 (1.92, 16.91)*	0.25 (0.01, 4.68)	0.352
5 years and above	51	85	1	1	

* Significant association (p-value < 0.05 in bivariate) **-significant association (p-value<0.05in multivariate analysis)

Other marital status = married, divorced and widowed

CHAPTER 6: DISCUSSION

The current study found that 22.4 % of the health workers working at medium clinics had good level of awareness toward Ethiopian medium clinic standards, which is lower than the previous study finding which was conducted in North Showa Zone Oromia Region of Ethiopia, which reported 78.9% the health workers were aware of the manual listing and control policies and guidelines for healthcare workers (37) and from the other study which was done in Manya Krobo District of Ghana report that only 37.0% of health care workers knew about the standard precautions (38).

Further, the other study from India mentioned that 70.5% of the participants were aware and able to identify all of the components of the minimum standard precaution (39). Whereas, it was quite higher as compared to the study that was conducted in North Eastern Nigeria which reported that 13% of the health workers had good knowledge toward universal precautions (40). The variation might be due to the difference in sample size which involving 100 HCWs in Ghana (38) and 361 in North Showa Zone Oromia (37), and difference in place of study country (38, 40).

Further, the current study revealed that 55.2% of the health care workers working at medium clinics had overall level of poor adherence toward Ethiopian medium clinic standards.This implies higher proportions of the health workers were not adhered to minimum national recommended health facility standards. This might be related to lack of skill and knowledge on the minimum requirements. Because, lack skills and knowledge are among the different barriers that could lead HCWs impaired to provide comprehensive service and unable adhere with the standard (41).

The current study also tried to identified factors associated with level of awareness and adherence of health workers toward the minimum Ethiopian medium clinic standards. And, with respect to age those who were in the age interval of 21-25 years and 26-30 years of old were 0.19 and 0.06 time protective which means they were 0.81 and 0.96 times less likely to be not adhered with the standards as compared to those who were 20 years and below. This implies being in the age interval of 21-30 years are protective from being having poor level of adherence. Even if there might be different reason for the discrepancy on the demographic characteristics of individual's level of adherence, the increment in age may create a chance the HCWs to learn from their experience as well as academic careers. Education slightly improve healthcare workers' adherence to Standard Precautions (42).Whereas, the integrative literature review study mentioned poor training, risk

behaviors, unawareness of the importance of Standard Precaution, insufficient availability of personal protective equipment and inappropriate work conditions (excessive workload and reduced teams) as the main reasons for low adherence of health workers to standard precautions concerned (43).

In addition, during multivariate logistic regression of awareness, health workers who were not participated in informing other staff about Ethiopian medium clinic standard were 1017.49 times more likely to have poor awareness about the Ethiopian medium clinic standard as compared to who were involved. This could be associated the information given about ES3613 2012 standard. Health organizations must educate their staff to increase the level of awareness toward universal or standard precaution, and increase the quality of patient care (44). This is supported by the study finding from two Public Health facilities of Nigeria which described that 57.7% of the HCWs got to awareness about universal precaution in the hospital, while only 28.5%, 4.6% and 9.2% learnt about it while in school, from workshops and the media respectively(45).Pre-service and earlier training are critically important in establishing a competent health care workforce, also regular refresher and in-service education opportunities are necessary to ensure that HCWs to have retained awareness and adherence toward health facility standards (41, 46).

6.1 Strength and limitation of the study

6.1.1 Strength of the the study

As per of my review of different literature, this is the first study at the study area as well as national leve l to assess level of awareness and adherence toward a minimum national recommended health facility standard among health workers working in selected private medium clinics in Addis Ababa, Ethiopia.

6.1.2 Limitation of the study

Among the limitation of this study, the fact related to the cross-sectional design used, which simultaneously evaluate variables of the effect of interest and their associated factors, should be emphasized. Thus, it could not possible to identify whether influenced the associated factors or the outcome variables such as awareness and adherence toward health facility standards. Second, since this was the first study to address the current topic, there was a scarcity of published literatures to make detail comparative explanation the current study finding with the previous study findings.

6.2 Conclusion and recommendation of the study

6.2.1 Conclusion

The current study result indicated that most of the study participants had poor level of awareness and poor adherence toward Ethiopian medium clinic standards. Even though, the low adhesion to standard is linked to individual aspects of workers, employers and educational institutions, the factors such as age of the health care providers with level of adherence and being participated in informing other staff about Ethiopian medium clinic standard with level of awareness had statistically significant association. Therefore, in order to provide crucial and potentially life-saving services, health care providers should have a better adherence toward the health facility requirements.

6.2.2 Recommendations

To the health institution, Addis Ababa FMHACA, Ministry of Health;

- Addis Ababa FMHACA, Ethiopian Ministry of Health and other related health institutions should develop a regular schedule to educate and desensitize the Ethiopian medium clinic standard for all health care providers who are working in private health institutions.
- Providing continuous pre-recruitment and on job educational training and awareness creation on Ethiopian medium clinic standard by the health institutions is essential.
- Ensuring a regular assessment of health care providers level awareness and adherence toward the standards is an important intervention to improve the overall health care service.
- Generally capacitating the healthcare providers level of awareness and adherence toward the standards and regular supportive supervision or continuous monitoring and evaluation will have its own contribution in promoting health care service and system of the country.

To researchers;

- To conduct a comparative study by including government health institutions
- Better to use a mixed qualitative and quantitative data collection method.

References

1. World Health Organization. Monitoring the Building Blocks of Health Systems: a Handbook of Indicators and Their Measurement Strategies [Internet]. Vol. 35, World Health Organozation. World Health Organization; 2010. Available from: https://www.who.int/healthinfo/systems/WHO_MBHSS_2010_full_web.pdf

2. ETHIOPIA URI. STANDARD OPERATING PROCEDURES FOR MEDICAL REFERRAL OF PERSONS OF CONCERN IN ETHIOPIA [Internet]. 2015. Available from: https://data2.unhcr.org/en/documents/download/62848

3. Hashemi A, Kouchak F, Palenik CJ, Askarian M. Adherence to Facility Management and Safety Standards in Shiraz Hospitals, Iran. Vol. 1, Adherence to Facility Management in Shiraz Hospitals Social Determinants of Health. 2015.

4. Contrada E. Facilitators and Barriers to Clinical Practice Guideline Use Among Nurses. AJN, Am J Nurs [Internet]. 2012;112(7):46. Available from: http://bit.ly/GN9N3A.

5. Hassan A, Abdullahi GA, Ahmed AA, Sabiu A, John U, Ezekeil G, et al. Assessing prescriber's awareness of essential medicine list, hospital drug formulary and utilization of standard treatment guidelines in a tertiary healthcare facility in North-Central Nigeria. Alexandria J Med. 2018 Mar;54(1):81–4.

