

Remedial Roles of Framework Agreement for Public Procurement Practices and Challenges in Ethiopia, Biniam Berhie¹

Abstract

Administrative and technical inefficiencies reduce the value creation by centralized public procurement practices. The main aims of the study are to examine the efficiency of Framework Agreement (FWA) procurement practice, to analyze the perception towards the frame and to identify the major challenges of FWA based public procurement in Ethiopia. The study employed a descriptive approach using an exploratory and explanatory design on data collected by survey questionnaire and key informant interview. The result indicated that procurement planning, bid solicitation process, goods receiving and payment and conflict management were significant positive predictors of efficiency of FWA procurement practices. Further, inadequate legal framework, loose coordination, incapable suppliers and market set-up, lack of capable and committed procurement professionals, low quality and quantity, delay on delivery, and loose contract management are the major challenges affecting the efficiency of FWA procurement. Moderate perception towards the frame by the procurement professionals has been identified. In conclusion, FWA procurement is yet to meet the purpose of ensuring value for money. Finally, policymakers and practitioners need to give the required attention to improve the efficiency level of FWA procurement of the country.

Keywords: Framework, Procurement, Practices, Efficiency, Ethiopia

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Introduction

A Framework Agreement (FWA) processed by a central coordination body is established to fulfil the requirement of different public entities of the government through a pre-negotiated procurement contract to reach a framework contract (FWC). The Ethiopian Federal Government Procurement and Property Administration Proclamation No. 649/2009 defined FWC as a general agreement (master contract) by fixing unit price and other terms and conditions (FDRE, 2009). Further, FWA is used as a delivery basis of supplies under a future specific contract. Commonly, a FWC is concluded with one or more suppliers with a master contract articulating all the terms and conditions (Albano, Ballarin, & Sparro, 2010). The Suppliers involved in the FWCs are called Framework Contract Suppliers (FWCS) and they are in a contractual obligation to deliver the terms of FWC (FDRE, 2009). The major justification for FWA procurement is to gain

efficiency and thus a special procedure is followed during the acquisition.

In Ethiopia, the Procurement Proclamation No. 649/2009 (Article 61 – Procedure of FWC) stated that FWC is used to acquire and hire similar good and service requirements of the Public Bodies (PBs) through open tendering for three consecutive years. At a federal level, the procedure is initiated by the Public Procurement and Property Disposal Service (PPDS) a central government body established to execute the task by surveying similar requirements of PBs and issue a list that enumerates goods and services that can be procured in FWC (FDRE, 2010). Principally, PPDS has the purpose of enabling of acquisition of goods and services used commonly by PBs and items of national significance by considering quality, time, and cost that can reflect economies of scale (FDRE,

2010). Then, each PB prepares a forecast of requirements and communicates the PPDS. Following this, PPDS conclude and administer the contract. (MoFED, 2010; PPA, 2011).

Public procurement, as a field of study, has been given less attention by scholars of management sciences; however, this has improved recently. Particularly, public procurement has been linked with issues of economic growth, unemployment, and social inclusion (Arrowsmith, 2010; Gordon Murray, 2009; McCrudden, 2007). Currently, areas like e-procurement, green-procurement, performance-based contracting (PBC), and framework agreement based procurement (FWA) has become the central focus of the field of public procurement (Ambaw & Telgen, 2017; Sorte Junior, 2012). Moreover, public procurement requires an applicable solution for the specialists and future research and practice has to develop together.

Problem statement

The goal of FWA procurement is to ensure value for money in government spending while considering social, political and environmental issues into account (Bawole & Adjei-Bamfo, 2019). However, the process of framework agreement for contract procurement is filled with challenges, because, procurement is easier in theory than practice. FWA is challenged by delay in the delivery, stock-out of goods, delivery of goods and services below the specification, and maverick purchasing behaviour of employees (Karjalainen et al, 2009).

Centralized public procurement has the benefits of reduced cost due to economies of scale, standardization of goods and services, optimization of product and service quality, and creates a knowledge-sharing platform among procurement specialists. Thus, PBs with a small budget and human resources can acquire better quality goods and services

with lower per-unit costs (Albano et al., 2010; PPA, 2011; Sorte Junior, 2012). However, the positive intentions may not generate positive results as PBs try to violate the FWA and act on their organizational interest, even though the actual total cost of ownership is higher.

Effective policy and procedure while conducting public procurement is considered as a key focus on Africa's economic investment frontier (Audu, Chika-James, & Rowlands, 2018). In contrast, Musanzikwa (2013) found out that most of the public procurement practices of developing countries are challenged by incompetent procurement staff with low salary ranges; award of tender without proper market inquires; overrun of time and cost; and rampant corruption activities. Furthermore, public procurement of low-income countries is affected by inappropriate procurement planning that lacks market inquiry and quality data; non-adherence to policies and procedures set by procurement laws and lack of leadership skill to direct and control (Chekol & Tehulu, 2014); poor public transparency and accountability (Okubena, 2016); incompetence of procurement professionals depicted by a misunderstanding of policies and functions of procurement (Musanzikwa, 2013). The Ethiopian public procurement practice in general and FWA is particular are facing these difficulties (Chekol & Tehulu, 2014; Tesfahun, 2011).

