

## Adoption of Information and Communication Technology in Public Administration in Oromia Region: The Case of Bereh and Sendafa Woredas

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### ABSTRACT

Information Communication Technology (ICT) has become a significant tool to facilitate human activity that has made contributing to the countries' on economy and social welfare. Thus, the Ethiopian government placed ICT policy to develop, deploy and use information and communication technology to improve the livelihood of every Ethiopian, and optimize its contribution to the development of the country. The objective of this study was therefore, to determine the challenges and factors that drives of ICT in adoption in Oromia especial zone surround Addis Ababa with specific reference to Bereh and Sendafa Woredas public administrations. To achieve objective a qualitative and quantitative approaches were conducted with a survey that focused on ICT uses, its challenges and contextual factor that drive ICT in the public administrations. The data from both sources were combined and analyzed to get a view of the current situation analyzed, described and explained by using descriptive statistics such as frequencies, percentages, sum and exploratory factor analysis (EFA) for grouping purpose and The result were presented using tables and bar graph, pie chart and percentages. The findings show that the public administrations are mainly hindered by a group of challenges related to strategy design on ICT tools challenges for instances infrastructural, standard Internet connectivity design issues.

**Keywords:** Public administrations, Adoption , Factors , Challenges

### INTRODUCTION

In the countries those ruled by the federalism system Public organizations have administrative subdivision of power ranked as federal, region, zone, woreda and Kebeles for the aim to increasing good governance to provide the sustainable development of within their countries, The main problem which were being challenges of many organizations are to diversify their occupational risk and , inadequate to make short term planning and decision as well as lack of sufficient information for their strategies planning, so that they obliges to make short-term decisions through using adopting Information and communication technology (ICT) in their work area (Ntwoku-Tchuinkep Habit , 2010).

According to Lorange (2002), 20<sup>th</sup> century mankind made transform from agricultural and industrial age to knowledge and information societies based age and make the entity of governances wandering to ideas, design and ICT based management . This shift is making a game changer for the countries managements,

This rapid growth of the field of ICT continuously changed the general face of the world. It is the major factor which enters every movement of the world life and the organization(s) who did not accept this innovation difficult to go throughout the world (Soumitra, 2015). This is mainly due to ICT has unique features that change the way of doing, open new possibilities for setting up a performances, or just enhance increases in human and social capital. At the same (Eli, 2014).

As Seada (2015) explained, ICT is not solution or it was not creating a change by itself however it enhances the change and new production that can address every problem of a society and organizations, So, most development experts accept that ICT can assist as tools of facilitator of transformation in developing nation. Furthermore, according to Mengistu (2016) ICT used to reduce the operational cost, efficiency of professional processes, ease of structuring quality of citizens service, productivity of employee's motivation and development of staff, and getting the inexpensive advantage.

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Moreover, ICT is used for making stronger the development of generating new method of exchanging information with decreasing expenses of gathering ideas (Olugbenga, 2001).

Information and communications technology is among the policy of a government which plays its role in the implementation of other policies, In Ethiopia, information and communication technology is on the developing situation. In addition, ICT is considered as skill and information used as device of growth as well as manufacturing. Furthermore, successful implementation of ICT helps another program to achieve their intended goals specially the implementation of good governance (Debretsion, 2012).

To do things better the government of Ethiopia has recognized the power of ICT in national development plan. For this achievement the governments were ratification national ICT policy, new intuitional setup and organizational structure at regional and federal level by allocating resource for ICT development objective of updated improvement, to provide accurate information on governmental services (MICT, 2009).

Besides of country ICT polices oromia regional state, accept information and communication technology has been identified as one of the columns that would help public administrations to achieve its scheduled development goal. The main goal of the acceptance to increase the rural connectivity and center of information to provide significant information to local community. ICT encourages in any sector such as in administration, education and health. In addition, development of human resource through training and research is another focus of regional state ICT police (Taffesse, 2012).

Also inline of regional state ICT Development Agency, there is ICT program at Bereh and Sendafa public administrations which is implemented under civil service and good governance office objectively to make easy the learning situation and sharing of good practices, reduce cost and save time of productivity. Furthermore, this program enhances productivity and market opportunity. Moreover, ICT department at Woreda level provide computer training, internet service, and different technological services to the Woredaoffices and community (OICTDA, 2011). Without considering the

success of the ICT program, in public administrations still there were problems to implementations of ICT because, it is weak when evaluated with its intended objectives and goals.

