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## How Gender Norms Impact Women's Access to Financial Inclusion

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**How Gender Norms Impact Women's Access to Financial Inclusion**

**By**

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**An Honors Thesis in partial fulfillment of the requirements for the degree Bachelor of  
Science in International Business, concentration in Finance**

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## **Introduction**

The purpose of this paper is to address whether or not gender norms hinder women's ability to utilize financial products. Currently, women experience poverty more frequently than men – in part due to regulations and customs that inhibit the opportunities women have to generate income, their ability to own assets, and their power to make household purchases (United Nations, 2015). It is important that women have the ability to utilize financial resources as those resources can assist with reducing poverty levels and can influence women empowerment (Holloway, Rouse, & Niazi, 2017). One issue, despite the benefits of financial inclusion, is that women experience lower levels of financial inclusion than men. As of 2017, 72.3% of men globally own an account as opposed to just 64.8% of women (Demirgüç-Kunt, et al., 2018). This gap in account ownership is exacerbated when looking at specific regions across the globe. In the Middle East and North Africa, an 18.8% gap in account ownership exists between men and women and a 10.7% gap exists in South Asia (Demirgüç-Kunt, et al., 2018). Based on a literature review by the International Center for Research on Women, I hypothesize that gender norms are inhibiting women's ability to achieve financial inclusion. If numerous studies claim that inadequate education, lack of a job, and lack of decision making power are barriers to financial inclusion (Gammage, et al., 2017), then the gender norms that discourage women from pursuing education, from obtaining jobs, and from having the same rights as men could be preventing women from having the basic tools necessary to utilize financial resources.

To test this hypothesis, I utilize data from The World Bank databank and the World Values Survey for 49 different countries and I analyze the correlation between the percent of females who have a financial institution or mobile money account and different gender norms. I also include control variables surrounding the GDP of the country, strength of legal systems, and

the majority religion in each country as those factors might influence how many women have a financial account regardless of the norms that are present.

After analyzing the data, I found that a correlation does exist between some of the gender norms and female account ownership; however, I experienced problems of multicollinearity in my results. To account for this, I ran each gender norm independently against female account ownership and was able to find statistically significant correlations for the norms surrounding employment and overall equal rights. Based on the regression, there is a decrease in the percentage of women who have a financial institution account or a mobile money account when more citizens believe that men have more of a right to a job than a women. Additionally, as more people view equal rights as a key element to democracy, the probability of a woman owning an account increases.

To further elaborate on this topic, this paper is broken in to distinct sections. First, I provide background on the topic and why this topic is important. Then, I discuss the data I used and the empirical strategy used to interpret the data. Lastly, I provide avenues for further research surrounding this topic and conclude with final implications of my results.

## **Background**

Addressing gender disparities in terms of financial inclusion is important as previous studies indicate that greater gender equality can lead to overall improved economic development (Schwab, et al., 2017). When women are financially included, they are better able to react to shocks and to pursue entrepreneurial activities (Holloway, Rouse, & Niazi, 2017). Also, Economic equity between genders has the potential to increase the world GDP by over US\$5 trillion (Schwab, et al., 2017).

The problems with the gender gap in financial access go beyond just the existence of a gap in account ownership. Not only is there a gap, but the gap has not changed in recent years despite an increase in availability of financial services (Demirgüç-Kunt, et al., 2017). This indicates that supply of financial resources is not the only factor impacting women's ability to obtain financial inclusion. Also, according to the Global Findex database, women borrow less than men, save less than men, and have greater difficulty finding emergency funds (Demirgüç-Kunt, et al., 2018). If women are not able to save or borrow money, then that could inhibit their ability to start businesses or simply have the funds necessary to cover basic needs. This lack of participation in the financial system not only hurts women, but countries are experiencing difficulty improving statistics for overall growth as the small percentage of women participating in finance lowers the average participation rate for the country (Demirgüç-Kunt, et al., 2017).