Concerning public procurement stages, advertisement of invitation to interest, evaluation of tender submitted by suppliers, and contract administration are highly vulnerable to poor practices and public corruption (Dzuke & Naude, 2017). Thus, e-procurement of the public procurement process suggested as a solution as it reaches a bigger pool of suppliers that can minimize the risk of adverse selection because of information asymmetry (Bawole & Adjei-Bamfo, 2019; Neupane, Soar, & Vaidya,

2014). Despite the importance of public procurement practices in facilitating economic, social, and environmental issues of developing countries like Ethiopia, limited empirical works have been conducted by considering FWA as a major focus (Albano et al., 2010; Albano & Sparro, 2008). According to Flynn and Davis (2014), considerable procurement researches have emanated from European and North American regions.

To contribute to the gap in empirical research related to this study, an informal interview and group discussion conducted with experts and managers from Addis Ababa Procurement and Property Disposal Agency, Amhara Regional State – Procurement and Property Disposal Agency, and other Public Bodies during training sessions provided at Ethiopian Civil Service University on the topic of FWA procurement management stated that despite an effort made by their respective agencies; framework contracting has been facing various challenges (such as lack of professional capacity of specialists and managers; poor law enforcement mechanisms; inefficient procurement process; poor contract administration; late and non-submission of procurement plan by the user agencies, shortage of foreign currencies; low financial capacity of suppliers; late delivery of goods, late payments) that require a research intervention and policy re-direction for smoother practices. The general objective of this study is therefore to examine the efficiency FWA procurement practice to improve public procurement in Ethiopia. The specific objectives are:

- i. To examine the procedural efficiency of executing FWA procurement.
- ii. To investigate the perceived challenges of FWA procurement practices.
- iii. To analyze the perception towards FWA procurement practice by the PBs.

Materials and Methods

Choosing an appropriate method is not an easy task. This section presents the appropriate methodological issues used to address the research objectives. It has identified the research design, the population and sample, data collection strategies, and method of analysis.

Research Design and Approach

Exploratory research is used for a better understanding of the existing situation (Twinn, 1997). Furthermore, in-depth case analysis followed by a comparative case study design, is employed as the former strategy gives the flexibility to drill deeper into the phenomenon. A case study is used because it enables the study to focus on a given phenomenon and analyze it in detail (Dubois & Araujo, 2007; Karjalainen, 2011). However, descriptive and explanatory design is the most appropriate for this study as the study tries to describe the procedures on FWA and explain the perceived challenges and perceptions towards the frame. A mixed-method approach is also used at the data collection and analysis stages to access the advantages of both quantitative and qualitative data. werewasdone

Target Population

The current government structure of Ethiopia is a federal form with ten regional states and two city administrations in which the federal government plays a strategic role. The target population was the following: at a regional and city administration level, in Addis Ababa City Administration, 97; in Oromiya Regional State 56; in Amhara Regional State 52; in Afar Regional State 20; and from Dire Dawa City Administration 25. The rationale for focusing on these target populations is to give a fair representation of the FWA activities exercised in the country.

Sample Size

Various methods of sample size determination strategies can be used to identify representatives of the population which depends on the type of the study and the data needed (Punch, 2006). In this study, probability sampling was used to select PBs who participated in the FWA procurement practice. Furthermore, purposive sampling is used to collect qualitative data from the Agencies and Services. Specifically, critical case sampling is taken to insure logical generalization (Punch, 2006). As . Thus, for this study, 30 percent of the population frame of each stratum (stratified random sampling) is used.

Source of Data and Instruments

The primary source of data is collected from PBs (beneficiaries), agencies (at the federal and regional level), and services (at federal and regional level) using questionnaires and key informant interviews. **Questionnaire** – As self-constructed instruments suffer from external and internal validity, thus pre-test was conducted to improve the validity of the instrument. **Key Informant Interview** – interviews are important instruments used to collect qualitative data. For this study, self-developed instruments are used. The procedure for the development of the instruments was based on the existing literature in line with the research objectives.

Table 1: Summary of Sample Size Determination

No	Institutions	Population size	Sample size
1	Federal Government of Ethiopia	224	68
2	Addis Ababa City Administration	97	30
3	Oromiya Regional State	56	17
4	Amhara Regional State	52	16
5	Afar Regional State	20	6
6	Dire Dawa City Administration	25	8
Total		591	183

Source: Authors' construction, 2020 based on reports of agencies during the 2018/19 fiscal year.

The rationale for taking these institutions is based on the role they are playing in the FWA, their share in budget size, and inclusivity (better representation) of imagining regions and city administration.