Reports of the oromia ICT development agency show that, the woredas are far from the plan and there is a long way to achieve the target. There is ineffective quality and less efficient services provided by the region (OICTDA, 2011).So Therefore, the purpose of this study was to assess critically the problems which hinder the implementation of ICT and the factors that drive ICT program in the two public administrations the case of Sendafa town and Berehworeda public administrations.

As Maria and Tiago (2011) explained, ICT is universally regarded as an essential tool in enhancing the good governances and economies for both developed and developing countries of a World. These effects will only be realized if, and when, ICT are widely spread and used accurately accepted by the end user in their work place.

Thus, this Author article aims at answering the following research questions:

1. What are the challenges of ICT adoption in Bereh and SendafaWoreda Administrations?
2. What are the employees opinion regarding, factors that drive ICT in Bereh and SendafaWoredas?
3. What are the influences or impact of ICTadoption in Bereh and Sendafaworedas?

The overall general objective of the study is to identify the ICT adoption challenges and contextual factors that drive Information and communication technology in Bereh and SendafaWoredas public administration and suggest possible solution to address their challenges.. Therefore, regarding to the significance of the study, inter and intra connectivity of the Wored cannot be discussed in separation from the government ICT policy and strategy. This is because, ICT in provide all local, national and international connectivity including telephone and Mobile Network, Internet, Video-Conferencing, Electronics mailing services among others.As Seada(2015) explained in his paper many instances, such as strategy design on ICT lack skill to use computer technology and poor ICT resources

and manager support are among the critical challenging factors that impede local connectivity and quality service provision (Gebre, 2014). The study provided the lowest level of Woredas with accurate and timely knowledge and information, to bridge the digital divide between the public organizations.

## **REVIEW OF THEORETICAL AND CONCEPTUAL LITERATURE**

### **Public Administrations**

AS Mbah (2007) puts it, public administration sector consists of establishments of Federal, State and local Government agencies that administer, oversee, and manage public programs and have executive, legislative or judicial authority within a given area. According to Surbhin (2016) explain the unique natures of public administrations as noted as, public agencies have more formalized personnel procedures purchases processes and others administrates task that are regulated by central administrative agencies there is typically more external oversight of public agencies for personnel and purchasing decisions.

Many scholars assumed that the new media would reduce existing barriers to democratic participation and that internet would facilitate an era in which democratic debate would be able to develop quickly and be successful or common, ICT implementation in the public organization deal with the use of computers and computers software to security convert, store, protect and toward the operational and strategic activity of public organizations (Laudon & Laudon, 2012). Public administrations and ICT deal with the use of ICT to shape the organizational changes and influenced every function of the public administrations with the organizational changes.

According United State public Administrations Network and public administration knowledge space (n.d) explain, public administration Using ICT for, the To transform public administration organizations to be effective, efficient, transparent, accountable, innovative, and citizen-oriented in pursuit of development and delivery of public services as well as to formulate strategies for strengthening organizational capacities for engaging citizens in governance, public administration and development management for responsive transparent, and accountable delivery of services.

### **Adoption**

ICT and use of the ICT in individual, government, business and financial organizations in the entire world have changed the face, but, in the developing countries, poor economies, lack of education and infrastructure were among the challenges that contribute to the slowdown the adoption of technology by studying the number of reports and studies that are easily found in the internet (Huda, et al, n.d)

According to Tosan (2008), the adoption process, is a decision-making process which is go through a number of mental stages before making a final decision to adopt a new trend, As Mohd et al (2012) explained, ICT adoption increase the management effectiveness, improve the service, monitoring the process of communication with the workgroup internally and externally for their administration purpose. Manage the flow of the information and make as the organizations would be better to understanding about their organizations requirement. The adoption of ICT is a crucial decision for growth, production, and building good governances, so that organizations who adopt IT innovations have to sustainable their economic position as well as to create organizations advantages (Arpaci et al, 2012).

### **Technology Acceptance Theory**

Technology acceptance theory was introduced by Davis (1989), is an adaptation of the theory of reasoned action specifically custom-made for modeling user acceptance of information systems. The goal of the theory is to provide a description of the elements of computer acceptance that is general, capable of clarifying user activities across a broad range of enduser computing technologies and user populations, while at the same time being both ungenerous and theoretically justified.