6. Arp R. Consciousness and Awareness Switched-On Rheostats: A Response to de Quincey 1. J Conscious Stud. 2007;101–6.

7. Vanderpuije LN, Abdul-Razak A. Evaluating Health Personnels Adherance to standardes of Pharmaceutical care in managing the storage of essential medicines. Int J Econ Commer Manag [Internet]. 2014;II(3). Available from: http://ijecm.co.uk/

8. Wamai RG. Reviewing Ethiopia ' s Health System. Int Med Community [Internet]. 2009;52. Available from: https://www.researchgate.net/publication/291727516_Reviewing_Ethiopia's_Health_System_Development

9. McKinlay JB, Link CL, Freund KM, Marceau LD, O'Donnell AB, Lutfey KL. Sources of variation in physician adherence with clinical guidelines: Results from a factorial

experiment. J Gen Intern Med. 2007 Mar;22(3):289–96.

10. Bekele I, Yimam I, Akele G. Adherence to Infection Prevention and Factors among Nurses in Jimma University Medical Center. Immunome Res. 2018;14(2).

11. Minimum standards in health services. In: The Sphere Project: Humanitarian Charte and Minimum Standards in Disaster Response. 2004.

12. The Australian Commission on Safety and Quality in Health Care. National Safety and Quality Health Service Standards [Internet]. Australian Commission on Safety and Quality in Health Care; 2012. Available from: https://www.safetyandquality.gov.au/sites/default/files/migrated/National-Safety-and-Quality-Health-Service-Standards-second-edition.pdf

13. Groupware S, Gutwin C, Greenberg S. A Framework of Awareness for Small Groups in Shared-Workspace Groupware. 1999;1–34.

14. Merikle PM. Toward a definition of awareness. 2013;22(5):449–50. Available from: https://link.springer.com/article/10.3758/BF03333874

15. Christakis DA, Rivara FP. Pediatricians' awareness of and attitudes about four clinical practice guidelines. Pediatrics [Internet]. 1998;101(5):825–30. Available from: www.aappublications.org/news

16. Tudiver F, Herbert C, Goel V. Why don't family physicians follow clinical practice guidelines for cancer screening? Vol. 159, CMAJ. 1998. p. 797–8.

17. Organisation for Economic Co-operation and Development., World Health Organization., World Bank Group. Delivering quality health services : a global imperative for universal health coverage. OECD Publishing; 2018. 96 p.

18. Rosen B, Porath A, Pawlson LG, Chassin MR, Benbassat J. Adherence to standards of care by health maintenance organizations in Israel and the USA. Int J Qual Heal Care. 2011 Feb;23(1):15–25.

19. Al-Mandhari A, Al-Zakwani I, Al-Adawi S, Al-Barwani S, Jeyaseelan L. Awareness and implementation of nine World Health Organization's patient safety solutions among three

groups of healthcare workers in Oman. BMC Health Serv Res. 2016 Sep 30;16(1):1–7.

20. Ejigu E, Tadeg H. Development of the National Minimum Standards for Healthcare Facilities in Ethiopia: A Milestone for Country Ownership and Sustainability of Best Practices. Management Sciences for Health. Arlington, VA:;

21. Marquez L. Helping Healthcare Providers Perform According to Standards. Oper Res Issue Pap [Internet]. 2001;2(3):1–34. Available from: www.qaproject.org

22. Morrow G, Burford B, Rothwell C, Carter M, McLachlan J, Illing J. Professionalism in healthcare professionals, Research report [Internet]. 2014. Available from: http://www.hpc-uk.org/assets/documents/10003771Professionalisminhealthcareprofessionals.pdf

23. Nigussie WD. Assessment of the degree of adherence to health facility indicators related to rational drug use in Selected Health Facilities of Amhara Region , Northwest Ethiopia. Int J Pharma Sci Res. 2014;5(04):171–8.

24. El-Ayady AA, Meleis DE, Ahmed MM, Ismaiel RS. Primary Health Care Physicians' Adherence and Attitude Towards Integrated Management of Childhood Illness Guidelines in Alexandria Governorate in Egypt. Glob J Health Sci. 2015 Oct 20;8(5):217–24.

25. Anand S, Bärnighausen T. Human resources and health outcomes : cross-country. Lancet [Internet]. 2004;364(October 30):1603–9. Available from: https://www.ncbi.nlm.nih.gov/pubmed/15519630

26. Ethiopian Standard Agency. Medium clinic-Requirements [Internet]. First edit. 2012. Available from: http://www.forsslund.org/StandardHealthFaclitiy/Medium Clinic.pdf

27. K Abdul Gafoor*. Considerations in measurement of awareness National Seminar on Emerging trends in education. In: National Seminar on emerging trends in education [Internet]. 2012. Available from: https://www.academia.edu/4758200/Considerations_in_the_Measurement_of_Awareness

28. Beyamo A, Dodicho T, Facha W. Compliance with standard precaution practices and associated factors among health care workers in Dawuro Zone, South West Ethiopia, cross sectional study. BMC Health Serv Res. 2019 Jun 13;19(1).

29. Federal Democratic Republic of Ethiopia Ministry of Health. Annual Performance Report [Internet]. 2017. Available from: https://www.itacaddis.org/docs/2017_11_10_09_48_31_ARM 2017.compressed.pdf

30. https://www.who.int/whr/2006/06

31. CrescereMed, Medical Transcription Company, August, 2020

32. WHO. Health workers - a global profle. In: Vita-Finzi L, Campanini B, editors. The world health report 2006: working together for health. Geneva: World Health Organization; 2006. p. 1–18.

33. www.lawinider,com. Dictionary

34. www.definitions.net › definition › private+hospital

35. https://www.merriam-webster.com/dictionary/awareness

36.Ethiopian medium clinic minimum requirements standards (https://www.collinsdictionary.com/dictionary/english/adherence)

37. Kemal Jemal , Ketema Gashaw, Tadele Kinati, Worku Bedada, and Belete Getahun, Clean and Safe Healthcare Environment: Knowledge, Attitude, and Practice of Infection Prevention and Control among Health Workforce at North Showa Zone Oromiya Region,Journal of Environmental and Public Health Volume 2020, Article ID 6021870, 10 pages https://doi.org/10.1155/2020/6021870

38. Sandra Enyonam Akagbo, Priscillia Nortey and Mercy M. Ackumey, Knowledge of standard precautions and barriers to compliance among healthcare workers in the Lower Manya Krobo District, Ghana,BMC Res Notes (2017) 10:432 DOI 10.1186/s13104-017-2748-9

39. NAEEMA HASSAN AL-GASSEER, JOSEPH AMON , CATHRINE ANDERSEN , et al, Protection of Health Workers, Patients and Facilities in Times of Violence ,A Conference Convened by the Center for Public Health and Human Rights Johns Hopkins Bloomberg School of Public Health Bellagio, Italy November 2013,