Interview guideline was used to avoid out-of-track data and response biases and to ensure standardization among responses. Finally, data saturation was considered for the validity of the data.

Reliability and validity – primary data collection instruments need to be valid and reliable (Harper, 2002). Reliability tests can

measure the relevance and validity tests and check whether the data collection instrument is achieving the intended purposes. One way of ensuring validity and reliability is through pre-test (Chandran, 2004). Thus, a pre-test was conducted before the use of the instruments.

Method of analysis - Both quantitative and qualitative methods of analysis are employed.

Table 2: Summary of data type, source and method of analysis

ROs	Data type and source	Method of analysis
RO1	Quantitative data from PBs	Simple statistical tools including frequency, percentage, mean, and Spearman's rank correlation, and Ordinal regression analysis
RO2	Quantitative and Qualitative data from PBs	Simple statistical tools including frequency, percentage, mean and narrative analysis
RO3	Quantitative data from PBs and Agencies	Simple statistical tools including frequency, percentage, mean, Spearman's Rank Correlation

Source: Authors construction, 2020 Note: ROs – Research Objectives

The Ordinal regression model was estimated by identifying the dependent and independent variables on the quantitative data to investigate the procedural effects of FWA activity. Further, SPSS statistical package is consulted to facilitate the data analysis process for the reason that the model is suitable for non-parametric data.

Results and Discussions

Compliance with the framework contract by public bodies is crucial for the achievement of the benefits of centralized procurement (Karjalainen et al, 2009). And good practices in public procurement increase the effectiveness of public expenditure (WB, 2014). In the next sections, the results and discussions are presented.

Demographic characteristics - The majority of the age groups of the respondents are between 31-45years (66 percent) of which 77 percent are procurement specialists working on PBs. The majority of the

participants have service year of 6-10years which indicated they had moderate years of experience in the field. The gender distribution indicated that female participants were fewer than male participants.

The Efficiency Of FWA Procurement Practices

The FWA procurement in Ethiopia was designed to acquire common user items (CUI) needed by most PBs. To identify the procedural effects of executing FWA procurement - the dependent variable – the overall efficiency of FWA procurement was used to measure the cost and related savings. Also, by focusing on the FWA procurement practices to be followed in the function of procuring common user items for the PBs; procurement planning, solicitation practice, goods receiving and payment, and conflict resolution are the independent variables devised. The descriptive statistic of the variables is presented as follows:

The Overall Efficiency Of FWA Procurement Practices

As evaluated by the respondents from the PBs who participated in the FWA procurement at the federal and regional governments of Ethiopia, the overall efficiency of FWA procurement is presented in the following table.

Table 3: The overall efficiency of FWA practice (Percent)

Statement	#	SA	MA	N	MD	SD
Simplified procurement practice	140	30	30.7	17.1	10.7	11.4
Increased flexibility	140	22.1	25.7	18.6	18.6	15
Consider the strategy of the country	140	19.3	30	28.6	9.3	12.9
Provide equal opportunity to bidders	140	27.9	21.4	22.9	11.4	16.4
Promote fair competition	138	24.6	27.5	18.1	9.4	20.3
Create value for money	140	27.9	30.7	22.1	8.6	10.7
Minimize price fluctuation problem	138	19.6	32.6	10.1	18.1	19.6
Minimized bid cancellation	140	26.4	31.4	11.4	17.9	12.9
Mean = 3.38; Median = 3.55; Mode = 3.64 Cronbach's alpha = 0.93						

Source: Own Survey, 2021

Efficiency in public procurement indicates the reduction of cost while maintaining the quality standard to achieve value for money to ensure prudent public expenditure management. The descriptive statistics indicated that the overall efficiency level of FWA procurement at a moderate stage with a mean, median, and mode of 3.38, 3.55, 3.64 respectively. This indicates that the framework is not evenly supporting PBs to increase their procurement effort to change their quantity demands as needed. Regarding the provision of an equal opportunity to bidders, a fourth of the respondents disagreed that the framework did not provide an equal opportunity to bidders. Also, a third of the respondents stated that the framework did not provide fair competition. This is in conformation to the claim that fewer and bigger bidders are participating in the FWA procurement that depletes the principle of equity for all bidders.

Public procurement has to consider the country's strategies. The respondents testified that FWA procurement considers the country's strategies in account with 22.2 percent disagreement. Regarding the achievement of value for money, the majority of respondents (58.6 percent) agreed that FWA procurement has added value for money in the utilization of public funds through procurement. However, still, a fair share of respondents did not agree with the claim. Interviewees commented that the current focus on the reduction of the purchase price shall be supported by other considerations like social inclusion and environmental protection. Empirically, Alban and Sparro (2010) suggested that value for money in public procurement need to include high quality to price ratio for PBs and the society in general. FWA procurement is expected to reduce the price fluctuation during the framework period. However, respondents indicated that unpredictable price fluctuation reduced the price benefit that the frameworks intended to achieve.

