Preparing for the New Economy:

How Females Can Continue to Close the Labor Force Participation Gap

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Abstract:

Since the 1950’s, women in the United States have decreased the gap of Labor Force Participation Rates (LFPR) by more than 60 percent (FRED 2018) and the trend is fascinating. In this study, we intend to dissect the historical incentives and factors for both men and women to participate in the labor force. Documentation in the literature reveals the natural evolution of an economy –where dependent upon a society's’ level of economic growth– the typical chronological order observed is: hunting-gathering, agriculture, manufacturing, and service (Urquhart 1984). Throughout each phase of an economy, the entities (firms, workers, or geographic areas) with comparative (relative) advantage in the intensively used skill set tend to outperform their competitors. These economy-wide structural changes lead to massive redistributions of valuable skills, labor force participation, and income. Although the potential factors leading to the convergence of female and male LFPR are vast, we attribute this trend to three main areas: the rise of the service industry, real wage increases of females relative to males, and differences in marginal returns to higher education. Using the legendary Kuznets Curve (Kuznets 1955) as inspiration which has been used by previous researchers to regress income per capita on labor force participation rates (Doğan, Akyüz 2017), we estimate linear regression models for both sexes across time with goals of identifying which factors contribute significant marginal effects to LFPR. Once those significant factors have been statistically identified, we extend our scope towards the future and focus on very recent developments in the areas of Science, Technology, Engineering, and Mathematics or “STEM”. The questions that must be asked are, “If males had comparative advantage in manufacturing, and *if* females have had comparative advantage in service, who will have an advantage in the what seems to be a rising innovation and quantitative economy? Who is better prepared? Are the skill sets that have allowed women to prosper in the service sector still valuable in an evolving labor market?” Historical trends and these forward-looking questions are what we will attempt give valuable insights on.

One of the main determinants for an economy’s labor force participation rate is some proxy for economic growth. In the context of this paper we focus on the relative real wage between females and males denoted as (wf / wm). In the 1960’s, females on average earned 55% of what men earned; whereas in 2016 the ratio has increased to nearly 80% (AAUW 2017). Though the ratio has increased over time, it has increased at a decreasing rate over the past few years. Historically, these difference in earnings have been attributed to gaps in education level, experience, and job selection. In our paper, we will explore the rates of returns on education for males and females to search for trends across time and specific majors or occupations that have outperformed the others.

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