The effects of minimum wages on the labour market, migration and income distribution in Kenya; a CGE analysis

RESEARCH PROPOSAL
Presented to
Partnership for Economic Policy (PEP)

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Kenya

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Abstract

In Kenya, there has been increased debate on the impact of increases in the minimum wage and the pay disparities between sectors. Long-term differences in earnings across sectors and different regions (urban and rural) are reflected through higher poverty rates in rural areas and especially among wage earners. This study seeks to evaluate the effects of minimum wage rise and the differentials between the sectoral wages on; labour migration in particular from rural to urban areas and also among the different activities, and its impacts on growth. Income distribution and poverty aspects will also be captured. The study will use the single country static model, PEP-1-1 model and Social Accounting Matrix for Kenya for the year 2009. The study will simulate; an increase in minimum wage workers wage in the formal sector for urban and rural areas. Here, wages will increase but at a different scope - as is the case with the revision policy of minimum wages in the country. We expect that this is likely to have an impact on migration from rural to urban areas. It may also induce labor movement from lower wage sectors to sectors where there is higher minimum wage. The key research question is; is there an extent to which minimum wages in rural or urban areas can increase or decrease and limit rural urban migration? An alternative policy that we shall simulate is changes in labour productivity. This is expected to support the growth and increase demand for labour and higher wages in some sectors, and areas.
1.0 Main research questions and contributions
1.1 Introduction
In Kenya, wage restraint policies in form of minimum wages can be traced back to 1972 through the minimum wage regulation and wage guidelines (Republic of Kenya, 1973). Minimum wages have been regulated through the general, agricultural and sectoral wage councils. The wage councils, which are advisory in nature, are constituted by the Minister for labour. Labour market policies and institutions are recognized as an integral part of ensuring growth and equity in remuneration of workers. Minimum wages act as a means of reducing the risks faced by informal workers and broadening access to social protection.

The general Wages Order, as gazetted in May 2010 contains minimum wage levels for fifteen occupational categories, with different rates of pay for cities, municipalities and all other towns (Republic of Kenya, 2009). This implies existence of forty five sets of minimum wages under this Wage Order. The agricultural order, on the other hand, contains minimum wages for eleven different occupations (Republic of Kenya, 2009). The setting of minimum wage by location is informed by the varied share of employment by different sectors in the country (Table 1). Notably, agriculture sector provides employment to over seventy percent of the total employment while in urban areas most employment is in the services and industrial sectors. To ensure policy relevance given the current setting of wages according to location and sectors, this study will adopt a regional (urban versus rural) and sectoral approach; between agricultural and non agricultural activities (industry and services).

Table 1: Share of sectoral employment by location

<table>
<thead>
<tr>
<th>Sector</th>
<th>1997</th>
<th>2005/06</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Rural</td>
<td>Urban</td>
</tr>
<tr>
<td>Primary/Agriculture</td>
<td>71.9</td>
<td>12.2</td>
</tr>
<tr>
<td>Secondary/Industry</td>
<td>4.0</td>
<td>13.1</td>
</tr>
<tr>
<td>Tertiary/Services</td>
<td>24</td>
<td>74.6</td>
</tr>
</tbody>
</table>


The labor structure across sectors has also ensured that some policies accrue benefits to workers in some sectors while for others there is no change in welfare. For example, the setting of the minimum wage by occupation and industry based on location are reviewed regularly in Kenya. A simple analysis indicates a higher growth in minimum wages for agriculture compared to industry (Figure 1). However, this has not reduced labour migration from rural to urban areas in search of higher level of wages. However, high rates of rural-urban migration often creates high pressure on available paid employment prospects and provision of social services. Unlike other regions in the country where agriculture is the dominant economic activity, industry and service sectors are dominant in urban areas. The lower opportunities that often present themselves can lead to not only
higher rates of frictional unemployment but also higher urban poverty incidence. The key reason is the migration of labour from rural areas, higher minimum wages that are set for urban areas, and the high proportion of skilled labour found in urban areas compared to other regions. The lack of employment in formal sector by migrants implies that majority would have to find work in the informal sector activities. This means that for some migrant workers their situation in the urban labour market may become worse off than if they were in the rural areas.

