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# THE OPPORTUNITIES AND <br> CHALLENGES FOR FEMALE LABOR FORCE PARTICIPATION IN MOROCCO 

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# B <br> Global Economy and Development 



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# THE OPPORTUNITIES AND CHALLENGES FOR FEMALE LABOR FORCE PARTICIPATION IN MOROCCO 

Yuko Morikawa

## INTRODUCTION: ECONOMIC DEVELOPMENT AND FEMALE LABOR FORCE PARTICIPATION

In the Middle East and North Africa (MENA) region, women remain untapped resources comprising 49 percent of the total population, including more than half of the university students in some countries, and yet make up just 28 percent of the labor force (WB 2004). Morocco is no exception; women make up 50 percent of the population, ${ }^{1} 47$ percent of the tertiary education enrollment, ${ }^{2}$ but only 26 percent of the labor force. ${ }^{3}$ Furthermore, the female labor force participation (FLFP) rate in Morocco declined from 30 percent to 26 percent between 1999 and 2010. ${ }^{4}$ Indeed, the FLFP rate in the MENA region is the lowest in the world (Figure 1). It is important to understand the mechanisms behind this low female participation rate, as higher FLFP rates could lead to higher economic growth in the region. For instance, according to a report by the World Bank, ${ }^{5}$ if FLFP rates were increased to predicted levels calculated from various demographic and economic factors, average household earnings would increase by 25 percent, which would allow many of those households to achieve middle-class status (World Bank 2004).

Many researchers have conducted studies on the relationship between gender inequality and economic de-
velopment. Seguino ${ }^{6}$ makes a rather provocative claim that, in semi-industrialized economies, gender inequality actually promotes economic growth through enhanced investment. Here, gender inequality concerns the wage levels between women and men, translated into higher profitability on investments using low-wage female labor. Although similar arguments are made by Ertürk and Cagata, ${ }^{7}$ Schober ${ }^{8}$ makes a counterargument that gender inequality in wages is not related to higher economic growth. Rather, the impact of gender inequality is negative for growth. In these attempts to explain the relationship between economic development and gender equality, it is important to distinguish the two directions of causality: whether economic development brings about gender equality, or gender equality brings about economic development. According to Duflo, ${ }^{9}$ although we find supporting evidence for both directions of causality, we need to consider policy options, acknowledging neither economic development nor women's empowerment is "the magic bullet" to realizing economic development and gender equality. ${ }^{10}$

In a recent report by the IMF, ${ }^{11}$ a U-shaped relationship between GDP per capita and FLFP rated across countries has been shown. Comparing the datasets for 1980 and 2010, we also find that the average FLFP rate shifted upward over the period.

Figure 1: Female Labor Force Participation Rate, 2002 and 2012 (Percent)


Source: World Bank, World Development Indicator.

When we look at the same graph in 2010 while showing the name of some MENA countries, it is clear that these countries are not in line with the dominant U-shape relationship of FLFP rate and GDP per capita, but remain at the bottom of the U-shape because of low FLFP rates. This seems to indicate the opportunity cost that these MENA countries are paying by not fully utilizing the potential of female labor (see Figure 3).

World Bank data (2004) indicates that the prevailing pattern of economic development in MENAnamely a large proportion of public sector jobs, strong government controls, and inward-looking trade policies—has kept the FLFP rate low in the region. Comparing MENA and East Asia, Klasen et al. ${ }^{12}$ claim that gender gaps in employment explain a larger share of the growth differences between these two regions, suggesting that MENA countries are held back by their low FLFP rates.

Figure 2: Comparison of Female Labor Force Participation Across Countries, 1980 and 2010

Female labor force participation varies with income, with evidence pointing to a U-shaped relationship...


Source: IMF, Women, Work and the Economy.

So why is the FLFP rate so low in Morocco and other MENA countries? What is necessary to achieve higher female labor participation? Drawing on existing literature and statistics, this paper examines three approaches to understanding FLFP in Morocco. The first approach considers the role played by social institutions, such as the legal framework. ${ }^{13}$ The second approach explores supply-side factors, such as sociocultural norms and demographic and household-related characteristics. ${ }^{14}$ The third approach assesses the impact of demand-side
...with cross sectional points shifting upwards over time.

factors on FLFP, including both macro-level analysis focusing on aggregated demand, represented by the unemployment rate, and micro-level analysis on demand from firms or other employers. Building upon the analysis, the paper proposes policy measures to enhance female participation in the Moroccan labor market. Since FLFP rates differ greatly between urban and rural areas, and rural women are mainly engaged in agricultural activities, this paper focuses on urban women.