40. Abdulraheem IS, Amodu MO, Saka MJ, Bolarinwa OA, Uthman MMB, Knowledge, Awareness and Compliance with Standard Precautions among Health Workers in North Eastearn Nigeria. J Community Med Health Edu, 2012, 2:131. doi:10.4172/jcmhe.1000131

41. The Health Communication Capacity Collaborative (HC3), Factors Impacting the Effectiveness of Health Care Worker Behavior Change: A Literature Review. Baltimore: Johns Hopkins Center for Communication Programs, 2016

42. Moralejo D, El Dib R, Prata RA, Barretti P, Corrêa I. Improving adherence to Standard Precautions for the control of health care-associated infections. Cochrane Database of Systematic Reviews 2018, Issue 2. Art. No.: CD010768. DOI: 10.1002/14651858.CD010768.pub2

43. Janete Silva Portoa Maria Helena Palucci Marziale, Reasons and consequences of low adherence to standard precautions by the nursing team. Rev Gaúcha Enferm. 2016 jun;37(2):e57395. doi: http://dx.doi.org/10.1590/1983- 1447.2016.02.57395.

44. Ghidaa Al-Mahdali, a literature review of healthcare workers compliance to, and knowledge of standard/universal precautions, MOJ Public Health. 2015;2(5):156–166. DOI: 10.15406/mojph.2015.02.00040

45. A. Fadeyi, A. Fowotade, M. O. Abiodun, A. K. Jimoh, C. Nwabuisi , O. O. Desalu, Awareness and Practice of Safety Precautions among Healthcare Workers, The Nigerian Postgraduate Medical Journal, 2011, Vol. 18, No. 2,

46. Biniyam Sahiledengle Geberemariyam, Geroma Morka Donka and Berhanu Wordofa, Assessment of knowledge and practices of healthcare workers towards infection prevention and associated factors in healthcare facilities of West Arsi District, Southeast Ethiopia: a facility-based cross-sectional study, Archives of Public Health (2018) 76:69 https://doi.org/10.1186/s13690-018-0314-0

47. Duarte Valim, Marília de Morais, Richarlisson Borges Marziale, Maria Helena Palucci , Instruments and impacting factors on standard precautions knowledge among health workers, Enfermería Global, Nº 41 Enero 2016 Páge 305.

48. Tiruneh MA, Ayele BT (2018) Practice of code of ethics and associated factors among medical doctors in Addis Ababa, Ethiopia. PLoS ONE 13(8): e0201020. https://doi.org/10.1371/journal.pone.0201020Ababa, Ethiopia.

49. Biruk L Wamisho,Mesafint Abeje Tiruneh,Lidiya Enkubahiry Teklemariam, Surgical And Medical Error Claims In Ethiopia:Trends Observed From 125 Decisions Made By The Federal Ethics Committee For Health Professionals Ethics Review, *https://www.dovepress.com/ by 197.156.118.199 on 13-Mar-2021.*
50. Abiru Neme Neme, Desta Workineh Workineh, Bethlehem Getachew Getachew, Perceived Adherence to Professional Ethics and Associated Factors Among Health Professionals in Bale Zone Public Hospitals, Oromia Regional State, South-East Ethiopia,2019.

51. Geberemariyam BS, Donka GM, Wordofa B. Assessment of knowledge and practices of healthcare workers towards infection prevention and associated factors in healthcare facilities of West Arsi District , Southeast Ethiopia : a facility-based cross-sectional study. Arch Public Heal. 2018;76(69):1–11.Google Scholar

52. Isara AR OA. Knowledge and practice of standard precautions among health care workers in the Federal Medical Centre , Asaba , Delta State, Nigeria. Niger Postgr Med J. 2010;17(3):204–9.Google Scholar.

53. Admasu T, et al. Infection control knowledge, attitudes, and practices among healthcare workers in Addis Ababa, Ethiopia. Infect Control Hosp Epidemiol. 2013;34:1289–96.Article Google Scholar

54. Yazie TD, Sharew GB, Abebe W. Knowledge , attitude , and practice of healthcare professionals regarding infection prevention at Gondar University referral hospital , northwest Ethiopia : a cross - sectional study. BMC Res Notes. 2019;12(563):1–7. https://doi.org/10.1186/s13104-019-4605-5.Article Google Scholar

55. Ayele et.al. Knowledge towards standard precautions among healthcare providers of hospitals in Amhara region, Ethiopia, December 2020.

---

56. MOJ Public Health, A literature review of healthcare workers compliance to, and knowledge of standard/universal precautions, Volume 2 Issue 5 - 2015.

57. Gulilat KTG. Assessment of knowledge, attitude and practice of health care workers on infection prevention in health institution Bahir Dar city administration. Sci J Pub Heal. 2014;2:384–93.

58. Abebaw Andarge, Health Facilities Distribution Mapping in Addis Ababa, Ethiopia, 2016.

---

59. Osewe Patrick. Strengthening the role of the private sector in expanding health coverage in Africa. 2006 [Google Scholar].

60. World Bank Group, author. The Business of Health in Africa, International Finance Corporation Report. 2007. Dec 18, [Google Scholar]

61. FMOH, author. Health and Health Indicators. Ethiopia: Ministry of Heath; 2007. [Google Scholar]

62. Vilasini D. et.al. Private Hospital Sector Development: An Exploratory Study on Providers Perspective in Addis Ababa, Ethiopia, 2011.

63. BEHAK Multimedia, Business & Investment Stories, 2009.

64. Addis fortune, Business and Indicators, 2021.

Annexes

Annex I Information sheet for interview of health workers.

Information Sheet

Hello, my name is Ashebir Gudina I am MPH student in the school of public health, Addis Ababa University. The purpose of this study is to assess the awareness and adherence of health workers towards medium clinic standards in Addis Ababa. This will be helpful in improving the utilization of standards of Ethiopian medium clinics to identify the gaps towards.

As you know within the Ethiopian Health Service, a number of standards are currently taking place that affect health systems. This standards are designed to align with the national laws and policies in order to ensure the public safety, to promote access to quality health services and encourage health investments by standardizing the services all over the country. However, the awareness and adherence of this standard towards health workers is not yet assessed. Therefore, I am interested in assessing the health workers awareness and adherences toward this.

Procedures

If you agree to participate in my study, I will conduct a questioner with you at a time of your choice. The questioner will involve questions about the title mentioned above. It would last about half an hour. If you don't wish to continue, you can stop answering questions at any time. Your participation is completely voluntary. You can refuse to answer any questions and/or withdraw from the study at any time without a problem to you.