Figure 1: Gazetted minimum wages and annual inflation rates

![Figure 1: Gazetted minimum wages and annual inflation rates](image)

Source: Republic of Kenya, 2015

The earliest comprehensive study on employment and inequality in Kenya showed that urban unemployment can be explained by the fact that minimum wages in urban areas exceed all groups (wage employees in rural areas; large and small farms and non-agricultural enterprises) except owners of non-agricultural enterprise (ILO, 1972). This is due the enforcement of the minimum wage in urban areas notably in manufacturing sector which leads to high wage differentials when compared with the agricultural sector. This is supported by Andalón and Pages (2008) whose findings on labor market outcomes in Kenya indicate that minimum wages have a positive effect on incomes of low skilled workers and women in the non-agricultural sectors (manufacturing). The higher minimum wages in urban areas is still identified is a contributing factor to rural-urban migration in developing countries. This is supported by other labour statistics which indicate that although the size of wage employment in rural areas are rising, to an estimated 15.6 per cent,
however informal urban employment is rising faster and estimated at over 70 per cent of total employment (ROK, 2013).

Migration of labour can also partly be attributed to insufficient extended to agricultural production and low prices for farm produce. The introduction of fertilizer subsidies in the country have aimed at not only increasing agricultural production to also increase employment and reduce poverty through increased food security. In Kenya, rural development strategies and reduction of rural-urban migration, have also shifted towards the development of technology that will use local materials, including labour. The increased urbanization, which has risen to a high of 40 % rate of in-migration for major urban areas, is seen as a hindrance towards the location of production in the rural areas. Kenya’s rural industrialization strategy has not made progress for a long time and therefore the recognized need for increased investment at the rural levels, increased employment opportunities and the reduction of rural-urban migration (ROK, 2011).

Even in the presence of high informal sector in developing countries, including Kenya, and high non-compliance with the minimum wage policy, investigating the implications is critical to both understanding the dynamics in both the formal and informal sectors. This is an area we believe the study can shed more light on and build on public discourse on the relevance/irrelevance of the policy. This study and the modeling adopted is an attempt to evaluate effects internal migration arising from minimum wage changes.

An alternative policy that we shall consider and that has been identified that can support rural development and growth is changes in labour productivity. An economic position paper by the ministry concerned with labour notes that in 2013, labour productivity in most sectors slumped, save for agriculture, manufacturing, Transport and communication and Community Services and Personal Services which recorded marginal improvements. Public administration, defence, and other essential social services such as education and health registered least productivity (ROK, 2015). The need for further analysis of the impact has been voiced by government officials and hence its inclusion in the analysis.

In this study, the migration of interest is from rural areas which are largely agricultural sector activities to urban areas whose main economic activities are dominated by industry and services. The definition or urban and rural is determined by population concentration. Areas with a population of more than 2000 are considered urban while those with less are categorized as rural.

1.2 Research questions
This study seeks to evaluate responses of the labour market, and sectoral and economic responses to increases in minimum wages in Kenya. Given the relative importance of the agricultural sector in the Kenyan economy, the study generally seeks to find out if the minimum wage policy is a
hindrance to growth in agricultural sector through lower wages and labour supply to the sector. Similarly, what is the effect of the wages on other sectors and the labour market. Specifically, the study seeks to find if there is an optimal growth in minimum wages that supports growth and reduces inequality that exists between households in urban and rural areas.

The specific research questions are;

a) What is the impact of minimum wages on the labour market; informal sector, wage responses, and employment?

b) How do the minimum wage differentials affect labour migration between urban and rural areas?

c) How do changes in labour productivity affect employment, wages, migration of labour and growth?

d) What is the impact of the differential minimum wage increases on income distribution and poverty in Kenya?