To justify my hypothesis, it is important to look at what barriers exist to financial inclusion in general and then analyze how gender norms relate to those barriers. Currently, research suggests that individuals lacking financial inclusion are typically those who have little education and those who believe the cost of owning an account is too high (Demirgüç-Kunt, et al., 2017). In terms of education, a study published in *The Review of Financial Studies* indicates that "education increases financial market participation...while dramatically reducing the probability that an individual declares bankruptcy" (Cole, Paulson, & Shastry, 2014). Also, scholarly studies indicate that education level impacts the effectiveness of financial resources in addition to allowing for general access to resources (Gammage, et al., 2017). If education is an important factor in being financially included, then it is prudent to look at how societies across the globe view women obtaining an education. On average across the globe, women fall 5% behind men in the category of educational attainment (Blake & Propson, 2018). In countries such as Pakistan and Lebanon, we see a substantial gap between the number of women enrolled in

primary education and the number of men enrolled in primary education (Blake & Propson, 2018). Part of this gap could be related to the gender norm surrounding the importance of education for women. Less than 15% of survey respondents from the World Values Survey placed a high value on gender equality in terms of education (Inglehart, et. al., 2014). When looking at higher education, 51.1% of people surveyed in Pakistan and 31.1% of people surveyed in Lebanon “strongly agree” or “agree” that a university education is more important for a boy than a girl (Inglehart, et. al., 2014). If education does indeed play a role in financial inclusion and society believes that education is more important for men than for women, then women could face more difficulty accessing finance than men.

Another contributing factor leading to account ownership is having a job or the ability to work. If you do not have a source of income then you likely do not have anything to deposit into an account. According to The World Bank, those individuals who have a job or are seeking a job are more likely to have a financial account than people who do not have a job (Demirgüç-Kunt, et al., 2018). As noted in The World Bank’s FINDEX report, “74% of adults who are active in the labor force have an account, while 59% of those who are out of the labor force have one” (Demirgüç-Kunt, et al., 2018). In several countries, such as Belarus, Nigeria, and China, women are discouraged or prohibited from performing certain jobs (Wood, 2018). With limitations on career paths, it is no surprise that – despite gender equality in the workforce improving in some countries – globally 59% of women are out of the labor force compared to 32% of men being out of the labor force (Demirgüç-Kunt, et al., 2018). Just as we saw with education, if employment better allows for financial inclusion, then women are disadvantaged when society discourages them from working or limits them to lower wage jobs.

Another problem that women may face when it comes to accessing financial is simply having fewer rights than men. In multiple countries across the globe, women lack the ability to make household purchases, to decide what to do with family income, or to utilize certain goods (Gammage, et al., 2017). With advances in digital financial products as means to increase financial inclusion, these unequal rights have the potential to influence a women's ability to utilize these digital products. For example, many digital products require a mobile phone (Holloway, Rouse, & Niazi, 2017). In a study conducted in India, some women were given a phone to see how it improved their use of a financial account. However, some of the women's husbands made them return the phones (Gammage, et al., 2017). In countries such as Afghanistan and Bangladesh, the husbands are more likely to make decisions on major household purchases than the wives (Demirgüç-Kunt, et al., 2018). Even if a woman was allowed to own a phone, it would be difficult for her to purchase one without a stable source of income. This difficulty can be seen in the 14% gap that exists between mobile phone ownership of adults in locations with higher incomes than those in locations with lower incomes (Demirgüç-Kunt, et al., 2018). Additionally, in lower income countries, women are 10% less likely to own a mobile phone than men (Demirgüç-Kunt, et al., 2018).

Also, utilizing a mobile phone requires at least some knowledge of literacy (Tadesse & Bahiigwa, 2015). The mobile money account may come with certain rules and messages, and if an individual cannot read, then that information does not help that person. For digital finance to be useful, it "needs to be tailored to the needs of disadvantaged groups...who may have low literacy and numeracy skills" (Demirgüç-Kunt, et al., 2018).

Ultimately, if women are discouraged from obtaining an education, a job, and have fewer rights than men, then they may not be able to utilize the available financial resources.



## **Data**

### World Bank Data

In order to test whether or not a correlation exists between gender norms and account ownership, I will combine data from two different sources that encompass 49 different countries across the world.<sup>1</sup> The first data set comes from The World Bank Global Financial Inclusion database. I pulled the percentage of women who have an account at a financial institution or a mobile money account for the year 2014 across 49 different countries (Demirgüç-Kunt, et al., 2018). The data set refers to women aged 15 or over who stated they have a bank or financial institution account or they used a mobile account within the previous year (World Development Indicators, The World Bank). In terms of the data collection, different surveys were used depending on the country. The majority of the countries used either a Multiple Indicator Cluster Survey, Demographic and Health Survey, or Integrated Household Survey (World Development Indicators, The World Bank). While The World Bank attempts to collect accurate and up-to-date data, not every country has current, available data. Therefore, the countries chosen are the ones where complete data existed for the variable.