As Seada (2015) explain in his paper technology acceptance model is also a theory which describes and intended to explain the behavior in ICT usage. This model describes the reason of the implementers to implement successfully and to reject the use of ICT. The technology acceptance model perceived, ease use of and usefulness as two reasons which hinder the implementation of information and communication technology. These reasons show the willingness of the implementers in using the ICT program. In technology acceptance model,

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usefulness describes the attitude of implementers to accept and use ICT. On the other hand, ease of use describes, the attitude of implementers to use ICT (Eija, 2011). Generally, willingness is important issue for successful implementation of ICT.

### Contingency Theory

Contingency theory suggests that an effective organization should have a structure which is responsible with its environmental needs. The effectiveness of an organization is based upon its suitability towards both internal and external factors such as environment, organization size, organization strategy and technological factors to make a decision. According to Donaldson (2001) explain in his author paper fundamental idea behind contingency theory is that organizational feasibility is dependent on an appropriate fitness between the organization and its environment. An organization is considered an unclosed system, which stresses the complexity and inconsistency of the individual parts, individual participants and subgroups as well as the shapelessness of connections among them. In order for the organization to be feasible, it must be able to visualize and incorporate the contingencies of its environment into its premises

### Method

Based on the specific objective of the research, the study used cross-sectional design, because, the cause and effect of the study are made at the same time. The Article was conducted both quantitative and qualitative method to collect data from the entire populations who work in both woredas using randomly selected study sectors and working with ICT and related subject areas for at least six months prior to data collection had been considered as target population. Qualitative approach helps bring out the feelings and norm of the respondents while quantitative research involves the

measurement of quantifiable values and also helps to generate statistical information. The collection of both quantitative and qualitative data neutralized the weaknesses of each form of data. and pertinent data was collected both from primary and secondary data sources.

The Author used survey as an appropriate and the sampling technique can be made confident, the results that would be generalized the population. If to do so the sample size has also to be sufficient for the purpose of the analysis for intend perform. The following formula had been used to determine the sample size of the study (Mugenda & Mugenda, 2008).

$$n = \frac{N}{1 + N(e)^2}$$

n - Is the sample size of the study unit

N- Is the study population

e- Is the level of precision (10%)

When applied this formula as above, a sample size of 86 selected from 593 population was used from the Woreda public administrations and 80 sample sizes was selected from 399 population public administration.

### Validity and Reliability

To check validity procedure of data collection and analysis direct contact was made with the respondents in connection with the measurement of the scale (personal interviews). Also the author was conducted pilot study on another similar two Woredas, both areas public administration offices; for to do so thirty (30) respondents were taken out from the two organizations. Similarly Cronbach's Alpha can be interpreted as like a correlation coefficient. Therefore, the reliability test accomplished that all the items of the pilot questionnaire has been reliable since the scores of the test was higher than 0.7 as in the table below.

**Table 1.** Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
0.932	0.924	17

Source: Computation based on data from author's field work, 2017

## RESULTS AND ANALYSIS

### The Implementation of ICT in Bereh and Sendafa Woredas of Oromia Special Zone

As Seada (2015) explained in his paper, Gebre (2014), affirmed by, the Woreda in Ethiopia

is an administrative subdivision with an average population of one hundred thousands. The Ethiopian district level decentralization gives more power to the Woredas to administer the local community and the name Woreda-Net is derived from the

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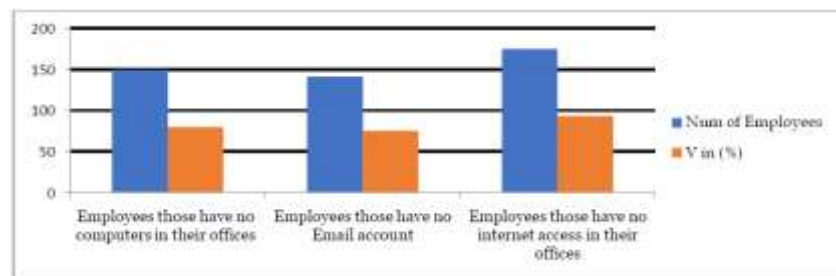
Woreda. The Woreda-Net in Ethiopia is a global and satellite based network which intentionally intended to supply the ICT services like Video-Conferencing, Message-Exchanging, Internet Connectivity and other service with the Woredas, Regions and Federal level government bodies.