2.1 Literature review

In general, empirical studies have identified two effects of minimum wage policies; a distribution effect and an employment effect. On the distribution effect, Fields and Kanbur (2007) found that poverty can actually decrease, increase or remain unchanged depending on the degree of poverty aversion, the elasticity of labor demand, the ratio of the minimum wage to the poverty line, and the extent of income sharing. Studies from Latin America and developing countries from other regions indicate that poverty falls as the minimum wage rises (Lustig and Mcleod, 1997; Morley, 1995). Neoclassical theory predicts negative effects on overall employment and an increase in averages wages as direct consequences of an increase in the minimum wage. The standard two-sector model, one covered and one uncovered, dictates that raising the minimum wage reduces employment in the covered sector, creates unemployment, and eventually push the workers to find employment in the uncovered sector which in turn has a negative effect on the lower tail of the wage distribution.

The impact of a minimum wage in the presence of a high informal sector is mixed. Some studies have found that minimum wage to the formal sector provide a signaling (lighthouse) effect to the informal sector, leading to increased informal sector wages (Boeri et al 2010). On the other hand, other studies have found that if minimum wages are enforced only in the relatively high-wage urban formal sectors, they are unlikely to help workers in the parts of the economy where most of the poor are found-the rural and urban informal sectors (Gindling and Terrell, 2004; Harrison and Leamer, 1997). In a review of literature of segmented labour markets and differentiated wages, Boccanfuso and Savard (2011) find that wage gaps between the formal and informal sector can also partly be explained by minimum wages that are set above the equilibrium level, and the activities of trade unions, and rules and regulations that introduce rigidities in the labour market. Similarly, Agénor and Aynaoui (2003) findings suggest that a cut in the minimum wage for
unskilled labor, can lead to a reduction in unskilled unemployment in the short term, and that the process of adjustment in the labor market often involves; rural to urban migration, formal-informal adjustments in labor supply, and domestic-international labour flows. This is also reported Schultz, (1982) findings that for the less educated groups, the traditional wage gap is the dominant determinant of urban labour force growth and inter-regional migration. A gendered analysis may shows some variations. In the same study, Schultz (1982) found that for males with some secondary or higher education the elasticity of migration with respect to unemployment is greater than that with respect to wages. Suttiwichienchot and Putanapong (2014) investigate labour migration using aCGE model with switching costs in their analysis. Their findings ndicate that the costs associated in movement from one area and sector often mirror changes in labour productivity.

2.2 Policy relevance
The minimum wage policy is a highly visible and often contentious policy issue in the country with often high expectations of declarations of increased wages by workers in affected sectors and opposition by market players (firms). Despite a minimum wage policy to ensure equitable pay, the headcount poverty rate is highest in rural areas and among workers in wage employment. In the case of urban areas the need to protect workers was illustrated in the Legal notice No. 64 of June 2010 that increased the minimum wages for domestic workers (service sector employment dominant in urban areas) by 12.5 per cent who have historically been paid much lower than the minimum wage primarily due to lack of contractual arrangements with employers and familial ties.

Over a period of five years (2013-2017 Medium Term Plan) the Kenyan government proposes to develop wages and incomes policy to provide a framework and necessary guidance on wages (Republic of Kenya, 2013). This is motivated by the need to address high inequalities as well as create structures that will inform wage adjustment mechanisms and reduce incidences of industrial disputes (Republic of Kenya, 2013). Noticeably, the high disparities in earnings and the structure of income sources between rural and urban areas, necessitates an assessment of current policies. The reported higher wages and opportunities for jobs in other sectors, unlike the predominantly agriculture based rural economy could partly explain the persistence higher incomes in urban households. The minimum wage policy is often seen as a means to addressing high poverty levels among wage earners. The role of minimum wage as a means of enhancing income distribution, even with the possibility of job losses is worth to interrogate. An analysis of the impact on poor and nonpoor households is therefore important.