Figure 3: Female Labor Force Participation Across Countries, 2010


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## SOCIAL INSTITUTIONS AND FLFP

The World Bank's report Women, Business and the Law 2014 indicates that the MENA region had the second-highest proportion of legal restrictions on women in 1960 and the highest proportion today, ${ }^{15}$ which might partly explain the low participation of women in MENA societies. For example, a husband's unilateral right of divorce and a wife's legal obligation to obey her husband may create an additional barrier to women's entry into the labor force. ${ }^{16}$ At the same time, Rauch and Kostyshak ${ }^{17}$ note that MENA's Arab countries have laws that prohibit labor discrimination in the workplace, arguing that the lower level of FLFP has to stem from de facto discrimination rather than from de jure discrimination. This seems to be especially applicable to Morocco. Branisa et al. ${ }^{18}$ calculate the social institution and gender index (SIGI) by considering a country's family code, civil liberties, the physical integrity of citizens, traditional preferences for male offspring, and ownership rights. Morocco is
ranked 43rd among over 100 non-OECD countries, the second-highest ranking for a MENA country after Tunisia. In fact, significant reforms to the Moroccan family law "Moudawana" in 2004 led to a rise in the minimum marriage age for women from 15 to 18 , placed a family under the joint responsibility of both spouses, and eliminated a woman's legal obligation to obey her husband. ${ }^{19}$ However, there remain issues regarding enforcement, as some judges have circumvented the law, while others are still unfamiliar with the amendments. ${ }^{20}$ In 2012, roughly 10 percent of the marriages recorded in Morocco involved a girl under the age of 18, permitted under articles 20 and 21 of "Moudawana," which allow family judges to authorize the marriage of minors. Even though the articles require well-substantiated arguments to justify such marriages, more than 90 percent of requests are authorized. ${ }^{21}$ By removing legal restrictions on women, including those that are implicit, the society would be better prepared for working women.

## SUPPLY-SIDE FACTORS AND FLFP

## Literature review

Among supply-side factors impacting FLFP, $H^{\prime}$ madoun ${ }^{22}$ indicates that religion is a key determinant, with Muslim and Hindu women having a significantly lower participation rate than those of different religious backgrounds. The question of religion was further investigated by Hayo and Caris, ${ }^{23}$ who concluded that traditional identity and its perception of family roles was a more meaningful explanation than religious identity. Carvalho ${ }^{24}$ points out peer effects, proposing a model of social influence in which agents care about the opinions of other members of their community. In Amman, Jordan, Chamlou et al. ${ }^{25}$ find that traditional social norms, measured by the attitude of household members toward working women, reduce female labor participation. As for Morocco, the World Bank ${ }^{26}$ reports that more than 30 percent of young women face obstacles to working because their husband will not allow it, and 23 percent claim that their parents will not. Also, 11 percent of them point to social norms as obstacles. These figures imply that sociocultural norms are one of the strong determinants of young female labor participation in Morocco.

With regard to demographic and household-related factors, Chamlou et al. ${ }^{27}$ argue that women with postsecondary education are more likely to participate, based on the data collected in Amman. In the case of Pakistan, Kiani ${ }^{28}$ shows that education and household expenditures have positive but insignificant impacts on FLFP, whereas household income has a negative impact. Here, higher expenditure has a positive impact as female members would be expected to contribute financially in order to afford the necessary expenditure, while household income has a negative impact because high-income households have less need for
their female members to work. According to a World Bank report on Yemen published in 2014, ${ }^{29}$ unmarried women in urban areas are more likely to participate in the workforce than married women or women in rural areas. This suggests that norms about women's role outside the home may be more strictly enforced after marriage and in more conservative, rural societies. In Morocco's case, Taamouti and Ziroili ${ }^{30}$ examine the relationship between individual factors and FLFP, concluding that for urban women, education is the main determinant of labor market participation.

## Major labor indicators in Morocco

According to official figures published by the Moroccan High Commission of Planning (HCP), the proportion of the employed, unemployed and inactive populations shows variation depending on sex and region. As shown in Figure 4, a large percentage of women, especially in urban areas, are categorized as "inactive," which includes students going to school and those who are out of school and not working. Unemployment here is defined as those who are unemployed and looking for a job. The proportion of unemployed is in general very low, while it is practically zero for rural women. It is important to note that in these figures, employment is defined in its larger sense including part-time and irregular jobs. Even with this broad definition, only 10 percent of urban women are working. Considering recent developments in secondary education for urban girls, this figure remains quite low.