Installation of ICT in the public administrations is one of the services provided to Woreda sectors by ICT department. In rural Woreda, installation of ICT requires software data in external devices. Therefore, hardware platform

was required to install software, Networking platforms is require to link the computers and Data management and storage require to hold employees data and kept from danger . ICT professional is another important person who plays a vital role for the adequacy of installation of software and hardware.

### Access to Computer System

The respondents' access to the ICT facilities was measured in terms of their access to computer system in their work place for administrative purpose.



Source: From field survey work .April 2017

Figure1. Access computer system of respondents

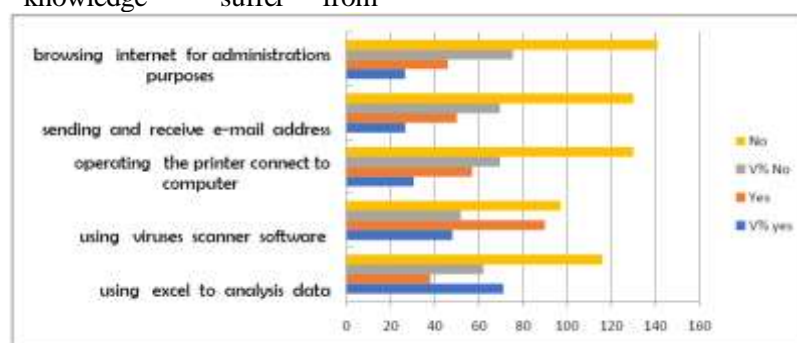
As indicated in figure 1,175(93.4%) of the respondents stated that, the installation of internet access was not adequate. Similarly 149 (79.9%) respondents responded that no uses computers in offices, Moreover, interviewed made with experts stated that,the problem is lack of ICT infrastructures in the Woreda. However, the ICT professionals justified that, installation and implementation of ICT is better than other services but Woreda offices have no strategies to buy ICT infrastructures. Thus, in general the service provided by installation of ICT infrastructure was not successful as expected in Bereh and Sendafa Woredas.

### Computer Skill and Knowledge of the Employees

As Minishi, et al (2005) explains that, organizations without prior technological experience or knowledge suffer from

uncertainties caused by the possible introduction of new innovation in the organization. Capacity development of the countries achieved through the sharing of information, knowledge, innovations and best practices in public administration among countries, predominant through knowledge networking (United Statepublic Administrations Network and public administration knowledge space, n.d).

According Laudon&Laudon(2012) management of information system deals with behavioral issues as well as technical issues surrounding the development, use, and impact of information systems used by managers and employees in the organizations. After measuring the respondents' basic computer skill, the last data summarization was creating a comparison between staffs that use more and not use of ICT facilities



Source: From field work of survey, April 2017

Figure2. ICT Skill of respondents

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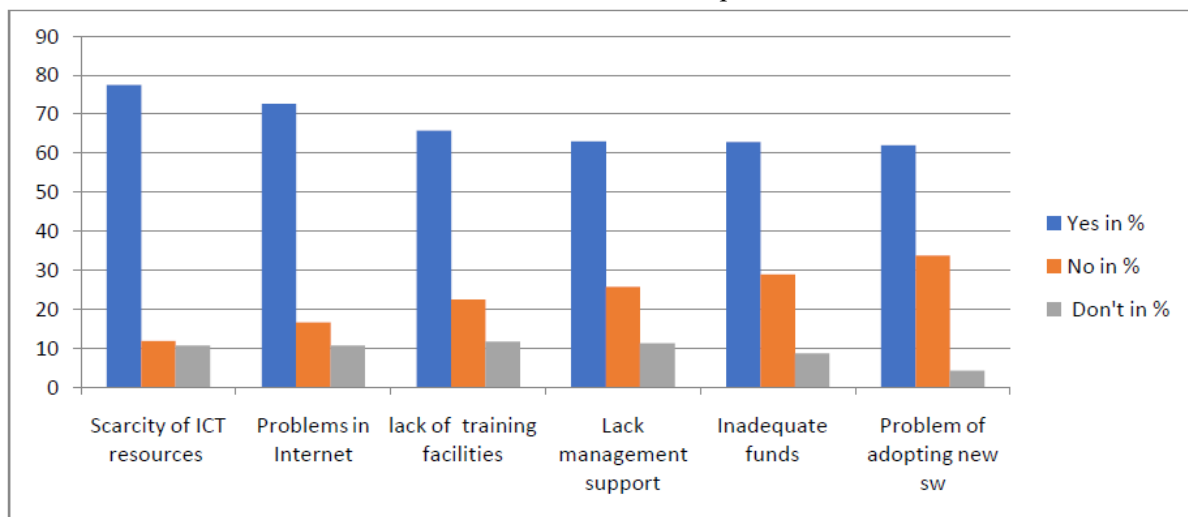
As shown in figure 2, above, majority of the respondents, The computer skills of the respondents are presented in (table 4.2) below. From entire valid percentages, the highest percentage of the respondents means 130(69.5%) respondents had no skills are occupied in operate the printer connect to computer, 97(51.9%) respondents didnot use viruses scanner software, 141(75.5%) participants did not browse internet for administrations purposes, 137(73.3%), respondents did not sending and receive e-mail address. Similarly, 116(62.0%) participants cannot uses excel to analysis data. Similarly the interviewees were also justified that, officials at Woredalevel do not have basic computer skill and know how to implementation ICT program. In addition, experts confirmed that, the woredaCivil Service and Good Governance officials gives training to facilitate the implementation of ICT in the Woredas. Thus, the situation in Bereh and SendafaWoreda contradicts with the supposition that emphasizes the Bereh and Sendafaworedas for successful program implementation. Hence, Sendafa and Bereh Wored alacks strategy designin ICT implementation program and little