The country’s economy is heavily dependent on the agricultural sector. The sector contributes an estimated 25 per cent of GDP and employs an estimated eighty per cent of all labour. Policies that are targeted towards the sector are bound to affect GDP growth rates, employment and incomes. Addressing high inequality levels is a key indicator in the long-term development blueprint, Vision 2030. The understanding of the push factors behind rural-urban migration which results in
depressed urban wages, urban poverty, and an increase in informalization of jobs and the informal sector respectively is important for the country. Could it be that low minimum wages in rural areas push workers towards urban areas?

Similarly, we believe that a gendered perspective in policy analysis on wages and migration issues is necessary. Whereas minimum wages are not gender-specific, females are disproportionately represented in certain activities such as; wage earners in agricultural sector in rural areas and in domestic service activities in urban areas. This distinction is made in the study. Similarly, a distinction between formal and informal in the labour market is important for a country like Kenya. The impact of higher minimum wages on informal sector will depend on the extent of job loss on the formal sector and the impact of capital flight. The implication on poverty is that workers in informal sector are often in low income households. In the SAM there are both urban formal and informal labor categories.

This study will inform the impact of minimum wage policy on the labour market, specifically migration, on overall economic performance and the welfare consequences of labour migration. Because of the comprehensive details and sectoral inter-linkages in the SAM, we believe that the CGE model proposed offers a good framework to capture the effects of policy changes. Finally, it is often argued that structural change is in a way identified by the progressive labour reallocation across sectors. We believe that this study on minimum wages effects on the labour market may bring to light if it contributes to the change or not.

3.0. Methodology
The study will adopt the single-country static PEP-1-1 model (Decaluwe et al, 2010) and modify it to develop fit the study. The model will be calibrated using a Social Accounting Matrix (SAM) for the year 2009. The simulations will be designed based on the objective of the paper; to evaluate the impact of minimum wages on the labour market specifically migration of labour, income distribution and growth effects. The subsequent sections of this highlight the aspects that the study aims to include in the basic model.

Production and factor demand
The distribution of economic activity by region show that there is some minimal agricultural activity in urban areas, and industry and services are majorly located in urban areas. However, there is substantial non-agricultural activity in rural areas and hence the study disaggregates all activities between urban and rural areas. Production linkages in the model will be captured through a constant elasticity of substitution between urban and rural, hence producers generate demand for both factors and intermediate goods.
Labour market

Based on the characteristics of Kenya’s labour market, the labour categories included in the model are categorized by skill (unskilled, semiskilled, and skilled), formality (either one is employed in formal or informal sector) and gender. Informal sector workers are included in the production function of each sector, and allow for substitution between informal labour and composite formal sector labour. Minimum wages applied to formal-unskilled workers imply a horizontal supply curve for the urban unskilled labour in the formal sector.

In this section we follow van der Mensbrugghe (2005) approach, whereby wages are allowed to be both sector and skill-specific with respective cross-skill substitution elasticities. Specification for labour supply presented in Equations (1) and (2) represent the labour supply growth in rural and urban areas, respectively.

\[ L_{l,Rur}^S = \left(1 + g_{l,Rur}^L\right)L_{l,Rur,-1}^S - Migr_l \]  \hspace{1cm} (1)

\[ L_{l, Urb}^S = (1 + g_{l, Urb}^L)L_{l,Urb,-1}^S + Migr_l \]  \hspace{1cm} (2)

Where:
- \( g \) is the natural growth of labour in urban/rural area
- \( Migr \) refers to the internal migration of labour,
- \( l \) refers to the different labour categories

The main aspect of this study is analysing minimum wage effects by applying the idea of migration of labour where labour migrates from rural to urban areas on basis of higher expected wages in the later. This has been applied in similar models, described earlier, whereby workers migrate from one region to another on the basis of expected wages in the destination area compared to their origin. It is expected that unskilled and semiskilled workers migrate to urban areas in search of higher wages in the industrial sectors, mainly in manufacturing and construction, and when unable to find work they move to other sectors that largely informal such as retail trade activities. The migration we are modelling is therefore location and sector specific.