The HCP data reveal a number of challenges:

Youth are disproportionately unemployed. The unemployment rate for youth aged 15 to 24 is more than double ( 19.3 percent) the national level ( 9.2 percent). This is important given the youth made up almost 20 percent of the total population in 2010. ${ }^{31}$ According to

Figure 4: Proportion of Inactive, Unemployed, and Employed Population


World Bank estimates, youth aged 15 to 29 make up 30 percent of the total population and 40 percent of the active population (between ages 15 and 64). ${ }^{32}$

There is a big gap between youth and the older population in their engagement with the labor market, especially for men. Comparing young urban males (aged 15-24) and older urban males (aged 25 and older), more than 70 percent of older males are working, while only 24 percent of their young peers are. A similar gap also exists in rural areas, where 85
percent of the older age group is actively working compared to 54 percent of the younger group.

The gap looks smaller with regard to females, since the proportion of active women is much lower among them. As for urban women, 6 percent of youth are employed, compared to 16 percent among the older age group. The proportion of active rural women is generally higher than urban women, as they are engaged in family agricultural activities.

Figure 5: Proportion of Inactive, Unemployed, and Employed Population Among Youth and Older Age Males


Figure 6: Proportion of Inactive, Unemployed, and Employed Population Among Youth and Older Age Females


Girls are enrolled in lower secondary education as much as boys in urban areas, but there remains a gap between urban and rural areas. As for primary education enrollment rate, Morocco has made great progress, especially among rural girls. As shown in Figure 7, the net enrollment rate for primary education reached more than 95 percent across all categories by 2012. However, a sharp contrast shows up between
urban and rural areas regarding enrollment in lower secondary education. As shown in Figure 8, the net enrollment rate in lower secondary education is around 80 percent for urban boys as well as urban girls, while the rate is much lower at 34 percent for rural boys and even lower ( 26 percent) for rural girls. In terms of urban residents, we see that educational attainment up to lower secondary education is almost equal for boys and girls.

Figure 7: Net Enrollment Rate, Primary Education (Percent)


Figure 8: Net Enrollment Rate, Lower Secondary Education (Percent)


Opportunity cost of low FLFP. As the government and families are investing in education and girls' educational attainment, there is a huge opportunity cost if educated women work much less than their male peers. In addition, according to an OECD report, ${ }^{33}$ boys perform better than girls in mathematics in only 37 out of the 65 countries and economies that participated in PISA 2012, and between 2000 and 2012 the gender gap in reading performancefavoring girls-widened in 11 countries. The results indicate that both boys and girls in all countries can succeed in all three subjects tested by PISA, highlighting the cost that MENA societies including Morocco are paying by not fully realizing the potential of educated females.

## Realities faced by Moroccan young women, drawn from youth survey data

As we saw in the literature review, there are several supply-side factors impacting female participation in the labor market, such as social norms, education and household income. We focus here on data on the urban female population, which shows the lowest rate of labor force participation among categories and describes the realities in which they live. ${ }^{34}$ In particular, the data demonstrates how, despite the higher educational achievement women are now enjoying, traditional norms are playing a role in decision-making, and what changes might enhance their participation in the labor market. It is important to establish career paths for educated young women that conform to social norms in order to promote further educational attainment for girls. If higher education fails to lead to higher returns through employment, rational calculation would discourage people from investing more in education.

The World Bank conducted a household and youth survey in 2009-2010, for which data was collected from 2,883 young people aged 15 to 29 to better understand
their circumstances. ${ }^{35} \mathrm{I}$ will first review findings from the survey presented in the report with regard to youth labor participation, and then analyze urban female de-cision-making regarding labor participation. Finally, this section concludes with some policy recommendations to enhance urban female labor participation.

## Review of the findings from the World Bank report

This part reviews some of the important findings from the World Bank survey report with regard to youth labor participation.

Young females are even more discouraged than young males in finding jobs. Figure 9 shows the proportion of the population employed, unemployed or out of the labor force among youth aged 15 to 29 who are not enrolled in school. Looking at the population currently out of the labor force, a higher percentage of young females are demotivated (19 percent) in their search for work compared to young males ( 15.5 percent). While a majority ( 53.5 percent) is out of the labor force because of family reasons or other constraints, almost 20 percent of urban young females are out of the labor force because they are discouraged.