attention is given to the ICT program implemenetation.'

### Challenges of ICT Adoption

ICT and use of the ICT in individual, government,business and financial organizations in the entire world have changed the face, but, in the developing countries, poor economies, lack of education and infrastructure were among the challenges that contribute to the slowdown the adoption of technology by studying the number of reports and studies that are easily found in the internet (Huda, et al, n.d).similarly the studied done on the technology adoption of Ethiopian manufacturing firms, textile and leather sector found that adopt and implement new technology, resistant to change, lack of budget, lack of skilled worker and lack of technical supporting services are very influential challenges in order of priorities(Kumlachew, 2015).

Most challenges were identified by more than half (60%) of respondents summarized by bar graphic were presented as follows comparing with the respondents who said yes by relating with respondents who said no and don't know



Source: From Field survey work, April 2017

Figure3. Comparison of challenges of ICT Adoption

Figure 3, above summarizes that, the agreement of respondents on the effective integration of organizations in supporting the implementation of ICT program in public administrations. This means that, public sectors in Sendafa and Berehworedaswere not integrated to reduce any unexpected and expected challenges that hindered the implementation of ICT program implementation in their work place. Furthermore, interviewed experts also stated

that, most of the sectors in Woredas came to the ICT department to get different services if the condition is suitablebut no sector is care about the challenge of the department and no sectors support the department as well as no strategies design on the implementation of ICT program.

The above most challenges and others related challenges identified by the respondents are summarized in four main group . To find the group of factors the author uses exploratory

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factor analysis (EFA) that can be used to find meaningful patterns within a large amount of data. So according to the result obtain through the EFA organizational challenges such as lack of government encouragement of the organizations, inadequate funds in the organizations, lack of management support, there is lack of training facilities and Problem in strategies development in the organizations. Comparably there are some challenges run from environments likewise lack of vendor, lack of confidence in using computers of employees, lack of citizen encouragement, lack of awareness to change management. The same as there are some challenges jump from

technological like ICT device and applications are too expensive, fear of employees on personal values, new version of existing software and lack of localization- languages user interface also there are some challenges outing from organizational strategies developments on providing the new ICT infrastructure and establishing standard ICT connectivity in the organizations. Those clustering was based on the EFA which is generated as follows table for detail when the absolute values were less than 0.45 the report is generated. Similarly the researcher was generated the Cronbach's alpha to see the reliability of the grouped items.