The equations 3 and 5 determine migration. Equation 3 defines the expected average wage rate, \( AWAGE \), in both the rural and urban zones. It is the weighted average of the sector-specific net wage (net of tax), weighted by actual sectoral labor demand within each zone. The average wage is adjusted by the probability of finding employment in the respective zone, i.e. one minus the rate of unemployment. Equation 5 determines rural to urban migration, \( MIGR \). It is a function of the expected urban wage relative to the expected rural wage. Thus the average wage in each sector is
multiplied by the probability of finding employment as measured by 1 minus the unemployment rate, UE. The migration determining equations can be expressed as:

$$AWAGE_{l,gz} = (1 - UE_{l,gz}) \frac{\sum_{i \in gz} NW_{i,l} L_{i,l}^d}{\sum_{i \in gz} L_{i,l}^d}$$

(3)

Where:

$AWAGE$ is the expected average wage for urban and rural areas for each labour type ($l$) in urban or rural area.

UE is the unemployment rate for urban/rural areas;

$$UE_{l,gz} = \frac{L_{i,gz} - \sum_{i \in gz} L_{i,l}^d}{L_{i,l}^s} \geq 0$$

(4)

Where:

$UE_{l,gz}$ - Unemployment rate

$L_{i,l}^d$ - labour demand in sector $i$ for type $l$ labour

$L_{i,l}^s$ - type $l$ labour supply in each area ($gz$)

$NW_{i,l}$ is the net wage for sector $i$ for labour type $l$

$$MIGR_l = \chi_l^{migr} \left( \frac{AWAGE_{l,Urb}}{AWAGE_{l,Rur}} \right)^{\omega_l^m}$$

if $\omega_l^m \neq \infty$

(5)

Where:

$\omega_l^m$ - elasticity of migration with respect to minimum wages

$\chi_l^{migr}$ - migration function shift parameter

The migration function is deleted from the model specification if there is an integrated labor market, i.e. if $\omega_l^m$ is infinite. As has been applied in other similar studies (Dorosh and Thurlow, 2009) the migration rate in year $t$ (from region 1 to region 2) is equal to the initial migration rate (base year 2009) multiplied by differences in the wages between two regions. The impact of a policy on migration is often varied based on the elasticity values used. For example, Flaig et al (2014) found that with very inelastic (0.1) and very elastic (5) migration elasticity produce very
different effects. In the absence of recent estimates for Kenya, the study will experiment with values within that range. Zero elasticity would imply that there is no migration which in reality is not the case. Unemployment in the model is introduced through a wage curve implying a negative relationship between wages and unemployment. The implication is that the response of factor markets to changes in prices is decreased, that is, the nested structure reduces the extent of substitution possibilities and the migration functions further reduce substitution possibilities that negatively relates wages and unemployment for unskilled and medium skilled workers in some sectors (Blanchflower and Oswald 1995). In the model, the minimum wage is determined endogenously.

The minimum wage equation is given as:

$$\text{WMIN}_{l, gz} = \chi_{l, gz}^{wmin} PLEV^{\omega_p} \left( \frac{1 + g^y}{1 + g^{pop}} \right)^{\omega_p} (1 - UE_{l, gz})^{\omega_p}$$

*Where:*

- $\chi_{l, gz}^{wmin}$: the minimum wage shift parameter
- $W_{l, gz}^{ue}$: elasticity of minimum wage with respect to the unemployment rate
- $g^y$: GDP growth rate
- $g^{pop}$: population growth rate
- $W_{l, gz}^p$: elasticity of minimum wage wrt price level
- $W_{l, gz}^y$: elasticity of minimum wage wrt GDP growth rate

With this specification, the basic idea that is being implemented in the study is to have detailed labour market categories, to assess the impact of the simulations described. The detailed disaggregation of the labor market with several labor categories will provide a rich analysis. Possible subsequent linking the results to a micro-simulation model will provide analysis for the poverty and income distributional consequences of the policies described.
Simulations

To address the research questions, the study proposes to conduct two policy simulations; increasing sector specific minimum wages and a reduction in tax for agricultural production.