Still, 52.2 percent of respondents stated that FWA procurement helps to minimize price fluctuations. On the other hand, the interview result indicated that inflation and currency devaluation were the main factors for the frequent change in price and the price adjustment question of suppliers. To examine the level of support that FWA procurement brought to PBs, respondents were asked to rate their level of agreement on the reduced bid cancellation and 57.8 percent indicated their level of agreement.

This implies that a moderate level of efficiency is achieved regarding time and money-saving by avoiding bid cancellation.

The Spearman Rank Correlation

Due to the non-parametric nature of the data collected, Spearman Rank Correlation is used to check the relationship among the variables.

Spearman's rank correlation result indicated that the efficiency of FWA procurement practice has a significant correlation with all the other variables. A stronger correlation between efficiency and conflict resolution with 0.82 followed by goods receiving and payment with 0.76, then procurement planning with 0.72, and finally solicitation process with 0.69. Thus, the dependent and independent variables have a large correlation. To support the correlation result, an ordinal regression model was established; the next section discusses the regression estimator.

Result Of An Ordinal Regression Estimator

Spearman's rank correlation indicated that all explanatory variables were positively correlated with the efficiency of FWA procurement practices. Using a non-parametric method, the following model is estimated to check the significance level and magnitude of relationship among the efficiency of FWA procurement practice and the independent variables.

EFF = $\beta_0 + \beta_1 \text{Plan} + \beta_2 \text{Sol} + \beta_3 \text{GRP}$ and conflict resolution (CR) were
Table 4: Spearman's rank correlation on the efficiency of FWA procurement

		EFF	Plan	Sol	GRP	CR
Spearman's rho	EFF	1.000				
	Correlation Coefficient					
	Sig. (2-tailed)	.				
	N	144				
Plan	Correlation Coefficient	.718**	1.000			
	Sig. (2-tailed)	.000	.			
	N	130	130			
Sol	Correlation Coefficient	.695**	.692**	1.000		
	Sig. (2-tailed)	.000	.000	.		
	N	140	130	140		
GRP	Correlation Coefficient	.764**	.690**	.674**	1.000	
	Sig. (2-tailed)	.000	.000	.000	.	
	N	143	129	139	143	
CR	Correlation Coefficient	.820**	.756**	.671**	.805**	1.000
	Sig. (2-tailed)	.000	.000	.000	.000	.
	N	142	128	138	142	142

** . Correlation is significant at the 0.01 level (2-tailed).

Source: Own computation using SPSS, 2021 Note - EFF – effectiveness of FWA procurement; Plan – procurement planning; Sol – solicitation of bid; GRP – goods receiving and payment; CR – conflict resolution

Where: EFF – effectiveness of FWA procurement; Plan – procurement planning; Sol – solicitation of bid; GRP – goods receiving and payment; CR – conflict resolution

After testing for the necessary assumptions required by the Ordinal regression estimator, with a significant Model Fitting Information, insignificant Goodness-of-Fit, Pseudo R-square of 0.75 (measured in Nagelkerke) that is – adequate explanatory variables are included and insignificant output on the Test of Parallel Lines which do not violate the assumption (the test results are annexed at the end). Then, the following table depicts the parameter estimates.

The parameter estimate indicated that procurement planning (Plan), bid solicitation process (Sol), goods receiving and payment

of FWA procurement practices of the selected PBs of Ethiopia.

Table 5: Ordinal regression estimation

Parameter Estimates	95% Confidence Interval					
	Estimate	Std. Error	Wald	dSig.	Lower Bound	Upper Bound
LocationPlan	.660	.262	6.329	1.012	1.146	1.174
Sol	.772	.222	12.0491	.001	1.336	1.208
GRP	1.163	.266	19.1521	.000	0.642	1.683
CR	1.192	.318	14.0241	.000	0.568	1.816

Link function: Logit.

Source: Own computation using SPSS, 2021

Procurement Planning

Procurement planning aimed to coordinate and integrate the procurement practices by reducing ill-procurement that violates the principles of public procurement (UN, 2006). Specifically, procurement planning is a technical and legal requirement in the Ethiopian public procurement practices. According to the procurement proclamation, all PBs are required to prepare, approve and report their procurement plan to the

responsible bodies at both the federal and regional levels. For instance Proclamation 649/2009 Art (22) demands that all PBs prepare a procurement plan by align it with the budget and then report it to the PPA before August 6 (*Hamle 30*) of the Ethiopian Calendar. In addition, when the method of procurement is indicated in the procurement plan, FWA procurement has to be identified for the CUI included goods and services.

The parameter estimate of the Ordinal regression revealed that procurement planning was a significant positive predictor of efficiency of FWA procurement practice in the selected PBs. Further, the following descriptive statistics indicates the contribution of FWA in the procurement planning function of PBs.