Benefits

There is no direct personal benefit to you from taking part in this study. It is hoped that the study will give input to know the health workers about the utilization of ES3613 2012 standards and their gaps towards. This helps to design strategies for better utilization and help to improve the service that is given to the society.

Risks/Discomforts

Some of the study questions may make you uncomfortable. You are free to decline to answer any questions you don't wish to, or to stop the interview at any time.

Confidentiality

All your responses will remain strictly confidential, your name will not be recorded on the questioner guide, and your responses will not be linked to your identity at any time. The results of this study will be presented collectively and no individual participants will be identified.

Consent Form

I have been informed of and understand the purpose and procedures of this study and the purpose and procedures of this interview.

I understand that I am free to withdraw my consent and discontinue my participation at any time. I understand that I can choose to answer only the questions that I wish to answer.

By signing this consent form, it is indicating that I am fully understand the above information and I am agree to participate in this study.

Participant's signature _____

Date: _____

Researcher's signature: _____

Date: _____

If you have any questions about this study, please contact principal investigator,

Ashebir Gudina (Mobile: 0911-959558); e-mail: ashebirgudina11@gmail

Annex II Self-Administered Questionnaire for health workers.

Self-Administered Questionnaires on awareness and adherence to healthcare facility standard among health workers in medium clinics in Addis Ababa Ethiopia.

Hello, my name is Ashebir Gudina I am MPH student in the school of public health, Addis Ababa University. The purpose of this study is to assess the awareness and adherence of health workers towards medium clinic standard in medium clinics in Addis Ababa. This will be helpful in improving the utilization of standards of Ethiopian medium clinics to identify the gaps towards it. Your answers are valuable to the successful completion of the study. I would like to extend my gratitude for your cooperation in advance and kindly requested to give appropriate answer for each question. If an item is irrelevant, please leave the answer blank.

If you have any question or comment; please feel free to contact the principal investigator, Ashebir Gudina (Mobile: 0911-959558); e- mail: ashebirgudina11@gmail.com).

Part I. Questions to gather socio demographic information for health workers.

This section is preferably filled in by interviewing the health workers

Name of the health facility_____
Year of establishment of the medium clinic [Ethiop. Calendar] _____E.C
Sub city _____
Name of interviewer _____
Date of interview _____

No.	QUESTIONS AND FILTERS	RESPONSES	SKIP
101	Back ground of the respondent Participants age in years		
102	Participants sex	0. Female 1.Male	
103	Marital status	1. Married 2. Single 3. Divorced 4. widowed	
104	Monthly income in birr		
105	Current position in the clinic	1. License Holder 2. Owner 3. Technical Manager 4. OPD/Emergency Head 5. Laboratory Head 6. Janitor 7. Reception 8. Other specify----------	

106	What is your qualification?	1. Medical doctor 2. Health officer 3. Bsc Nurse 4. Clinical Nurse 5. Laboratory technician 6. Non health worker 7. Other (specify)_____	
107	What is your highest level of education	1. MPH/Msc/MA 2. MD/BSC/BA 3. Diploma/level4 4. 12^{th} complete 5. 10^{th} complete 6. Less than grade 10 7. Other(specify)_____	
108	Work experience in your current position of the clinic in years		
109	Total Work experience in years		

Part II. Questions to gather the awareness of health workers about Ethiopian medium clinic standards.

No.	Questions	Yes	No	Remark
201	Have you heard Ethiopian medium clinic standards? If your answer is no to ≠201 skip to the question ≠203			
202	If your answer is yes to question number 201 is yes through what means of communication 1. Through training 2. Through department meeting 3. Through reading materials 4. Through posted materials 5. Through public Medias 6. Through association gatherings			
203	Have you ever read the Ethiopian medium clinic minimum requirement standard?			
204	Did you have taken training on Ethiopian medium clinic minimum requirement standard?			
205	Do you have on job trainings on Ethiopian medium clinic minimum requirements?			
206	Did you participate in informing other staff about ES3613 2012 standard?			

Part III. Questions to gather the adherence of health workers towards Ethiopian medium clinic standards tick (√) on the answer.

Questions	Yes	No	Skip	Responsible person	Remark
301. Are you registered at FMHACA?				Health worker	
302. Are you available at a time in the clinic?				Health worker	
303. Did you inform the client or client's next of kin to fulfill consents before undertaking any type of procedures and treatments?				Health Professionals	
304. Do you introduce your names and functions or responsibilities in the clinic before providing care to the client?				Health Professionals	
305. Did you keep confidentially the information in the patient's records in a way that not be released to anyone outside the medium clinic?				Receptionist	
306. Do you have an occupational health screening prior to entering active status and once every five (5) years thereafter?				Health worker	
307. Did you keep on file the medical checkup reports of all staff and make available during inspection by the appropriate regulatory body?				Licensor/owner/ manager	

308. Do you have a periodically reviewed and updated staffing plan to total number and types of staff needed as a whole and for each service unit?				Licensor/owner/ manager	
309. Did you participate in a Quality Assurance/ Performance Improvement program to determine the status of patient care and treatment?				Health worker	
310. Do you have regular medical staff meetings to review the clinical works & administrative duties?				Health Workers	
311. Do you use footwear which is safe, supportive, clean, and non-noise producing while all times at work?				Health worker	
312. Did you worn hair in a way that prevents contamination and does not present a safety hazard?(for ladies)				Health Workers	
313. Did you have identification badges easily visible with name & profession and worn at all times while at work?				Health Workers	
314. Do you have clear protocol for minor surgical procedures to be done at outpatient level?				OPD/Emergency and injection room head	
315. Did you record surgical interventions integrated with the patient's medical record for each patient?				OPD/Emergency and injection room head	

316. Did you record preoperative diagnosis in the medical record for all patients prior to minor surgery?				OPD/Emergency and injection room head	
317. Do you have a copy of management protocols in your working area?				Health Professionals	
318. Do you have a written policy about administration of local anesthesia in your working area?				Health Professionals	
319. Did you hold or dispense emergency medicines which are not registered, non-emergency medicines and donated?				Health Professional s	
320. Did you keep documentation which shows medicines source, date of purchase and other relevant information?				Health Professionals	
321. Do you have IEC and entertaining materials in the waiting area?				Health Professionals	
322. Do you have job descriptions that have detail the roles and responsibilities of your duties?				Health Professionals	

323. Is equipment's in your unit be in a good working order, routinely quality controlled, and precise in terms of calibration?				Laboratory Professionals	
324. Do you have written policies and procedures at least Procedure manuals (SOP) or guidelines for all tests and equipment?				Laboratory Professionals	
325. Do you have report times for results (Established turnaround time) and Quality assurance and control processes?				Laboratory Professionals	
326. Did you have posted normal ranges for all tests?				Laboratory Professionals	
327. Did you document quality control data: calibration report, internal and external quality control, refrigerator readings?				Laboratory Professionals	
328. Do you keep medical record confidentially, available only for use by authorized persons or as otherwise permitted by law?				Receptionist	
329. In the patient's medical record did you write legibly, in permanent ink patient's full information, date and your sign?				Receptionist	