### World Values Survey

The rest of the data come from the World Values Survey. These data are collected by a group of social scientists and they follow set rules and procedures for collecting data.<sup>2</sup> The goal of this survey is to use high-level research to record people's beliefs and values across the globe (Inglehart, et. al., 2014). The data collected from this survey include information on the values that people find important and their viewpoints regarding different social issues. The data are

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<sup>1</sup> See Appendix A for list of countries

<sup>2</sup> See Appendix B for sample survey questions

typically collected from an in-person interview from a representative sample of the population and a minimum number of respondents must be interviewed in each country (Inglehart, et. al., 2014). This is useful as we know that the aggregate responses should adequately capture the beliefs and values of each country. Additionally, these data have been utilized to address a wide variety of subjects including gender equality, religion, and democracy (Inglehart, et. al., 2014). Those creating the World Values Survey have surveyed approximately 400,000 individuals and have surveyed in numerous countries across multiple income levels (Inglehart, et. al., 2014). The data are collected in waves; therefore, I used the data from Wave 6 (2010-2014) so as to match the data pulled from The World Bank databank.

Using data from these two sources, I am able to test the hypothesis the gender norms impact women's access to finance. I hypothesize that female account ownership will decline as more people believe that men have more of a right to jobs and education than women. Additionally, I hypothesize that as people place greater value on equal rights between men and women, the percentage of women with account ownership will increase. The survey questions that I pull data from are as follows:

1. "A university education is more important for a boy than a girl"
2. "When jobs are scarce, a boy has more right to a job than a girl"
3. "Democracy: men and women have the same rights"

For questions 1 and 2, I use the percentage of respondents who indicated that they "agree" or "strongly agree" with the statements. For question 3, respondents indicated if they believe equal rights are an important part of democracy by providing a ranking between 1 and 10 – with 1 meaning it is not important for men and women to have the same rights and 10 being equal rights between men and women are an essential value. For these data, I used the mean score for each country.

## Empirical Strategy

By using the same countries in both data sets in the same range of time, I was able to perform a Multiple Regression Analysis to test for correlation between gender norms and account ownership. The specific equation used for the regression is as follows:

$$\text{Female account ownership} = \beta_0 + \beta_1(\text{Norm: Male Edu}) + \beta_2(\text{Norm: Job}) + \beta_3(\text{Norm: Equ.Rights}) + \beta_4(\text{Important: Religion}) + \beta_5(\text{Majority Religion: Protestant}) + \beta_6(\text{Majority Religion: Catholic}) + \beta_7(\text{Majority Religion: Islam}) + \beta_8(\text{Strength of Legal Rights}) + \beta_9(\text{Total Account Ownership}) + \beta_{10}(\text{GDP}) + \beta_{11}(\text{Mean Age}) + \beta_{12}(\text{Net Enroll: L Secondary}) + \mu$$

In terms of the regression equation, female account ownership is the dependent variable.  $\beta_1$  through  $\beta_7$  represent the coefficients to the independent variables which are listed in parenthesis. In addition to our variables regarding gender norms and equality, I added some control variables in attempt to address exogenous factors in the model.

I added the type of religion that an individual practices and the importance of that religion in his or her life as those could impact that person's propensity to have an account based on how those values guide beliefs regarding financial institutions (Aluko & Ajayi, 2018). Another variable I added as a control variable is the strength of legal systems as individuals may be less inclined to keep their money in a financial account if they are worried for the safety of their funds due to improper legal protections (Aluko & Ajayi, 2018). Third, I added a control for the total percentage of people age 15+ who have an account to help identify if financial access is limited to everyone in the country rather than just the women. Next, I added GDP per capita of each country in terms of international dollars, PPP (Demirgüç-Kunt, et al., 2018). This is to address the notion that the financial status of the country may impact the number of citizens with the need or desire to obtain an account. Fifth, I added the average age of survey participants as a person's age may have an impact on what their views are as well as their need or desire to have a

financial account. Lastly, I included the percentage of the population enrolled in lower secondary education to address the overall emphasis of education in each country.