Table 6: Contribution of FWA for Procurement Planning of PBs (Percent)

Statement	#	SA	MA	N	MD	SD
Improved procurement planning	139	24.5	36	18	11.5	10.1
Increased alignment of PP with budget	139	17.3	34.5	23	16.5	8.6
Decreased effort for need assessment	135	19.3	38.5	19.3	14.1	8.9
Included the socio-economic condition of suppliers	135	12.6	28.9	31.1	17	10.4
Considered the objectives of PBs	138	21.7	28.3	18.8	20.3	10.9
Mean = 3.4; Median = 3.4; Mode = 3.4; Cronbach's alpha = 0.87						

Source: Own Survey, 2021

The descriptive statistics on the level of contribution that FWA procurement added to the procurement planning of PBs indicated a moderate achievement of 3.4 for all mean, median and mode. This is an indication that FWA procurement is contributing to the improvement of the procurement planning practice of PBs. More than 60 percent of respondents indicated that the FWA has a contribution to an improvement in their procurement planning. Further 51.8 agreed that due to FWA procurement practice they can align their procurement plan with the

allocated budget. Here, the remaining participants did not agree on the claim showing that the involvement of FWA in their procurement plan is not significant. However, 58 percent of participants agreed that their need assessment effort has decreased because the CUI is assessed by the framework and they can focus on the other procurements of their organization. With the split response, participants identified that 58.5 percent did not agree on the socio-economic consideration while preparing the FWA procurement. Moreover, FWA procurement has to incorporate the PBs objective into account. Here, half of the respondents identified that PBs objective is considered while planning the FWA procurement. This indicates that PBs own specific objectives has been depleted because

Solicitation Procedure

Solicitation function is an effort by which procurement practitioners aimed to increase competition to create efficiency over the use of public money. The method selected and the bid document preparation define the solicitation process. FWA is expected to increase process efficiency to PBs. The parameter estimate of the Ordinal regression revealed that the bid solicitation process was a significant positive predictor of the efficiency of FWA procurement practice in the selected PBs.

Table 7: Contribution of FWA for facilitating the bid solicitation procedure (Percent)

Statement	#	SA	MA	N	MD	SD
Avoid ambiguity on method selection	143	35.7	31.5	9.1	11.9	11.9
Increase open bidding	142	35.2	39.4	10.6	9.2	5.6
Decrease the complexity of bid document preparation	144	33.3	29.9	13.2	11.8	11.8
Reduce fragmentation of procurement	142	22.5	33.8	13.4	14.1	16.2
Improve specification preparation	142	35.2	26.8	13.4	14.8	9.9
Mean = 3.7; Median = 3.8; Mode = 3.8; Cronbach's alpha = 0.85						

Source: Own Survey, 2021

The overall descriptive statistics result about the contribution of FWA procurement on the facilitation of the bid solicitation procedures of PBs showed moderate agreement with a mean of 3.7 and median and mode of 3.8. The majority of respondents (67.2 percent) indicated their level of agreement towards the reduction of ambiguity in the method selection also 74.6 percent indicated that FWA procurement has increased the use of the open bidding method of procurement. Further, 63.2 percent of respondents testified that FWA has reduced the complexity on the bid preparation efforts of the PBs and 62 percent of participants acknowledged that FWA has improved specification preparation efforts of PBs whereas, only 56.3 percent of respondents identified that the framework has reduced procurement fragmentation. Therefore, despite the effort made by the coordinators of FWA to reduce the fragmentation of public procurement, the data indicated that it did not achieve the purpose.

Goods Receiving And Payment

The parameter estimate of the Ordinal regression identified that goods receiving and payment was a significant positive predictor of efficiency of FWA procurement practice in the selected PBs. Furthermore, to examine the contribution of FWA in the goods receiving and payment functions of

PBs, descriptive statistics are presented.

Table 8: Contribution of FWA for goods receiving and payment (Percent)

Statement	#	SA	MA	N	MD	SD
Ease goods receiving	143	26.6	36.4	8.4	21	7.7
Decreased transport cost	143	21.7	30.1	12.6	14	21.7
The improved choice to change the quantity	142	16.3	20.4	25.4	23.9	13.4
Reduce time to make payment	142	23.9	35.9	17.6	11.3	11.3
Increased coordination of PP and budget units	141	19.1	29.1	17.7	19.1	14.9
Decrease the complexity of making payment	143	25.9	36.4	15.4	9.1	13.3
Mean = 3.3; Median = 3.3; Mode = 3.3; Cronbach's alpha = 0.86						

Source: Own Survey, 2021

The overall result of the central tendency indicated a neutral contribution of FWA procurement to the goods receiving and payment functions of PBs with a mean, median, and mode of 3.3. Element-wise, 63 percent of respondents agreed that the frame has eased the goods receiving function whereas half of them agreed that the cost of transportation decreased. This implies that the cost of transportation is dependent on the location of PBs, meaning – those who are closer to the suppliers enjoyed the reduced cost while those who are far from the suppliers are suffering an additional transport cost. In line with this result, Albano and Sparro (2010) identified that demand heterogeneity like physical location reduces the efficiency of centralized procurement.