## Non-participation among young females declines

 with higher education. Figure 10 shows that higher educational attainment leads to higher participation in the labor force among women. The share of youth not in school and who are not participating in the labor market decreases from 93 percent among those who have completed primary education, to 81 percent for those with lower secondary education, and to 62 percent for those with secondary education. With tertiary education, only 37 percent of young females are out of the labor force. Comparing this big drop among females to that of males, the share of non-participating youthFigure 9: Labor Force Participation Status Among Youth (aged 15 to 29) Who Are Not in School


Source: World Bank, 2010, MHYS 2009-2010.

Figure 10: Share of Youth Who Are Not in School and Who Are Out of the Labor Force

among males is relatively stable ranging between 20 and 27 percent for all education levels. Young women who have completed higher education have a higher probability of participating in the labor market.

Informal employment is widespread, but not among urban young females. Youth tend to be engaged in informal employment with neither contracts, nor social
security. Figure 11 shows that the share of employment without contracts is overwhelmingly high for rural areas (almost 100 percent for women and 94 percent for men), as well as for urban men ( 86 percent). However, the share is much lower-around 60 percent-for urban women, while 40 percent of them are working with contracts. Thus, the informality of employment may be a factor impacting urban female labor force participation.

Figure 11: Type of Job in Morocco by Area


Source: World Bank, 2010, MHYS 2009-2010.

Figure 12: Unemployment Rate in Morocco by Area


## Urban female youth and labor participation

Using the same World Bank data, this section analyzes urban female decision-making on labor participation and non-participation.

Social norms are a strong reason for not participating. Figure 13 shows the reasons given by young females who are either currently in school but not expecting to work afterwards, or already out of school and not willing to work. Family opposition constitutes more than 45 percent, while 30 percent of respondents said they are busy at home.

Figure 13: Reason for Not Expecting/Willing to Work Among Young Urban Females (aged 15 to 29) in Morocco


| $\square$ | 12.25\% parents won't <br> allow |
| :--- | :--- |
| allow husband won't |  |

Source: World Bank, 2010 and MHYS 2009-2010.

We saw previously that the non-participation rate decreased with higher education levels for young women. There could be multiple factors explaining this decrease. Given more than 45 percent of urban females indicated family opposition as a reason for non-participation, we can expect that family opposition becomes less dominant when female family members are more educated. However, looking at the reason for not expecting or willing to work by education level (Figure 14), we see similar results for different education levels, with some variation. Family opposition remains a major reason in each education level, while for those with a lower secondary education, the opposition seems to come mainly from male spouses. However, this interpretation should be treated carefully, as the number of observations for those with a lower secondary education is limited to 28 percent, while the number is 68 percent for those without primary education and 78 percent for those with primary education.

Social norms become less dominant among urban females with higher education, but they might be busier at home. Assuming that family opposition is related to societal norms, we can consider family opposition, religious reasons and social norms as one category representing sociocultural norms. The share of this category among reasons declines with higher education. The share is 61 percent for those without a primary education, 52 percent for those with a primary education, and 46 percent for those with a lower secondary education. Interestingly, the "busy at home" reason constitutes 26 percent for females with the lowest education level, 31 percent for those with a primary education, and 39 percent for those with a lower secondary education. It is impossible to draw a conclusion from the existing data as the number of observation is limited. However, we might be able to interpret this result as an expression of transitional status that those educated women are facing, between a growing

Figure 14: Comparison of Reasons for Not Expecting/Willing to Work Among Urban Females by Education Level


Source: World Bank, 2010 and MHYS 2009-2010.
expectation for them to contribute financially through work and ongoing sociocultural barriers keeping them at home, as indicated in Figure 2.

The unemployed are particularly discouraged. By surveying those urban women who are available for work but unemployed (defined as those who did not work in the last 7 days) and to all the participants who are not searching for a job, the data tries to determine why these groups are not searching for work. Among unemployed youth, the main reason why they are not searching for a job is that they believe there are no jobs. The data show a difference between women and men who believe there are no jobs and those who are tired of looking for work, which is the second-biggest reason for both genders. Among urban females, a majority of the unemployed ( 55 percent) indicated that they believe
there are no jobs so they are not searching for a job, while less than 14 percent are tired of looking for a job. Among urban males, the perception is different; 40 percent believe that there are no jobs while more than 31 percent are getting out of the labor market because they are tired of looking for a job. In each case, the number of people who think they do not have enough training or education is relatively small, just 5.5 percent for urban females and 6.7 percent for urban males, probably reflecting their perception that they should be able to find a job based on their existing training or education.