Using the statistical software Stata, I was able to solve this regression equation. In addition to calculating the regression for all three norms and the control variables, each norm was regressed individually against the percentage of women who have an account. This allowed me to note how the effects of the norms might change as more variables are introduced into the equation. Since the data on the norms were collected using individual survey responses, I needed to aggregate the individual level data so that it could represent the beliefs of the country as a whole. Using the Online Analysis Tool on the World Values Survey database, I was able to look at the norms in question and see each available answer choice. For each choice, I could see the percentage of people in each country that chose a particular answer. This answer was calculated by adding up the total number of respondents who chose a particular answer and dividing by the total number of surveys collected in that country.<sup>3</sup>

$$(\text{Percent of people selecting an answer choice})_n = \frac{(\text{Number of cases for answer choice})_n}{N}$$

Example: “a university education is more important for a boy than a girl”

|                   | Number of cases | %/Total |
|-------------------|-----------------|---------|
| Agree strongly    | 54              | 5.2%    |
| Agree             | 122             | 11.8%   |
| Disagree          | 445             | 43.2%   |
| Strongly disagree | 369             | 35.8%   |
| No answer         | 5               | 0.5%    |
| Don't know        | 36              | 3.5%    |
| (N)               | (1,030)         | 100%    |

(Inglehart, et. al., 2014)

One item to note when looking at the sample size for the surveys is that they are not all exactly the same size. Some countries have more survey responses than others; however, the countries average a sample size of 1,500 participants and, according to the survey collectors, the value of N will not significantly influence the analysis (Inglehart, et. al., 2014).

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<sup>3</sup> N represents the total number of surveys collected

For the norm regarding education, I added the percentages for “Agree strongly” and “Agree” together and considered those to both fall under the category of “Agree” as I wanted to capture any form of agreement. Additionally, I combined them because one person’s interpretation of the word “strongly” could differ from another person’s interpretation of the word.

For questions that required answers on a scale of 1-10, such as the importance of equal rights, I used the mean score to capture each country’s view of the norm. The mean score is calculated using three steps.<sup>4</sup>

1.  $\text{Percent}_{x_n} = \frac{(\text{Number of Cases})_{x_n}}{\text{Base } N}$
2.  $(\text{Weight of scale number})_{x_n} = \text{Percent}_{x_n} \cdot (\text{Scale number})_{x_n}$
3.  $\text{Mean scale number} = \sum_{n=1}^{n=10} (\text{weight of scale numbers})_{x_n}$

Once the individual norm values were converted to represent the represent the norm values of the countries, I regressed the data against account ownership along with the control variables. The results of the regression can be seen in the table on the next page.

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<sup>4</sup> The Base N removes the surveys that have no response for the question