On the other hand, concerning flexibility to change quantity requirement, 63 percent of respondents did not agree to indicate that PBs are restricted to receiving goods with a defined quantity with little room for quantity choice.

Coordination between the procurement and budget units plays a key role in facilitating procurement-related payments and adding efficiency. The study result indicated that half of the respondents did not agree on the increased coordination between the units. Thus, due to loose coordination, efficiency in FWA procurement has been lost. However, 63 percent of the respondents agreed that frame has reduced the complexity of making procurement-related payments.

Conflict Resolution

Conflict in procurement arises when the contracting parties failed to fulfill their duties and responsibilities. FWA is expected to reduce the conflict between the PBs and suppliers by formulating uniform terms and conditions that can govern the procurement process. The parameter estimate of the Ordinal regression identified that conflict resolution was a significant positive predictor of efficiency of FWA procurement practice in the selected PBs.

Table 9: Contribution of FWA for conflict resolution (Percent)

Statement	#	SA	MA	N	MD	SD
Reduce negotiation effort	140	19.3	31.4	21.4	13.6	14.3
Reduced conflict	139	23.7	31.7	21.6	15.1	7.9
Improved data management	141	27	30.5	20.6	13.5	8.5
Reduced cost of litigation	138	23.9	37.7	16.7	15.9	5.8
Increased compliance rate of suppliers	139	14.4	27.3	23.7	20.9	13.7
Facilitate timely payment to suppliers	141	22	29.8	22	17.7	8.5
Mean = 3.4; Median = 3.4; Mode = 3.1 Cronbach's alpha = 0.86						

Source: Own Survey, 2021

The descriptive statistic result of mean and median is 3.4 indicating a lower limit to the

level of moderate agreement on the overall contribution of FWA procurement on reduction of conflicts.

The mode result 3.1 indicated a neutral contribution to the frame on the conflict resolution effort of PBs. Construct wise, 51 percent of respondents indicated an agreement on the reduction of negotiation efforts of PBs while the remaining did not. This split result indicates that PBs are still making an extra effort on negotiation with suppliers despite the existence of the framework on the price term and related considerations. Parallel to this, 55 percent agreed on the reduction of conflict with the suppliers. Further, 58 percent agreed on the improvement of procurement data management capacity of PBs whereas the remaining did not agree. This mixed result implies that FWA practice has to work towards improving the data management of PBs.

If not handled properly, conflicts on public procurement might end up with resolution through litigation that can add cost to both the contracting parties. Our result indicated that 62 percent of the respondents indicated an agreement on the reduction of the cost of litigation due to the practice of FWA procurement. This is due to the centralized contract management done by the coordinating authorities. Meanwhile, only 38 percent of respondents agreed on the increment of compliance level by the suppliers. This low level of suppliers' compliance to the FWA contract is depleting the efficiency of FWA procurement practice and requires attention. On the other hand, timely payment to suppliers increases their level of compliance and dependability. Only 52 percent of the respondents agreed on the facilitation of the frame to the timely payment to suppliers. This indicates that timely payment to the suppliers is not performed properly and requires attention.

Challenges Of FWA Procurement Practices

Procurement is one of the complicated government operations faced with multi-directional challenges. Thus, an investigation on the challenges of FWA practices was conducted to identify and correct them in the future.

current procurement laws do not consider the current economic and market condition of the country. They hinted that the existing legal framework lags behind the fast-moving global market condition. According to Junior (2013), successful centralized procurement should have procurement units that are free from private interest and pressure from political leaders.

Table 10: Challenges encountered in FWA procurement practices by the PBs (Percent)

Major challenges	#	SA	MA	N	MD	SD	Mean
Lack of top management support	143	29.4	31.3	16.7	15.3	6.9	3.61
Lack of qualified procurement specialists	142	24.3	29.9	20.8	13.9	9.7	3.46
Vulnerability for high-level corruption	142	13.9	29.2	25.7	13.2	16.7	3.11
Increase piecemeal purchase	141	17.4	27.1	21.5	18.8	13.2	3.17
Invite fewer bidders	141	35.5	22	16.3	11.3	14.9	3.52
Lack of common understanding	141	20.6	24.1	27.7	17	10.6	3.27
Low awareness of procurement specialists	140	16.4	28.6	22.9	19.3	12.9	3.16
Frequent conciliation of bid	139	15.1	26.6	23	19.4	15.8	3.06
Lack of objective evaluation	139	16.5	13.7	21.6	25.9	22.3	2.76
Promote unethical behaviours	143	10.5	14.7	25.9	21.7	27.3	2.59

Source: Own Survey, 2021

Among the major challenges in the FWA procurement practices of the selected PBs were the lack of top management support with a mean of 3.61, involvement of fewer suppliers with a mean of 3.52, lack of qualified procurement specialists to execute the frame (mean 3.46), lack of common understanding between the central coordination authority and the PBs with the mean of 3.27, increase in the piecemeal purchases with the mean of 3.17 and low level of awareness from the procurement officers of the PBs with a mean of 3.16.