Simulation I: Changes in unskilled formal sector wage in urban areas

The simulation set up in the model, is a shock of a percentage increase and decrease in the unskilled formal labour wage bill in urban and rural areas. The rationale is that generally unskilled minimum wages in urban areas are set higher than the in rural areas. This translates to a higher wage bill for this category of workers. Minimum wages have also been almost fully enforced in the urban formal sector. The increases will be implemented at different scope. For example, first, we would raise the wage bill for the industrial- food and textile manufacturing sectors, for both male workers and female workers in the same proportion in the formal sector. While this is informed by higher costs of living, the observed trend has been a rise in labour supply and migration of a proportion of workers from rural to urban areas. Secondly, we raise the average wages in rural areas, by reducing the comparative wage, that is, the relative cost of unskilled labour in urban areas. The underlying assumption is that covered labour (formal sector workers) is mobile across sectors. Because of higher substitutability of unskilled labour for the composite labour, there will be incentives for producers to employ less of the skilled labour to cut costs. In the closure rules for this simulation, labour supply will be fixed for labour categories with higher wages and allow mobility to lower wage sectors.

Simulation 2; Changes in labour productivity

Labour switching costs between regions (urban and rural) by workers has been found to have is similar effects to increasing labour productivity, and the latter is identified as a viable policy option for rural development (Suttiwichienchot and Puttanapong, 2014). In this study we shall simulate both an increase and decrease in labour productivity. As discussed earlier, this simulation result of this lowering switching cost is compared with the result of simulating the increasing labor productivity, which is the most common recommendation towards the improvement of the production capability.

Income distribution and poverty analysis

Given the implications of changes in the labour market on nominal income and prices, the study will evaluate their implications of the simulations on poverty. To do this, the study will conduct a micro simulation analysis where changes in the CGE model are linked to the household model from and data in order to trace how the project benefits and costs filter into both household and regional economy.
4.0 Data requirements and sources
Social Accounting Matrix (SAM)

The study will use a Social Accounting Matrix (SAM) for 2009 developed by the team. This study shall aggregate productive sectors into; Agriculture, Mining and quarrying, Food processing, Manufacturing, Building and Construction, Electricity and Water, Wholesale and Retail Trade and Hotels, Transport and Communication, Finance, Education, Health, and Other Community and Personal Service activities. The SAM is disaggregated into SAM is by location; rural and urban, with 20 households by income quintile and sector while the labour market is disaggregated between skilled, semiskilled and unskilled labour.

To disaggregate the SAM other data notably regional output data that is available will be used to distinguish the activities between rural and urban areas. Activities in the SAM are distributed between the two regions based on data from household survey data, a 2010 Census of Industrial Production (CIP), the 2010 Integrated Survey of Services (ISS), and the 2009 Kenya Population and Housing Census (KPHC).

Disaggregation of labour is made by skill (unskilled, semiskilled, skilled), males and females and between formal or informal employed. Households are disaggregated in urban and rural and into deciles in each area based on income levels (deciles for each region). There are therefore 20 household groups. Other additional data will be the projections of changes in labour composition; skills level, and employment, rural-urban migration and population projections, and projected GDP growth rate.

Table 2: Structure of the economy in 2009

<table>
<thead>
<tr>
<th>Item</th>
<th>Value (KSh million)</th>
<th>% of GDP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Private consumption</td>
<td>2,209,067</td>
<td>77.4%</td>
</tr>
<tr>
<td>Fixed investment</td>
<td>500,093</td>
<td>17.5%</td>
</tr>
<tr>
<td>Inventory changes</td>
<td>(1,932)</td>
<td>-0.1%</td>
</tr>
<tr>
<td>Government consumption</td>
<td>455,478</td>
<td>16.0%</td>
</tr>
<tr>
<td>Exports</td>
<td>573,592</td>
<td>20.1%</td>
</tr>
<tr>
<td>Imports</td>
<td>882,667</td>
<td>30.9%</td>
</tr>
<tr>
<td>GDP (market prices)</td>
<td>2,853,630</td>
<td></td>
</tr>
</tbody>
</table>