330. Do you have medical record, logbooks and shelves at your working area?				Receptionist	
331. Do you give health promotion activities?				Health Professionals	
332. Do you have plan/schedule, integrate and monitor health promotion activities at the facility?				Health Professionals	
333. Do you use clean white coat and guans at all times?				Health Professionals	
334. Do you supervise and control Collection, transportation and disposal of medium clinic wastes?				Health Professionals	
335. Are you create pleasant environment to patients, staffs and visitors?				Health workers	
336. Are you responsible person for regular surveillance of overhead and underground tank, regular chlorination and cleaning?				Janitors	
337. Do you use infection control measures in accordance with the medium clinic infection prevention standard?				Health workers	
338. Is your working area free of rodent and insect infestations?				Health workers	
339. Have you separate space provided for the storage of housekeeping equipment and supplies?				Janitors	

340. Do you have plan, organize, co-ordinate, control and monitor all housekeeping and maintenance activities?				Janitors	
341. Do you perform the common infection risk-reduction activities?				Health workers	
342. Do you exercise and hygiene performed after touching contaminated items, immediately, after removing gloves and between patient contacts?				Health workers	
343. Do you have personal protective equipment such as gloves, mask, eye protection (goggles) and face shield?				Health workers	
344. Are you designated in infection prevention committee? If yes do you have written protocols, procedures and have been documented?				Health workers	
345. Do you have regular training on infection prevention and control practice?				Health workers	
346. Do you have written procedures to govern the use of sanitation techniques in all areas of the medium clinic?				Health workers	

347. Did you separate infectious and noninfectious medical waste contained in disposable containers and be placed temporarily for disposal?				Health workers	
348. Do you use three bin systems used to segregate different types of waste in medium clinic?				Health workers	
349. Do you have a medical waste management plan?				Health workers	
350. Did you have orientation on personal protection methods?				Health workers	

Name of data collector: _____ signature_____

Checked by (supervisor name): _____signature_____

Annex III Amharic version of the questioner

ጤና ይስጥልኝ ስሜ አሸብር ጉዲና እባላለሁ በአዲስ አበባ ዩኒቨርሲቲ ጤና ሳይንስ ኮሌጅ በሕብረተሰብ ጤና ትምህርት ቤት በጥቁር አንበሳ ካምፓስ ውስጥ የሁለተኛ ዲግሪ ተማሪ ነኝ።እንደሚታወቀዉ በአሁኑ ጊዜ በኢትዮጵያ የጤና አገልግሎት ውስጥ በጤና የአሰራር ስርዓቶች ላይ ተጽዕኖ የሚያደርጉ በርካታ መመዘኛዎች እየተከናወኑ ናቸው ። እነዚህም መመዘኛዎች የሕዝቡን ደኅንነት ለማረጋገጥ ፣ ጥራት ያላቸውን የጤና አገልግሎቶች ተደራሽነትን ለማሳደግ እና በአገሪቱ ውስጥ ያሉትን አገልግሎቶች በደረጃ በመመደብ የጤና ኢንቨስትመንትን ለማበረታታት ሲባል ከሀገሪቷ ህጎችና ፖሊሲዎች ጋር የተጣጣሙ ሆነዉ የተቀረጹ ናቸው ። ሆኖም ለጤና ሰራተኞች ይህ ደረጃ ያለው ግንዛቤ እና አተገባበር ገና አልተገመገመም ።በመሆኑም ይህ ጥናት በዋናነት የሚያተኩረዉ በአዲስ አበባ ከተማ ስር በሚገኙ የግል መካከለኛ ክሊኒኮች ላይ ሲሆን አላማዉም በክሊኒኩ ዉስጥ የሚሰሩት ባለሞያዎች የኢትዮጵያ መካከለኛ ክሊኒክ መለኪያን የሚመለከት ሲሆን ባለሞያዎቹ ስለመለኪያዉ ምን ያህል እንደተገነዘቡና እንደሚተገበሩት መገምገም ሲሆን ይህም ወደፊት ለባለድርሻ አካላት ለመለኪያዎቹ በአግባቡ አለመተግበር ምክንያት ናቸዉ የተባሉትን ለይተዉ ክፍተቶቹን ለመሙላትና ለማሻሻል ይረዳል ።

በጥናቴ ውስጥ ለመሳተፍ ፍቃደኛ ከሆኑ በሚመችዎት ሰዓት በጥቂት ደቂቃዎች ዉስጥ ያዘጋጀዉሎትን ጥያቄ ሙሉ በሙሉ መልሰዉ የሚጨርሱ ሲሆን ጥያቄዎቹም የሚያጠነጥኑት ከላይ በተገለጸዉ ዙሪያ ይሆናል። ለመቀጠል ካልፈለጉ በማንኛውም ጊዜ ጥያቄዎችን መመለስ ማቆም ይችላሉ ። የእርስዎ ተሳትፎ ሙሉ በሙሉ በፈቃደኝነት ላይ የተመሰረተ ስለሆነ በፈለጉት ሰዓት ማቆም ወይም መተው ይችላሉ ።

ጥቅሞች

በዚህ ጥናት ውስጥ በመሳተፍዎ ምንም ቀጥተኛ የግል ጥቅም አያስገኝም ፤ነገር ግን ጥናቱ ስለ ኢትዮጵያ የግል መካከለኛ ክሊኒክ መመዘኛ የባለሞያዎቹን ግንዛቤና አጠቃቀም ዙሪያ ያሉትን ክፍተቶች ለማወቅ የሚረዳ ሲሆን ይህም ወደፊት ክፍተቶቹን ለመሙላትና ለተሻለ አጠቃቀም ይረዳ ዘንድ መመዘኛዉን ለመቅረጽ እና ለህብረተሰቡ የሚሰጠዉን የጤና አገልግሎት ለማሻሻል ይረዳል ።

ስጋት / ምቾት

የተወሰኑት የጥናቱ ጥያቄዎች ምቾት እንዲሰማዎት ላያደርጉዎት ይችሉ ይሆናል። የማይፈልጉትን ማንኛውንም ጥያቄ ለመመለስ ወይም በማንኛውም ጊዜ ለማቆም ፈቃደኛ ነዎት ።

ምስጢራዊነት

ሁሉም የጥያቄ ወረቀቶቹ በጥብቅ ሚስጥራዊ ሆነው ይቆያሉ ስምዎ በጥያቄ ወረቀቱ ላይ አይመዘግብም እናም የእርሶ ምላሽ በማንኛውም ጊዜ ከማንነትዎ ጋር አይገናኙም ። የዚህ ጥናት ውጤቶች በጋራ የሚቀርቡ ሲሆን እያንዳንዱ ተሳታፊ አይለይም ።