**Table2.** Rotated Factors Matrix <sup>a</sup>

Items	Factors				Cronbach's Alpha
	Organizational challenges	Environmental Challenges	Technological Challenges	ICT tools strategy Challenges	
Lack of government encouragement	0.734				0.784
Inadequate funds in the organizations	0.599				
Lack Management support	0.538				
There is no staff development and Lack of training facilities	0.507				
Problem in strategies development	0.469				
Lack of owner/vendor		0.630			0.743
Lack of confidence in using computers of employees		0.620			
Lack of citizen encouragement		0.536			
Lack of awareness to change management		0.476			
ICT device and applications are too expensive			0.646		0.745
Fear of employees on personal values			0.625		
New version of existing software			0.546		
Lack of localization- languages user interface			0.531		0.767
Problems in internet connectivity				0.759	
Scarcity of ICT resources and infrastructure in the sectors				0.723	

According to their correlations the result rotational factors matrix were summarized in (Table 4.4) would grouped in table form and their average weight were calculated to know which group of challenges where more prominent to hinder the adoption of ICT in the organizations.

**Table3.** Organizational challenges of ICT adoption

ICT challenges	Yes	No	Don't know
Lack of government encouragement	52.9%	36.4%	10.7%
Inadequate funds in the organizations	62.9%	28.9%	8.6%
Lack Management support	63.0%	25.6%	11.2%
Lack of training facilities	65.8%	22.5%	11.7%
Problem in strategies development	58.8%	37.4%	3.7%
<b>Averages</b>	<b>60.7%</b>	<b>30.2%</b>	<b>9.2%</b>

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**Table4.** Environmental challenges of ICT adoption

<i>ICT challenges</i>	<i>Yes</i>	<i>No</i>	<i>Don't know</i>
Lack of owner/vendor	54.0%	44.5%	1.6%
Lack of confidence of using computers	42.7%	47.1%	10.2%
Lack of citizen encouragement	61.0%	32.0%	6.4%
Lack of awareness to change management	51.4%	39.0%	9.5%
<b>Averages</b>	<b>52.3%</b>	<b>40.6%</b>	<b>6.9%</b>

**Table5.** Technological challenges of ICT adoption

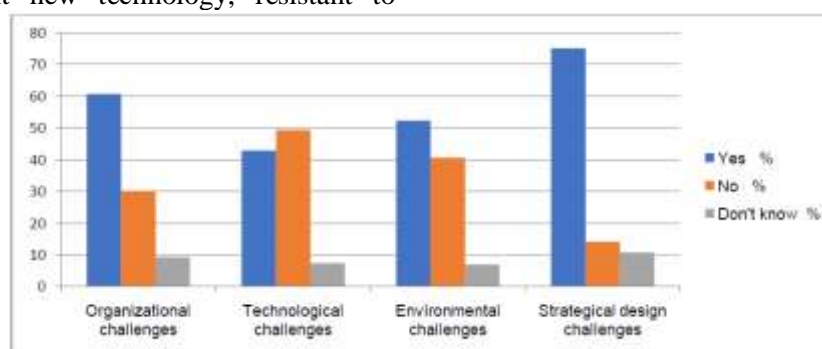
<i>ICT challenges</i>	<i>Yes</i>	<i>No</i>	<i>Don't know</i>
ICT device and applications are too expensive	24.6%	71.1%	4.3%
Fear of employees on personal values	31.9%	58.3%	10.2%
New version of existing software	62.0%	33.7%	4.3%
Lack of localization- languages user interface	52.9%	34.6%	10.7%
<b>Averages</b>	<b>42.8%</b>	<b>49.4%</b>	<b>7.4%</b>

**Table6.** ICT tools development strategy challenges of ICT adoption

<i>ICT challenges</i>	<i>Yes</i>	<i>No</i>	<i>Don't know</i>
Problems in internet connectivity	77.5%	11.8%	10.7%
Scarcity of ICT infrastructure in the sectors	72.7%	16.6%	10.7%
<b>Average</b>	<b>75.1%</b>	<b>14.2%</b>	<b>10.7%</b>

According to Mengistu (2016), found that there were a technological such as timely update of new version technologies and organizational challenges management relating challenges like as lack of management support in the private organizations in his found. This research result is also indicated that technological challenges are the challenges hinder ICT adoptions. Kumlachew(2015) also concluded that to adopt and implement new technology, resistant to

change, lack of budget, lack of skilled worker and lack of technical supporting services are very influential challenges in order of priorities. Other inhibitors include lack of strategic perspective and government support that influence the technology adoption and implementation. The researcher found that there were the most ICT development related strategies design challenges in the organizations.