Source: KNBS

The latest comprehensive household survey that will be used is the Kenya Integrated Household Budget Survey (KINBS) 2005/06 collected data nationwide on composition expenditures and labour force, the labour module in KIHBS is adequate as it captures the activities classification, wages and salaries, and a distinction between formal and informal employment can be captured. This is the data to be used for the income distribution and poverty analysis. The household survey
data includes data on other non-wage income and hence will be helpful in distribution analysis. Whereas the survey data seems outdated to relate, it is the only data available to be used for the study. Other data that are not calibrated in the model, such as elasticities will be obtained from secondary sources notably studies estimating, or that have used such data.
### 5.0 Consulted users and policy influence plan

#### 5.1 Consulted users of the study

The following institutions and persons have been contacted in the preparation of this proposal for their ideas on labor market challenges and for dissemination of a completed report of the research for effective policy making, monitoring and evaluation.

<table>
<thead>
<tr>
<th>Institution</th>
<th>Contact</th>
<th>Target</th>
</tr>
</thead>
</table>
| Ministry of Labor, Social Security and Services Central Planning and Monitoring Unit (CPMU) | Mrs Winnie Karingithi  
Principal economist and Chair;  
Labour Sector Working Group Head, CPMU  
Email: wkaringithi@yahoo.com  
Telephone: +254722775934 | She acts as the co-chair of the labor sector working group, the key targeted user for the findings from the study. The draft proposal was shared, received comments and incorporated in proposal.                                                                                                                                                     |
| Ministry of Labour, Social Security and Services | Charles Ombuki  
Economist  
+254724715499  
charlesnyariki@yahoo.com | Federation of Kenya Employers, Central Organization of Trade Unions (COTU)  
-Provided comments on the proposal  
- Paper scheduled for presentation after approval by                                                                                                                                                                                                                          |
| Macro Working Group                           | Jamshed Ali  
Economist- Macroeconomic Planning directorate  
Email: jamshed@treasury.go.ke | Study concept and paper presented in March 2015. Comments were received and considered in revision of the paper. As senior economist/policy analysts in public institutions designed to inform policy, the group gave useful comments used to revise the strategy of the proposal. Ministries of; Planning and Devolution, National Treasury, Departments; revenue authority (KRA), Kenya Institute for Public Policy Research and Analysis (KIPPPRA). |
| Salaries and Remuneration Commission(SRC)     | Dr. David Muthaka  
Policy Analyst  
dmuthaka@yahoo.com | Commission sits in wage council meetings.                                                                                                                                                                                                                                                                                               |
| Universities; Kenyatta University, Department of Applied Economics | Dr. Jacob Omolo  
Lecturer and labour specialist  
Tel. +254722602501 | Individual versed with the Kenyan labour market. An author of various reports/papers on the wage policies in Kenya                                                                                                                                                                                                                     |
5.2 Policy influence plan

Labour sector working group
The group which constitutes government officials from various relevant government ministries, departments, and a public policy organization (Kenya Institute for Public Policy Research and Analysis-KIPPRA) representatives of trade unions (COTU) and employers (FKE). The group is wholly in charge of setting up of medium term and long term development objectives for the sector, and advices senior government officers on labor markets issues through policy briefs. The results of the study will be communicated through their regular quarterly Labor Sector meetings since the Co-chair (the working group is chaired by the Minister for Labor) is open to research output that can inform and track the development of the sector.

Presentations at wage council meetings
Draft paper has been shared with the Ministry of Labour, Social Security and Services. The staff gave comments and advised for the paper’s policy findings be presented at wage council meetings. The Central Planning and Monitoring Unit(CPMU) will facilitate the process. Initial discussions have been held with the necessary staff. These include ongoing consultations, for approved by the Principal Secretary, Ministry of labour and the labour commission to be allowed to present the study ideas in wage council meetings. This will enhance policy discussions and allow a wider audience and the contribution by various stakeholders including Central Organization of Trade Unions (COTU), Federation of Kenya Employers (FKE), Ministry of Labour among others.