የፈቃድ ቅጽ

የዚህን ጥናት ዓላማ እና ሂደቶችን ተረድቼያለሁ ።

በፈቃዴ ለመሳተፍ እና ተሳትፎዬን በማንኛውም ጊዜ ለማቋረጥ ነፃ እንደሆንኩ አውቃለሁ ። መልስ መስጠት የምፈልገውን ጥያቄዎች ብቻ ላይ መልስ ለመስጠት መምረጥ እችላለሁ ።

ይህንን የስምምነት ቅጽ በመፈረም ከዚህ በላይ ያለውን መረጃ በሚገባ እንደተረዳዉና እና በዚህ ጥናት ውስጥ ለመሳተፍ በፍቃደኝነት መስማማቴን በፊርማዬ አረጋግጣለዉ ።

የተሳታፊ ፊርማ _____

ቀን _____

የተመራማሪ ፊርማ_____

ቀን፡ - _____

ስለዚህ ጥናት ማንኛቸውንም ጥያቄዎች ካሉዎት እባክዎን ዋና መርማሪውን ከዚህ በታች ቀጥሎ ባለዉ አድራሻ ያነጋግሩት

አሸብር ጉዲና **(**ሞባይል፡ ***0911-959558)*** ኢሜል፡ ashebirgudina11@gmail.com

ክፍል *1.* ለጤና ሰራተኞች ማህበራዊ ሥነ-ህዝብ መረጃን ለመሰብሰብ የሚያግዙ ጥያቄዎች።

ይህ ክፍል መረጃዉን በሚሰበስበዉ ባለሞያ ቢሞላ ይመረጣል

የጤና ተቋሙ ስም----------

መካከለኛ ክሊኒኩ የተቋቋመበት በኢትዮ. ቀን አቆጣጠርሪ በዓመት ----------

ክፍለ ከተማ ----------ወረዳ----------

መረጃዉ የተሰበሰበበት ቀን----------

ተ.ቁ.	ጥያቄዎች እና ማጣሪያዎች	ምላሾች	ዝለል
101	የተሳታፊዉ እድሜ በአመት		
102	የተሳታፊዉ ጸታ	**0.** ሴት **1.** ወንድ	
103	የትዳር ሁኔታ	**5.** ያገባ **6.** ያላገባ **7.** የፈታ/ች **8.** የሞተበት	
104	ወራዊ ደሞዝ በብር		
105	በክሊኒኩ ውስጥ አሁን የሚያገለግሉበት ቦታ	**1.** የክሊኒኩ ባለፍቃድ **2.** የክሊኒኩ ባለሃብት **3.** የክሊኒኩ ስራ አስኪያጅ	

		4. የአዋቂዎች ተመላላሽ ህክምና/የድንገተኛ አደጋ ወይም መርፌ ክፍል ኃላፊ **5.** የላብራቶሪ ኃላፊ **6.** የፅዳት ሰራተኛ **7.** ካርድ ክፍል **8.** ሌላ ካለ ይግለጹ	
106	የእርስዎ ብቃት ወይም ሞያ ምንድነው?	1. የሕክምና ዶክተር 2. ጤና መኮንን 3. ዲግሪ ነርስ 4. ዲፕሎማ ነርስ 5. ላቦራቶሪ ክኒሽያን 6. የጤና ሞያ ያልሆነ 7. ሌላ ካለ(ይግለጹ)	
107	የእርስዎ ከፍተኛ የትምህርት ደረጃ ምንድነው?	1.የሁለተኛ ዲግሪ 2.የጤና ዶክትሬት/የመጀመሪያ ዲግሪ 3.ዲፕሎማ/ደረጃ አራት 4.12ኛ ክፍል ያጠናቀቀ 5.10ኛ ክፍል ያጠናቀቀ 6.ከ10ኛ ክፍል በታች 7.ሌላ ካለ ይግለጹ	
108	በክሊኒኩ አሁን ባሉበት የሥራ ሃላፊነት ያለዎት የሥራ ልምድ በዓመት		

109	አጠቃላይ ያለዎት የሥራ ልምድ በዓመት		

ክፍል **2.** የጤና ባለሙያዎች በኢትዮጵያ መካከለኛ ክሊኒክ መመሪያ ዙሪያ ስላላቸዉ ግንዛቤ ለማሰባሰብ የተዘጋጁ ጥያቄዎች ።

ተ.ቁ.	ጥያቄዎች	አዎ	አይ	ማብራሪያ
201	የኢትዮጵያ መካከለኛ ክሊኒክ ስታነዳርድን ሰምተዉ ያዉቃሉ? መልስዎ አይ ከሆነ ቀጣዩን ጥያቄ ይዝለሉ			
202	ለጥያቄ ቁጥር 201 መልስዎ አዎ ከሆነ በየትኛው የግንኙነት ዘዴ በኩል ነው 1. በስልጠና 2. በተለያዩ ስብሰባዎች 3. የተለያዩ ቁሳቁሶችን በማንበብ 4. በሚለጠፉ ቁሳቁሶች 5. በመገናኛ ብዙሃን 6. በባለሞያዎች ማኅበር ስብሰባዎች			
203	የኢትዮጵያ መካከለኛ ክሊኒክ ስታንዳርድ አንብበዉ ያዉቃሉ?			
204	በኢትዮጵያ መካከለኛ ክሊኒክ ስታንዳርድ ላይ ስልጠና ወስደዉ ያዉቃሉ?			
205	በኢትዮጵያ መካከለኛ ክሊኒክ ስታንዳርድ ላይ የሥራ ላይ ስልጠና ወስደዉ ያዉቃሉ?			
206	በኢትዮጵያ መካከለኛ ክሊኒክ ስታንዳርድ ላይ ለሌሎች ሰራተኞች ግንዛቤ መስጠት ላይ ተሳትፈዋል?			