Legal Framework and Top managements support: According to the interview result conducted with procurement specialists at the federal and regional government noted that the legal framework governing FWA procurement is not updated on a regular interval. Interviewees indicated that the

However, strong support to the system is needed to facilitate the transaction between the PBs and suppliers. For this study, top management officials that are accountable for the overall activities of PBs are selected. Here, respondents identified that the level of support from the top management is minimum and taken as a "scapegoat" for the poor procurement performance of the organization. For instance, a procurement officer from the PBs testified that top managers use FWA procurement as an excuse for the delay in the delivery of goods (for both FWA procurement-related and other decentralized procurement.) This assessment is in line with the findings of Ndercaj & Ringwald (2014) who identified that the public procurement administration is suffering from a lack of experienced managers.

Loose Coordination: The misunderstanding between the principal and agents is making FWA inefficient. Agency theory taught us that the agents are responsible for the interest of the principals. However, in the FWA arena, the collaboration of the principals to support the effort of the agents is found to be a relevant factor for the efficiency of public procurement. For instance, when the procurement agents at the federal and regional government go through the procurement process to reach a FWA on behalf of the PBs (the principals) to make sure that all the benefits of the agreement are achieved (due to misunderstanding and limited awareness) PBs failed to exercise the final critical steps of the procurement claiming that the agencies were not supporting their specific organizational demands.

Suppliers and the Market: Efficiency in FWA cannot be achieved without vibrant market conditions. The study identified that the current market condition and the suppliers that operate it did not suit the demands of FWA. Procurement specialists expressed their observation that FWA requires capable supplies that can meet huge demands of PBs at different times with different quality requirements. However, the existing suppliers were not in a position to meet the contractual agreements due to capacity and sometimes willingness to exercise their obligation. One of the key issues that suppliers claimed as a reason for not meeting the requirement was the issue of hard currency shortage that the market is facing. Further, the level of inflation that the country is accounting for is not helping suppliers to fulfill their contractual responsibility. In addition, the unpredictability of quantity requirements from the PBs made suppliers act contrary to what was agreed in the framework. Thus, the late arrival of goods and inconsistency in delivery by suppliers require attention.

Professional Capacity and Commitment: The capacity of procurement professionals to exercise their duties and responsibilities is one of the critical challenges in FWA procurement. The interview result indicated that the capacity of procurement specialists at the agency and PBs level was not adequate. Senior procurement specialists identified that FWA procurement requires skill and experience to look at the big picture of the benefits to be received at all levels of procurement, not just the price reduction. In addition, the survey result indicated that the lack of qualified procurement specialists and low level of awareness have challenged the practice of the frame. This implies that the qualification and commitment of procurement people in the PBs require attention.

Quality and Quantity: According to Sorte Junior (2012) efficient centralized public procurement optimizes quality and reduces cost through economies of scale. However, the delivery of "poor" quality goods is challenging the efficiency of FWA at all levels of government procurement in Ethiopia. Senior experts at the central coordinating agencies explained that the definition of *quality goods* for them meant a good that is "fit for the purpose" by using the Ethiopian standards to verify the goods delivered to the PBs. This implies that the delivery of quality goods from the FWA procurement has not been achieved yet. This finding conforms with Hiidensalo (2016) who identified that delivery sub-standard quality goods affected the performance of centralized public procurement. On the other hand, the delivery of goods in the right quantity has been the issue in the FWA procurement. Respondents identified that "stockout" is mentioned for the reason for PBs purchase order request. This forced PBs to order an unnecessary quantity of goods due to the fear that they may not get the right quantity. Therefore, the lowest price award

criteria used in the FWA has to be supported by improved quality and quantity delivery.

Timely Delivery: Interviewees on the selected jurisdiction stated that - the most frequent challenge in the FWA procurement is the delay in delivery of ordered goods. They also indicated that year-end rush procurements have been noticed due to the delayed delivery and out-of-stock responses by suppliers that forced PBs to look for an alternative delivery using the decentralized system. As indicated in the survey result, PBs are being challenged by piecemeal purchasing. Thus, this delivery delay has reduced the expected efficiency benefit of the frame.

Contract Management: Inadequate contract management reduces the efficiency of procurement practices. Participants of the interview identified that the current FWA procurement practice lacks the proper contract evaluation and follow-up. They identified that the frame is huge to be handled by the centrally coordinating authority. Besides the contract management has been hampered by the need identification and planning practices of the PBs.

Perception towards FWA

The perception of procurement specialists towards the frame determines the efficiency of FWA procurement practices.