**Source:** from field survey work, April 2017

**Figure3.** Major challenges of ICT adoption

As shown in figure 3 majority average of respondents agreed on the availability of lack of the ICT strategy design source which was intended for ICT program. Correspondingly, interviewees also stated that, ICT department

has no planning to give short term training. Likewise, experts affirmed that, the. lack effective managerial overseeing to implementation of ICT programs



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### Respondents Opinion on Factors that Drives ICT Adoption

The major objective of the research is finding the force that drive ICT adoption using

different group of factors. In accordance with this, factors with highest frequency (>56%) from each level are summarized as follows

**Table 7.** Factor drives ICT Adoption

Variables	High		Medium		Low		None		Don't know	
	Frequency	%	Frequency	%	frequency	%	Frequency	%	Frequency	%
Manager ICT awareness about ICT	104	55.5	41	21.9	26	13.9	6	3.2	10	5.3
To Improve organizations performances	119	63.9	41	21.9	9	4.8	7	4.3	9	5.3
Government support and initiative	118	63.1	46	24.6	12	6.4	1	0.5	10	5.3
To improved quality service delivery	111	59.4	49	26.2	11	5.9	5	2.7	11	5.9
To link internal and external organizations	111	59.4	44	23.5	14	7.5	5	2.7	13	7.0
organization trends	105	56.1	44	23.5	16	8.6	8	4.3	14	7.5
Manager innovativeness	120	64.2	54	28.9	7	3.7	6	3.2	0	0

Source: Field Survey (2017)

As shown in table 7. majority of respondents agreed on the manager innovativeness, organizations need to Improve organizations performances, government support and initiative are the major factors that drive ICT program in the given organizations. Correspondingly, interviewees also stated that, ICT department

has need to make communications with the others woreda of public administrations. Likewise, experts affirmed that the government must give high attention to the development of ICT program at the woreda level and give the attention to the implementation of it.

**Table 8.** Rotated Factor Matrix<sup>a</sup>

Items	Factors					Cronbach's Alpha
	Strategically factors	Technological factors	Environmenta I Factors	Organization al factors		
Expand organization geography	0.845					0.945
Organization scope	0.835					
Improved quality service delivery	0.802					
Improve organizations performances	0.780					
organization image considerations	0.752					
Centralized managements	0.593					
Top management support	0.535					
link internal and external organizations		0.779				0.888
Launch new information from different direction		0.696				
speed up organization processes		0.627				
manager ICT awareness		0.580				
government support and initiative		0.579				
Organization trends		0.527				
citizen's pressure			0.843			

In addition to the above highest factors result obtain from the respondents point of views opinion the the others factor are identified by the respondents are summarized in four categorization and presented as follows. The

classification based on the exploratory factor analysis (EFA) for the importance of correct classification of the elements which have common characteristics and measure about the same things. When absolute values greater than or

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equal 0.45 generated. The main goal of EFA is to analysis the association among the variables and simplification of items into subset or clusters of concepts measures. Method of classifications did not tell which the group of factors for the researcher only told the items which logically go together.

So that technological, environmental and strategically group of factors were identified

through the exploratory factor analysis as well as the result of the Cronbach's Alpha would generate for all groups but according to the rule not item found under organizational factors.

The last data summarization was created between the major classes of ICT adoption drives forces after calculated the average percentages of each factors that drive ICT adoption.

**Table9.** ICT adoption drives under environmental factors

ICT Drivers	Level		
	High	Medium	Low
Citizens pressure	52.9%	27.3%	8.0%
<b>Averages</b>	<b>57.4%</b>	<b>25.1%</b>	<b>8.0%</b>

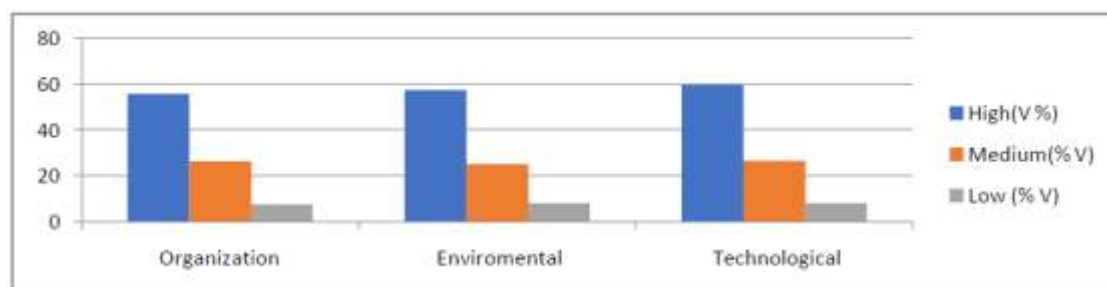
**Table10.** ICT adoption drives under organizations strategies