Table 1. Gender Norms &amp; Account Ownership

|   | (1)                           | (2)                                | (3)   | (4)                  | (5)                 | (6)                               | (7)                                   |
|---|-------------------------------|------------------------------------|---|----------------------|---------------------|-----------------------------------|---------------------------------------|
|   | Male Edu<br>More<br>Important | Men Have<br>more Right<br>to a Job | Norm: Equ.<br>Rights are<br>important<br>for dem. | All 3<br>Norms       | Norms+Religion      | Norms+Strength<br>of Legal Rights | Norms+GDP & Tot.<br>Account Ownership |
| Male Edu More<br>Important                        | -0.369<br>(0.331)             |                                    |   | 0.547<br>(0.166)     | 0.603<br>(0.144)    | 0.615<br>(0.143)                  | 0.972***<br>(0.007)                   |
| Men Have more<br>Right to a Job                   |                               | -0.684***<br>(0.000)               |   | -0.752***<br>(0.000) | -0.654**<br>(0.027) | -0.627**<br>(0.042)               | -0.511*<br>(0.060)                    |
| Norm: Equ.<br>Rights are<br>important for<br>dem. |                               |                                    | 11.32*<br>(0.052)                                 | 5.689<br>(0.322)     | 8.783<br>(0.179)    | 8.344<br>(0.214)                  | 5.498<br>(0.306)                      |
| Important:<br>Religion                            |                               |                                    |   |                      | -0.0473<br>(0.787)  | -0.0625<br>(0.731)                | -0.0261<br>(0.857)                    |
| Majority<br>Religion:<br>Protestant               |                               |                                    |   |                      | 49.69<br>(0.203)    | 47.01<br>(0.241)                  | -21.48<br>(0.542)                     |
| Majority<br>Religion:<br>Catholic                 |                               |                                    |   |                      | -17.85<br>(0.213)   | -16.46<br>(0.271)                 | -15.01<br>(0.208)                     |
| Majority<br>Religion: Islam                       |                               |                                    |   |                      | -5.474<br>(0.624)   | -4.444<br>(0.702)                 | -21.51**<br>(0.040)                   |
| Strength of Legal<br>Rights                       |                               |                                    |   |                      |                     | 0.389<br>(0.701)                  | 0.915<br>(0.303)                      |
| Total Account<br>Ownership                        |                               |                                    |   |                      |                     |                                   | 0.00209<br>(0.984)                    |
| GDP   |                               |                                    |   |                      |                     |                                   | 48.55***<br>(0.000)                   |
| Mean Age  | 3.085***<br>(0.003)           | 2.103***<br>(0.004)                | 2.639***<br>(0.003)                               | 2.395***<br>(0.008)  | 2.136**<br>(0.030)  | 2.201**<br>(0.029)                | 0.853<br>(0.307)                      |
| Net Enroll: L.<br>Secondary                       | 0.713*<br>(0.074)             | 0.775**<br>(0.023)                 | 0.847**<br>(0.033)                                | 0.817**<br>(0.019)   | 0.694**<br>(0.048)  | 0.674*<br>(0.061)                 | 0.560*<br>(0.059)                     |
| _cons   | -128.9**<br>(0.012)           | -79.04**<br>(0.033)                | -221.3***<br>(0.000)                              | -150.5**<br>(0.020)  | -154.0**<br>(0.025) | -154.3**<br>(0.026)               | -281.0***<br>(0.000)                  |
| N   | 46                            | 46                                 | 46  | 46                   | 46                  | 46                                | 46                                    |
| F   | 13.63                         | 22.92                              | 15.36   | 15.81                | 10.40               | 9.235                             | 14.09                                 |
| R-sqr   | 0.571                         | 0.691                              | 0.600   | 0.709                | 0.748               | 0.749                             | 0.851                                 |

*p*-values in parentheses

Used dummy variable to account for missing enrollment data points

Used log of GDP

\* *p*<.1, \*\* *p*<.05, \*\*\* *p*<.01

Column 1 of Table 1 examines the impact of the belief that men have more of a right to an education than women on account ownership. The coefficient of -0.369 indicates that for each percentage increase in the number of people who believe that men deserve more educational opportunities than women, the probability that a woman owns an account decreases by approximately .4 percent. This coefficient, though, is not statistically significant at the 10% level. The level of enrolment in lower secondary education, though, does maintain statistical significance which iterates the idea that there is at least a correlation between educational attainment and account ownership.

Column 2 of Table 1 analyzes how norms surrounding jobs relate to female account ownership. With a coefficient of -.684 and a statistical significance at the 1% level, we can conclude that the greater number of people who believe men have more of a right to a job than a woman, the fewer women who will own a financial institution account or mobile money account. The impact of norms regarding equal rights as crucial elements to democracy is noted in Column 3. Here we see a much larger coefficient than the other two norms with a coefficient of 11.32. The relatively high reward that accompanies improvements in equality should serve as a motivating factor for governments to consider incorporating more laws that protect women's rights. More realistically, though, governments should at least be encouraged to not further limit women's rights as this could correspond to a relatively substantial drop in account ownership. While regressing each norm individually allows for the basic knowledge that norms influence, in some way, women's access to finance, it would be inaccurate to assume that a society only has one type of gender norm present. To gain a more holistic view of how the values of a society influence female account ownership, columns 4 through 7 analyze how the power of the norms change as more factors are added to the equation.

Column 4 starts by regressing the 3 norms together. The results are intriguing as the coefficients for all three norms differ from their individual regressions and the only norm that remains significant is the notion that men have more of a right to a job than women. This suggests multicollinearity exists between the norms (i.e. one gender norm influences the strength or weakness of another gender norm). Despite the lack of significance of the education and equal rights norms, product designers can still focus on how discrimination in the workforce influences the gender gap in financial inclusion.