ክፍል **3.** ጤና ባለሙያዎች የኢትዮጵያ መካከለኛ ክሊኒክ ስታንዳርድ አተገባበርን ለማወቅ የተዘጋጁ ጥያቄዎች ።

ጥያቄዎች	አዎ	አይ	ዝለል	የሚመለከተዉ ሰው	ማብራሪያ
301. በምግብና መድሃኒት ቁጥጥር መስሪያቤት ተመዝግበዋል?				የጤና ሰራተኞች	
302. በክሊኒኩ ውስጥ በወቅቱ በስራ ቦታዎ ላይ ነበሩ?				የጤና ሰራተኞች	
303. ማንኛውንም ዓይነት ፕሮሲጀሮችን እና ህክምናዎችን ከማካሄድዎ በፊት ፈቃደኛ እንዲሆኑ ለደንበኛው ወይም ለደንበኛው የቅርብ ዘመድ አሳውቀዋልን?				የጤና ባለሙያዎች	
304. ለደንበኛው ህክምና ከመስጠትዎ በፊት በክሊኒኩ ውስጥ ስሞንና እና ተግባሮትን ወይም ኃላፊነትዎን ያስተዋውቃሉ?				ጤና ባለሞያዎች	
305. የታካሚውን መዝገብ ወይም መረጃ ከሚመለከታቸዉ የክሊኒኩ ባለሞያዎች ውጭ ማንም በማይደርስበት መንገድ በምስጢር አስቀምጠዋል?				የካርድ ክፍል ባለሞያ	

306. ተቀጥረዉ ወደ ክሊኒኩ ከመግባትዎ በፊት እና ከዚያ በኋላ በየአምስት (5) ዓመቱ አንድ ጊዜ የጤና ምርመራ ይደረግሎታል?				የጤና ሠራተኞች	
307. የሁሉም ሰራተኞች የህክምና ምርመራ ዉጤቶችን በተገቢው ቦታ በማስቀመጥና ተቆጣጣሪ አካል በሚፈልግበት ወቅት በማሳየት የተባበራሉ?				የክሊኒኩ ፈቃድ አዉጭ / ባለቤት / ሥራ አስኪያጅ	
308. ለእያንዳንዱ የአገልግሎት ክፍል የሚያስፈልጉትን የሰራተኞች ብዛት እና አይነት የየዓመቱ እቅድ አለዎት?				የክሊኒኩ ፈቃድ አዉጭ / ባለቤት / ሥራ አስኪያጅ	
309. የጥራት ቁጥጥር ማረጋገጫ / የአፈፃፀም ማሻሻያ ፕሮግራም ላይ ተሳትፈዋል?				የጤና ሰራተኞች	
310. ስራዎችን እና አስተዳደራዊ ግዴታዎችን ለመገምገም መደበኛ የሰራተኞች ስብሰባ አለዎት?				የጤና ሰራተኞች	
311. ሁል ጊዜ በስራ ላይ ሲሆኑ ደህንነቱን የጠበቀ፣ ንፁህ እና ድምጽ የሌለዉን ጫማ ይጠቀማሉ?				የጤና ሰራተኞች	

312. ፀጉርዎን በስራ ላይ በሻሽ ወይም በጨርቅ ይሸፍናሉ? (ለሴቶች)				የጤና ሰራተኞች	
313. በቀላሉ የሚታዩ ስም እና የሙያ ደረጃዎትን የሚገልጽ ባጅ በስራ ላይ እያሉ በማንኛውም ጊዜ ያድርጋሉ;				የጤና ሰራተኞች	
314. በተመላላሽ ህሙማን ደረጃ የሚከናወኑ ጥቃቅን ለቀዶ ጥገና አሰራሮች ፕሮቶኮል አለዎት?				የአዋቂዎች ተመላላሽ ህክምና/ድንገተኛ/መርፌ ክፍል ሃላፊ	
315. ለእያንዳንዱ ህመምተኛ ከህመምተኛው የህክምና መዝገብ ጋር የተቀናጀ የቀዶ ሕክምና አሰራሮችን ይመዘግባሉ?				የአዋቂዎች ተመላላሽ ህክምና/ድንገተኛ/መርፌ ክፍል ሃላፊ	
316. ለሁሉም ህመምተኞች ከቀላል ቀዶ ጥገና በፊት የተሰጡ ህክምናዎችን በታካሚዉ መዝገብ ላይ ይመዘግባሉ?				የአዋቂዎች ተመላላሽ ህክምና/ድንገተኛ/መርፌ ክፍል ሃላፊ	
317. በሚሠሩበት አካባቢ የአስተዳደር ፕሮቶኮሎች ቅጅ አለዎት?				የጤና ባለሙያዎች	
318. በሚሰሩበት ክፍል ዉስጥ ስለ ማደንዘዣ አሰጣጥ የጽሑፍ ፖሊሲ አለዎት?				የጤና ባለሙያዎች	
319. በመድሃኒት አስተዳደር ያልተመዘገቡ ፣ ድንገተኛ ያልሆኑ መድኃኒቶች እና ያልተለገሱ የድንገተኛ መድኃኒቶችን ይይዛሉ?				የጤና ባለሙያዎች	
320. የመድኃኒቶችን ምንጭ ፣ የግዢ ቀን እና ሌሎች ተዛማጅ መረጃዎችን የሚያሳይ ሰነድ ይዘዋል?				የጤና ባለሙያዎች	

321.በእንግዳ መቀበያ ክፍል ዉስጥ የመማሪያ እና የመዝናኛ ቁሳቁሶችን አሉዎት?				የጤና ባለሙያዎች	
322.የሥራዎችዎን ሚና እና ግዴታዎችን በዝርዝር የሚገልጹ የሥራ መግለጫዎች አለዎት?				የጤና ባለሙያዎች	
323.በክፍልዎ ውስጥ ያሉት መሳሪያዎች በጥሩ የሥራ ቅደም ተከተል ፣ በመደበኛ ጥራት ቁጥጥር እና በመለኪያ ረገድ ትክክለኛ ናቸው?				የላቦራቶሪ ባለሙያዎች	
324.የተፃፉ ፖሊሲዎችና አሰራሮችን ቢያንስ የአሰራር መመሪያዎች (SOP) ወይም ለሁሉም የላቦራቶሪ ምርመራዎች የአሰራር መመሪያ አለዎት?				የላቦራቶሪ ባለሙያዎች	
325.ለሁሉም የላቦራቶሪ ውጤቶች የጊዜ ሰሌዳ: የጥራት ማረጋገጫ እና ቁጥጥር ሂደቶች የሪፖርት ጊዜ አለዎት?				የላቦራቶሪ ባለሙያዎች	
326.ለሁሉም የላቦራቶሪ ሙከራዎች መደበኛ ዉጤቶችን ለጥፈዋል;				የላቦራቶሪ ባለሙያዎች	
327.የጥራት ቁጥጥር መረጃን በሰነድ፤ የመለኪያ ሪፖርት ፣ የውስጥ እና የውጭ ጥራት ቁጥጥር እና የማቀዝቀዣ ንባቦችን አስቀምጠዋል?				የላቦራቶሪ ባለሙያዎች	
328.የሕክምና መዝገብን ለተፈቀደላቸው ሰዎች ብቻ ወይም በሕግ ለተፈቀደው ሰዉ ካልሆነ ማንም በማያነሳበት ቦታ በሚስጥር ያስቀምጣሉ?				የካርድ ክፍል ሰራተኞች	
329.በታካሚው የህክምና መዝገብ ውስጥ በማይለቅ ቀለም የህመምተኛን ሙሉ				የካርድ ክፍል ሰራተኞች	

