



## Report of the latest developments from the project “Women’s economic empowerment and control over time: a macro-, meso-, and micro-level study of the determinants of women’s control over their time in sub-Saharan Africa”

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### Introduction

Our efforts, along with those of our country partners, have so far been focused on the process of assessing the quality of statistical matching algorithms, reviewing literature on measures of decision-making power and patriarchy, and on obtaining data. For the latter, we have attained all the required datasets, except for a household budget survey for Mali and the new time use survey for Tanzania. We are also collecting auxiliary data (such as female representation in local and regional governments) for all five countries in the study.

### Statistical Matching

For the current project, we will create synthetic datasets that link data from household budget surveys and Demographic Health Surveys (DHS) to time use surveys across all countries. To maximize the quality of the match, we have developed a new algorithm that combines principal component analysis (PCA) and cluster analysis (CA) for the creation of strata variables for the statistical matching implementation. PCA is used to identify components that best summarize many individual and household level characteristics. The selected principal components are then used to identify similar groups using partition cluster analysis. The new algorithm implements a rank statistical matching approach, using a weight splitting strategy. This allows us to transfer and compare information across surveys more easily.

### Women’s Decision-Making Power

We have completed reviews of the country and region-specific studies that have explored the determinants of decision-making power of women in Sub-Saharan Africa. We are now drafting a broader literature review that combines the country-specific reviews. We first present an overview of theoretical approaches to the impact of women’s empowerment, bargaining power, and autonomy on decision-making. Then, we present a survey of empirical analyses for both the broader region and for each of the countries in the project. Our research has shown that there have been very few attempts within these countries to analyze the determinants of decision-making power of women. Among the studies that exist a few have used qualitative data, some have collected their own data, and some have used country specific survey data.

Only a few studies that utilize the DHS have been found and most of them focus on the health aspects of decision-making. In the case of Tanzania, Van Aelst (2014) uses general statistics from the DHS to discuss women’s decision-making power. Similarly, Kishor and Subaiya (2008) do a comparative analysis of DHS data for multiple countries, including Ghana and Mali. Also, for Mali, Upadhyay and Karasek (2012) use the DHS to explore the correlations between women’s decision-making and fertility. In the context of Ghana, Boateng et al. (2014) explore the impact of education on women’s decision-making power while Darteh, Doku, and Esia-Donkoh (2014) explore the determinants of women’s autonomy over their reproductive health. For Ethiopia, we found two studies utilize the DHS to investigate this issue. Ebrahim and Atteraya (2019) have explored the association between domestic violence and women’s decision-making autonomy while Edossa, Debela and Mizana (2020) assess women’s decision-making status on contraceptive use.

### Measures of Patriarchy

Our research aims to assess the macro-, meso-, and micro-level determinants of an individual’s decision-making power over the use of their time. Our initial research points to the importance of a subset of meso-level factors that may be considered as shaping the meso-level strength of patriarchy. Building on the work of historians of family and feminist theorists, we hypothesize that patriarchy at the meso- or community-level is a social force that operates in multiple and interdependent spheres. One sphere relates to the objective factors that describe the living arrangements (e.g., the prevalence of patrilocal) and marriage patterns (e.g., the median age of first marriage among ever-married individuals) in the community. The ideological sphere consists of the dominant values or perceptions that the community holds regarding gender roles and attitudes. For example, most individuals may believe that it is never justifiable for a man to be given priority over a woman in obtaining higher education regardless of their aptitude or credentials. Finally, there are material practices that occur in the form of individual or collective action that can strengthen or weaken patriarchy (e.g., the incidence of domestic violence or the percentage of women belonging to a women’s organization advocating equal rights in the community). Our research is currently constructing measures that capture the meso-level variations in the spheres of patriarchy within each country included in our study. We will present the initial results at an upcoming international conference.

### References

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