Columns 5 and 6 introduce variables regarding the importance of religion, the majority religion of the country, and the strength of legal systems in each country. Despite only the job norm, mean age, and net enrollment remaining significant, I want to discuss why these variables control for exogenous factors influencing account ownership. First, empirical studies have indicated that an individual's religious beliefs can influence one's decision to save and invest. Also, certain religions are associated with risk aversion in terms of financial decisions (Renneboog & Spaenjers, 2012). Further literature reviews of empirical studies also note that religion and banking development are negatively related (Aluko & Ajayi, 2018). If the lack of statistical significance of the religious and legal variables can be explained by the relatively small sample of countries and unweighted survey responses, then data in these regressions coincide with empirical research. According to column 5, the more strongly society values religion then the less likely a woman is to have an account. Additionally, empirical evidence exists indicating that legal rights influence financial decisions (Aluko & Ajayi, 2018). For example, a country with only civil law protections tend to have less bureaucratic development (Chong & Zanforlin, 2001). Additionally, a study published in the Journal of Financial Economics provides evidence that supports the idea that credit levels increase as creditors obtain better protections (Djankov, McLiesh, & Shleifer, 2007). Therefore, including information of the strength of legal rights in a



country can help account for people not participating in finance due to wariness surrounding their financial rights. In both of these regressions, the coefficient for the job norm continues to be significant and negatively correlated to account ownership. Thus, it is likely that this gender norm can partially explain the presence of the gender gap in financial inclusion.

Finally, column 7 includes data regarding the GDP per capita of each country (in international dollars, PPP) and the total account ownership in the country. The Global Findex Report indicates that a common reason individuals do not participate in the banking system is the cost (Demirgüç-Kunt, et al., 2017), therefore I included GDP per capita as a control variable to account for those choosing not to obtain an account because the overall economic state of the country lead them to inadequate funds rather than a gender norm leading them to inadequate funds. Additionally, I added the total percentage of people who have financial institution or money market account to further note the influence of GDP on general account ownership. This final regression leads to interesting information regarding the gender norms. First, GDP has a statistically significant impact on account ownership. This is logical as previous data indicate fewer women have accounts in lower income countries than in higher income countries (Demirgüç-Kunt, et al., 2018). Next, the norm that men have more of a right to a university education than women not only becomes significant but also has a positive relationship with female account ownership. One speculative theory for this statistic is that, in a developing economy, overall educational attainment may be low. Therefore, people may believe that men deserve a university education more than a woman, but the men still might not have access to those resources. The norm, in this case, would not create a difference in female vs male educational attainment. The Global Gender Gap Report provides some statistics that inspired this theory as low income countries such as Rwanda and Zimbabwe respectively score a .951 and .986 out of 1 on in terms of gender parity in the category of educational attainment (Schwab, et

al., 2017). Lastly, we cannot overlook the job norm variable. Since the job norm remains significant and the R-squared value for Column 7 indicates that 85% of the variation in female account ownership can be explained by the independent variables listed in column 7, we can conclude that part of my hypothesis was correct in that gender discrimination in terms of employment negatively impacts women's financial access.

### **Avenues for Further Research**

This question presents several opportunities for further research. First, one might look to address the relationship between women being discouraged from education and women being discouraged from working. If these two concepts can be reconciled, then we can potentially understand which privilege more strongly predicts a woman's likelihood of having an account at a financial institution or a mobile money account. Second, one might research if gender norms hinder a woman's ability to utilize digital financial products specifically. Many providers are beginning to focus heavily on digital finance as the transaction costs are often lower and they are able to reach a broader customer base through the use of technology (Baptista & Oliveira, 2015). With this emphasis, it would be interesting to see if there is a difference between women being able to utilize "old fashioned" accounts versus being able to use new digital financial products. In order to accomplish this, more complete data will need to be collected on the number of women who have digital financial products. Also, it may be interesting to collect data over a wider range of countries so as to further validate the quality of the results and the significance of the model. Third, if further research indicates that gender norms inhibit women's ability to utilize a financial account, then researchers should attempt to create financial products that women actually have the ability to utilize. It may be a matter of addressing the gender norms first and improving women's rights overall; however, changing the customs of society could potentially

be a long and difficult process. It may be faster and more effective to create products that women can utilize now that work around the societal barriers she faces. Lastly, another avenue to consider is how gender norms impact access to financial inclusion as a whole. Although the majority of gender norms are inhibitive towards women, there is also the potential for gender norms to adversely impact men. It would be interesting to assess how gender norms influence the number of men with accounts at financial institutions. This research could also encompass whether or not empowerment actually leads to financial inclusion and thus economic growth.