ICT Drivers	Level		
	High	Medium	Low
Expand organization geography	53.9%	28.9%	7.0%
Organization scope	52.9%	27.8%	10.0%
Improved quality service delivery improve	59.4%	26.2%	5.9%
Improve organizations performances	63.9%	21.9%	4.8%
organization image considerations	61.0%	25.7%	4.8%
Centralized managements	52.9%	27.8%	10.2%
Top management support	46.5%	26.2%	11.2%
<b>Average</b>	<b>55.8%</b>	<b>26.3%</b>	<b>7.7%</b>

**Table11.** ICT adoption drives under technological factors

ICT Drivers	Level		
	High	Medium	Low
link internal and external organizations	59.4%	23.5%	7.5%
Launch new information from different direction	52.4%	28.3%	13.0%
speed up organization processes	63.9%	21.4%	9.1%
manager ICT awareness	64.2%	28.9%	3.7%
government support and initiative	63.1%	24.6%	6.4%
Organization trends	56.1%	32.5%	8.6%
<b>Averages</b>	<b>59.8%</b>	<b>26.5%</b>	<b>8.0%</b>

These the above groups factors are summarized through graphical to provide descriptive information drive of ICT investments among the public administrations. As the result shown that, in (figure 4), the last data summarization was created between the major classes of ICT adoption drives forces after calculated the average percentages of each classes.



**Source:** Computation based on data from author's field work, 2017

**Figure4.** Comparison between drives of ICT adoption

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According to Mengistu(2016) explained in his paper Some sectors technologist encounter certain factors that drives with the accepting and use of ICT technologies. Those factors of ICT adoption are common among public administrations in both the developed and developing countries. ICT contains information about occupational strategies, an organization context, the technology itself and its surrounding environment. The researcher found that there were the technological related factors such as ICT need to link internal and External organization were the factor that drive ICT adotion than the others.

### Major Influences of ICT

**Table13.** Influences of ICT in different administration factors

Variables	Positive influence		Negative influence	
	Frequence	%	Frequence	%
Flexibility and adaptability of product	124	66.1	18	9.6
Motivation of staff to work	119	63.6	26	13.9
Organizational Financial report	120	64.2	26	13.9
Strength the citizens participations	117	62.6	21	11.2
Link internal and external organizations	119	63.9	31	16.6
Strength the employees performances and professional	125	67.2	22	11.8

Therefore, as majority of respondents stated, ICT have positive influence to strength the employyes performance and their professional as well as it help the organization as they more flexible and adabtability of the new product. Similarly, interviewed experts stated that ICT have posive influence to trust to government and strength the citizens participation. According to Meseret (2010) found ICT have positive impact on the most organizations attributes like influence are efficiency of occupational processes, quality of client service, similiary Subramanya (2014) found that problem of manual operation and redesign the positive impact of ICT in public administration in order to reduce ill effects of digital divide by study the population character in echnology literate and illiterate to mplement technology among the organization. Through qualitative and quantitative data gathering method.

### CONCLUSION

In fact that ICT is the transformation agenda of the Ethiopian government, the finding of the study showsvthat, its implementation in Bereh and SendafaWoredaswas not successful and it did not meet the expectation of national Information and communications technology policy of a government which plays its role in

The tendency of taking the influence of ICT as supportive for administrations process in all factors related with the impact of ICT on public administrations, issues ultimately effectiveness was put to test to verify if it holds true. The situation from the actual people who could notice the influence and the changes that are brought since the adoption of ICTs and ICT based services in the Bereh Woreda and Sendafa Town public administrations. According to the data in table 4.9 below the study findings, more than  $\geq 62\%$  respondents said that ICT have positive influences on the public administrations.

the implementation of other policies. Support from regional and federal bodies were not adequate. All the problems mentioned in the discussion together hindered the effective implementation of ICT in the Woredas. The major problems of the ICT program inBereh and SendafaWoreda are scarcity of ICT resources and infrastructures, problems in internet connectivity.

managerial overseen for ICT strategy design an other problem of ICT implementation in the public administration,Besides, inadequate training facilities, poor finance were also another serious problem in the Woredawhich contributed for the ineffectiveness of the program.

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