መረጃ ፣ ቀን እና ፊርማ ይሞላሉ?					
330. በሥራ ክፍልዎ የሕሙማን መመዝገቢያ መዝገብ እና መደርደሪያዎች አለዎት?				የካርድ ክፍል ሰራተኞች	
331. የጤና ማስተማሪያ ሥራዎችን ይሰጣሉ;				የጤና ባለሞያዎች	
332. በተቋሙ ውስጥ የጤና ማስተማሪያ እንቅስቃሴዎችን እቅድ / የጊዜ ሰሌዳ አለዎት?				የጤና ባለሞያዎች	
333. ሁል ጊዜ በስራ ላይንጹህ እና ነጭ ጋዎን ይለብሳሉ?				የጤና ባለሞያዎች	
334. የመካከለኛ ክሊኒኩን ቆሻሻዎችን መሰብሰብ ፣ ማጓጓዝ እና ማስወገድን ይቆጣጠራሉ?				የጤና ባለሞያዎች	
335. ለታካሚዎች ፣ ለሰራተኞች እና ለጎብኝዎች ምቹ አካባቢን ይፈጥራሉ?				የጤና ሰራተኞች	
336. የከርሰ ምድር ዉሃ እና ታንከርን፣ መደበኛ ክሎሪን እና ጽዳቱን ለመከታተል ኃላፊነት የሚወስዱት ሰው ነዎት?				ጽዳቶች	
337. በመካከለኛ ክሊኒኩ ዉስጥ የኢንፌክሽን መከላከል መስፈርት መሠረት የኢንፌክሽን መቆጣጠሪያ እርምጃዎችን ይጠቀማሉ?				የጤና ሰራተኞች	
338. የስራ ቦታዎ ከነፍሳት ወረርሽኞች ነፃ ነውን?				የጤና ሰራተኞች	
339. ለጽዳት እቃዎች ማከማቻ የሚሆን እራሱን የቻለ ክፍል አልዎት?				ጽዳቶች	
340. ሁሉንም የጽዳት እቃዎች አያያዝ እና የጥገና ሥራዎችን እቅድ ፣ አደረጃጀት ፣ ማስተባባር እና ቁጥጥር ላይ ተሳትፎ አለዎት?				ጽዳቶች	

341. አደጋን ለመቀነስ የሚረዱ የጋራተግባራትን ያከናውናሉ?				የጤና ሰራተኞች	
342. ጓንት ካስወገዱ በኋላ እና በታካሚ ግንኙነቶች መካከል ወይም የተበከሉትን ነገሮች ከነኩ በኋላ ወዲያውኑ የንፅህና አጠባበቅ ስራን ያካሂዳሉ?				የጤና ሰራተኞች	
343. እንደ ጓንት ፣ ጭምብል ፣ የአይን መከላከያ (መነፅሮች) እና የፊት መከላከያ ያሉ የግል መከላከያ መሣሪያዎች አሉዎት?				የጤና ሰራተኞች	
344. በኢንፌክሽን መከላከያ ኮሚቴ ውስጥ ተመድበዋል? መልስዎ አዎ ከሆነ የጽሑፍ ፕሮቶኮሎችንና አሠራሮችን ማሳየት ይችላሉ?				የጤና ሰራተኞች	
345. በኢንፌክሽን መከላከልና ቁጥጥር አሰራር ላይ መደበኛ ሥልጠና አለዎት?				የጤና ሰራተኞች	
346. በመካከለኛ ክሊኒኩ በሁሉም አካባቢዎች የንፅህና አጠባበቅ ቴክኒክ መመሪያዎችን አጠቃቀም አላችሁን?				የጤና ሰራተኞች	
347. በቆሻሻ መጣያ የሚጣሉ ኮንቴይነሮች ውስጥ የተያዙ ተላላፊ እና ተላላፊ ያልሆኑ የህክምና ቆሻሻዎችን ለያይተው እስከሚወገዱ ድረስ ለጊዜው ተለይተዉ እንዲቀመጡ ተደርገዋል?				የጤና ሰራተኞች	
348. በመካከለኛ ክሊኒክ ውስጥ የተለያዩ ቆሻሻዎችን ለመለየት እና ለማስወገድ የሚያገለግሉ ሶስት የቆሻሻ መጣያ እቃዎችን ይጠቀማሉ?				የጤና ሰራተኞች	
349. የህክምና ቆሻሻ አያያዝ እቅድ አለዎት?				የጤና ሰራተኞች	

350.እራስን ለመከላከል በሚረዱት ላይ የግንዛቤ ማስጨበጫ አግኝተዋል?				የጤና ሰራተኞች	

የመረጃ አሰባሳቢ ስም ---------- ፊርማ----------

የተቆጣጣሪ ስም ---------- ፊርማ----------

Annex IV: principal investigators curriculum vitae

1. Personal Background

Full name: Ashebir Gudina Wakjira
Sex: Male
Date of birth: 17 June 1986
Place of birth: Oromia Regional State, East Wollega zone, Nekemte town
Nationality: Ethiopian
Marital Status: Married
Email: ashebirgudina11@gmail.com
Cell phone: +251911959558
Address: Sub city- Nefas silk lafto, woreda -01, H/No-B33/26

2. Educational Background

2019-upto now a ttending MPH program with specialty of Health system management at Addis Ababa university.
2009-2012 G.C BSC degree in public health professional from Wollega University
2005-2008 G.C Secondary education from grade 9-12, at Nekmte Derge secondery and high School
2003-2004 G.C From grade 7-8, at Nekmte Meskerem 2 medium secondery School
1996-2002 G.C primary education, at Nekemte Bakejema Primary School

3. Educational Qualification

BSC degree in public health professional from Wollega University in 2012 G.C

4. Professional Registration

Registered as Senior public Health Professional

5. Work Experience

Year	Organization	Position
October 08, 2013 to December 30 2015	Oromia regional state,Oromia special Zone Akaki District Aba Samuel Health Center	Medical director
January 01, 2015 to June 14, 2015	Addis Ababa City Administration,Addis ketema Woreda 03 FMHACA Office	Health facility and professionals licensing and control Office
June 15, 2015 to Augest 2019	Addis Ababa City Administration, Lideta Sub City FMHACA	Health facility licensing and control officer

6. language Skill

Language	Speaking	Writing	Listening	Reading
Afan Oromo	Excellent	Excellent	Excellent	Excellent
Amharic	Excellent	Excellent	Excellent	Excellent
English	v.good	Excellent	Excellent	Excellent

7. Additional Skills

Computer program Skill, MS-Word, MS-Excel, MS-power point, SPSS software application, Epi-Info software application.