## **Conclusion**

Financial inclusion is touted as a mechanism for improving women empowerment (Gammage, et al., 2017). Additionally, a large gap exists between men and women in terms of financial inclusion – especially in low income countries (Demirgüç-Kunt, et al., 2018). Since women more greatly experience poverty compared to men, this paper attempts to address if gender norms impact women’s ability to obtain a financial institution or mobile money account. Combining data from The World Bank databank as well as the World Values Survey, I was able to perform a regression analysis to test for correlation between gender norms and female account ownership. I found that a correlation most consistently exists between the gender norm regarding a woman’s right to work compared to a man’s right to work. The significance of the norm surrounding equal rights as an important part of democracy holds significance as an individual variable, but that significance is absorbed when additional control variables are added to the equation. Part of the issues with variable significance may be due to the idea that one norm could influence the strength of another norm. Additionally, due to lack of data availability, these regressions were run using only 49 countries. A larger sample size may create more significant statistics.

After controlling for variables such as GDP, religion, and strength of legal systems, it became clear that a multitude of factors influence account ownership and gender norms are not solely responsible for the gap in financial access. However, since the gender norm that discourages women from obtaining a job remains significant across all 7 of the regression columns, emphasis should be placed on encouraging female participation in the workforce. Ultimately, these data have important implications because financial product developers can analyze how employment discrimination impacts a woman's ability to have financial access and can then develop products that can be utilized by a women who is unemployed or has a very low income. If these norms are taken into consideration then it is possible that the financial resources available would become more accessible to women and encourage more women to have financial institution or mobile money accounts.

## Appendix A

### List of Countries used in this Study

|                         |                       |               |
|-------------------------|-----------------------|---------------|
| Algeria                 | India                 | Rwanda        |
| Argentina               | Iraq                  | Singapore     |
| Armenia                 | Japan                 | Slovenia      |
| Australia               | Jordan                | South Africa  |
| Belarus                 | Kazakhstan            | Spain         |
| Brazil                  | Lebanon               | Sweden        |
| Chile                   | Malaysia              | Thailand      |
| China                   | Mexico                | Tunisia       |
| Colombia                | Netherlands           | Turkey        |
| Cyprus                  | New Zealand           | Ukraine       |
| Ecuador                 | Nigeria               | United States |
| Estonia                 | Pakistan              | Uruguay       |
| Georgia                 | Peru                  | Uzbekistan    |
| Germany                 | Philippines           | Yemen, Rep.   |
| Ghana                   | Poland                | Zimbabwe      |
| Haiti                   | Romania               |               |
| Hong Kong SAR,<br>China | Russian<br>Federation |               |

## Appendix B

### Sample Survey

**[SP/GRID]**

Please indicate if you strongly agree, agree, disagree, or strongly disagree with each of the following statements. *(Read out and code one answer for each statement):*

|     |   | Strongly<br>agree | Agree | Disagree | Strongly<br>disagree |
|-----|---|-------------------|-------|----------|----------------------|
| V49 | One of my main goals in life has been to make my parents proud      | 1                 | 2     | 3        | 4                    |
| V50 | When a mother works for pay, the children suffer.                   | 1                 | 2     | 3        | 4                    |
| V51 | On the whole, men make better political leaders than women do.      | 1                 | 2     | 3        | 4                    |
| V52 | A university education is more important for a boy than for a girl. | 1                 | 2     | 3        | 4                    |
| V53 | On the whole, men make better business executives than women do.    | 1                 | 2     | 3        | 4                    |
| V54 | Being a housewife is just as fulfilling as working for pay          | 1                 | 2     | 3        | 4                    |

**[SP/GRID]**

Please indicate if you agree, disagree or neither agree nor disagree with each of the following statements. *(Read out and code one answer for each statement):*

|     |   | Agree | Neithe<br>r | Disagree |
|-----|---|-------|-------------|----------|
| V45 | When jobs are scarce, men should have more right to a job than women.                           | 1     | 2           | 3        |
| V46 | When jobs are scarce, employers should give priority to people of this country over immigrants. | 1     | 2           | 3        |

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