Table 11: Perception towards FWA procurement practices by the PBs (Percent)

Statement	#	SA	MA	N	MD	SD	Mean
Improve compliance with regulation	141	29.1	38.3	15.6	9.2	7.8	3.72
Add burden to procurement specialists	141	16.3	28.4	20.6	22	12.8	3.13
Increase grand corruption	139	16.5	18	29.5	14.4	21.6	2.94
Made my task simple	141	24.8	36.2	17.7	12.8	8.5	3.56
Reduced sophisticated methods	138	15.2	24.6	24.6	15.9	19.6	3.00
Make me less relevant	142	12	26.1	19.7	26.1	16.2	2.92
Reduce alternatives of offer	140	19.3	22.9	25	22.9	10	3.17
Reduced organizational-level corruption	140	25.7	28.6	22.9	16.4	6.4	3.51
Weaken my professional exposure	141	19.1	21.3	24.1	21.3	14.2	3.10
Improved my incentives	139	23	23	20.1	22.3	11.5	3.24
Good on paper than in practice	138	10.9	25.4	35.5	16.7	11.6	3.07
Reduce my sense of control	140	10	31.4	19.3	17.9	21.4	2.91
Increased trust in suppliers	140	19.3	22.6	25	22.9	10	3.19
Reduce solidarity to local suppliers	140	13.6	20	25.7	20	20.7	2.86

Source: Own Survey, 2021

The mean result on the perception of procurement professionals in the selected PBs indicated that – improvement of compliance with the procurement laws with a moderate agreement mean of 3.72, made their task simple with a mean of 3.56, reduced the organizational level corruption with a mean of 3.51. On the other hand – improved incentive, increased trust in suppliers, reduced alternative offer, added burden, weaken their professional exposure, good on paper, reduced sophistication of method selection, increased grand corruption, made them less relevant, reduced their sense of control, and reduced solidarity to local suppliers with a mean of 3.24 to 2.86.

Furthermore, to investigate the relationship among the perception of procurement specialists and managers of PBs towards FWA procurement is dependent on the dependent variables (gender, age, experience, and job position); a Spearman Rank Correlation analysis was performed.

The Spearman's rank correlation result indicated a low and insignificant relationship among the perception of procurement specialists in the selected PBs with their age group, job title, year of service, and gender group. However, the job title and gender group of the respondents has a positive correlation whereas the age group and service year of respondents are negatively correlated.

The result of the key informant interview revealed that the perception of procurement specialists towards the reduction of their relevance in the procurement of their organization due to the existence of FWA indicated a twofold argument. Few of them testified that FWA procurement limited their exercise on professional interests. Others indicated that the FWA procurement made them free from the routine comment user-item procurement to focus on the strategic procurement of their organization by

reducing the burden of elongated procurement procedures.

Senior procurement specialists explained that the awareness level towards FWA procurement is limited to a few people who participated in the initial inception of the modality. Above all, they indicated that procurement officials at the PBs are not looking at the big picture at country-level achievement of value for money, rather they focus on their own organization's interest which is focused on short-term price reduction. The perception towards FWA procurement varies from region to region and physical distance between the central coordination body and the PBs. For instance, PBs approximate to the center reported a positive perception towards the practice than those far from the center.

Conclusion

Efficiency in the FWA procurement realized when PBs consider total value for money for their operations and the society as a whole. This study identified that the focus on cost control has to be supported by other considerations like the overall benefit to the society and broader policy objectives. Moreover, in addition to support from the political leaders and administrators, coordination among the key players in the FWA procurement has enormous relevance. Furthermore, communication between the central coordinating agencies and PBs increases the efficiency gained from FWA procurement. But the level of awareness towards FWA procurement by procurement specialists at the PBs is at its early stage.

All in all, as one senior person who participated in the establishment of FWA procurement system in Ethiopia identified, "no one is fully happy with what they procure" even at a personal level compared to the FWA procurement for thousands of PBs with diverse needs and requirements. Here, specialists have to understand that

there is no perfect procurement, rather the right quality with the right price and right quantity at the right time from the right supplier has to be given due attention.

Recommendations

When the demands of PBs are properly aggregated, they will become a significant market power by dictating the supply of goods and services needed by the government. In the government of Ethiopia however, this potential has not been utilized adequately. Also, facilitate technical pieces of advice that are relevant to the day-to-day operation of the FWA operations.

Well-coordinated and integrated FWA procurement can enhance the efficiency of public procurement. Thus, by crafting a smooth communication channel among the centrally coordinating agency, PBs, and suppliers, the desired procurement efficiency can be realized. Finally, the study calls upon policymakers that – the benefits of FWA procurement will be realized when adequate attention is given to the efficacy in the practice of the frame and reduce the challenges faced through a coordinated effort by the centrally coordinating agencies and the PBs.

Author Contributions

The author conceived the idea, designed the proposal and instruments, conducted the statistical analysis, and wrote the manuscript.

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