Macro working group
The team shared the proposal ideas with the group through a presentation in a meeting held at Treasury building on 23rd March 2015. Useful comments were received that have helped improve the proposed study.

Researchers in academic institutions
The local universities regularly arrange and conducts seminars for dissemination and information to faculty and staff on ongoing research activities. We intend to use this avenue to create awareness and receive input and comments from the School of preliminary results and also submit final report of the study to the School to be distributed in the library and online channels. This will highlight the need for exchange of knowledge and debate on labor and economic policy modeling.

Seminar and the media
With the finalization of the research, the team will make available the results of the report for presentation in a media relevant format to reach a wider audience with interest in the subject matter notably to institutions such as the Federation of Kenya Employers (FKE), Kenya Private Sector Alliance (KEPSA) and the Central Organisation of Trade Unions (COTU).
PEP Dissemination activities
The findings of the study would be made available to the public through a final report, a PEP working paper and policy brief.

6.0 Team members

<table>
<thead>
<tr>
<th>Name</th>
<th>Age</th>
<th>Sex (M,F)</th>
<th>Training and experience</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tabitha Mwangi</td>
<td>37</td>
<td>F</td>
<td>Doctoral candidate in Economics at University of Nairobi with research interests on growth and inequality dynamics. Have attended training in CGE modelling and data manipulations.</td>
</tr>
<tr>
<td>Florence Simiyu</td>
<td>40</td>
<td>F</td>
<td>Doctoral candidate in Economics at University of Nairobi. Experienced in data management and proposal design. Lecturer of economics and mathematics.</td>
</tr>
<tr>
<td>Albert Onderi</td>
<td>35</td>
<td>M</td>
<td>Postgraduate student in Master of Science (MSc) in Research Methods and Methodology and experienced in large data set analysis.</td>
</tr>
</tbody>
</table>

7.0 Expected capacity building
The team expects to gain and increase their knowledge building a CGE model with this study on the operation and impact of minimum wages in the country. Two members of the team have had no prior training on CGE and have expressed interest in the research methods. The team hopes to benefit from expertise of PEP resource persons as well as trainings and hands-on experience with CGE models. Similarly, with successful application of the methods that the study proposes notably developing a model with migration of labour and poverty analysis will equip them with skills and knowledge to extend their research interests further.

<table>
<thead>
<tr>
<th>Name</th>
<th>Task/contributions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tabitha Mwangi</td>
<td>Developing proposal, literature review, SAM building, and modeling, analysis of results and presentation of results. Initiate contact with for policy outreach.</td>
</tr>
<tr>
<td>Florence Simiyu</td>
<td>Development of proposal, literature review, SAM disaggregations, and analysis of results. Has received training on the SAM and she has keen interest in developing knowledge of CGE modeling. Make contacts for policy outreach.</td>
</tr>
</tbody>
</table>
Albert Onderi  | Literature review, data analysis for SAM building and other household data analysis. Make contacts for policy outreach. And presentation results.

### 8.0 List of past, current or pending projects in related areas involving team members

<table>
<thead>
<tr>
<th>Name of funding institution</th>
<th>Title of project</th>
<th>Team members involved</th>
</tr>
</thead>
<tbody>
<tr>
<td>DANIDA</td>
<td>Exploring Kenya’s Inequality; Pulling Apart or Pooling Together</td>
<td>Tabitha Mwangi</td>
</tr>
<tr>
<td></td>
<td><a href="http://inequalities.sidint.net/kenya/national/">http://inequalities.sidint.net/kenya/national/</a></td>
<td></td>
</tr>
</tbody>
</table>

### 9.0 Describe any ethical, social, gender or environmental issues or risks that should be noted in relation to your proposed research project.

None to the best of our knowledge.
References


Boeters, Stefan and Michael Feil (2009), Heterogeneous labor markets in a microsimulation-AGE model: Application to welfare reform in Germany, Computational Economics, 33, 305–335.


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