Education and job searching are related among urban female students, while the unemployment rate is high among secondary and tertiary education graduates. When all participants, regardless of their current status, are asked the reason why they

Figure 15: Reason Given by Moroccans Not Searching for Work

ough training or education

- family responsibilities
- lack of personal contacts
- I do not need to work
- tired of looking for work
$\square$ employers prefer to recruit women $\square$ no suitable jobs

- no time to search
opposition by a family member
- already found work which will start later
other (specify)

Source: World Bank, 2010 and MHYS 2009-2010.
are not searching for work, the main reason among urban females was that they do not have enough training or education (30 percent), as shown in Figure 16. Considering the small portion of unemployed youth who indicated insufficient training or education as their primary reason for not searching for work, this larger share among all participants can be explained by the larger presence of students among the sample (254 students out of a total of 595 responses by urban females). Thus, when we subdivide into students and non-students (Figure 17), we find that urban young women who are out of school do not suggest insufficient training or education is the reason why they are not searching for a job. Rather, they are facing family responsibilities or family opposition to their search for work. At the same time, a high percentage of the students who answered that they do not have enough
training or education might imply they expect that getting more training or education will better prepare them for future job searching. This corresponds to the drop in the non-participation rate for urban women who have achieved higher educational attainment. However, in Morocco, higher education does not necessarily lead to a higher employment rate even in urban areas. Figure 18 shows that the unemployment rate is higher for those with secondary education ( 27 percent for women and 17 percent for men) compared to those with a primary education ( 20 percent for women and 13 percent for men). Even among those with a tertiary education, the unemployment rate remains high at 26 percent for females and 12 percent for males. Although participation in the labor market is greater among those who have completed higher education, employment is far from guaranteed.

Figure 16: Reason Given by Young Females for Not Searching for a Job in Urban Morocco

8.91\% believe there are no jobs
0.50\% tired of looking for work
$\mathbf{0 . 3 4 \%}$ employers prefer to recruit men
2.02\% do not know an effective way to look for a job
0.17\% employers prefer to recruit women
0.34\% waiting for government/ public sector recruitment

- $1.51 \%$ no suitable jobs
29.92\% do not have enough training or education1.51\% no time to search $0.84 \%$ health conditions do not allow
- 13.95\% family responsibilities
- 13.11\% opposition by a family member $\mathbf{0 . 0 0 \%}$ lack of personal contacts
0.00\% already found work which will start later
7.90\% I do not need to work
$0.17 \%$ waiting for migration
- $18.82 \%$ other

Source: World Bank, 2010, MHYS 2009-2010.

Figure 17: Reason for Not Searching for a Job Among All Urban Females


Source: World Bank, 2010 and MHYS 2009-2010.

Figure 18: Unemployment Rates in Morocco by Education Level (Percent)


Source: Haut Commissariat au Plan, 2012. Activity, Employment, and Unemployment.

Public sector jobs are preferred for their stability by those with a higher education. As shown in Figure 19, in urban areas, females and males both prefer salaried public sector jobs upon completion of higher education. Correspondingly, there is decreasing interest in salaried private sector jobs among higher educated females and males, with 13 percent of lower secondary education female graduates interested, 10 percent of high school or tertiary education female graduates interested, and 14 percent and 11 percent interested, respectively, among males. The result implies that private salaried jobs are less attractive for those with higher education, even though Morocco's manufacturing sector is believed to have had some success in increasing female participation in the salaried private sector. ${ }^{36}$ Quality and stable salaried jobs in the private sector need to be promoted for those productive youth to be more engaged in private sector development.

Comparing responses among men and women, women have a stronger preference for public salaried work, especially those with a secondary education or higher. Indeed, 65 percent of urban females who, at a minimum, have graduated from high school prefer to find work in the public sector, while the percentage is only 50 percent for their urban male equivalents. The difference mainly shows up in the preference for independent work or selfemployment among individuals possessing more than a high school education, some 25 percent of urban females and 38 percent of urban males. Among urban females, there seems to be a stronger preference for job security over greater independence as a worker. The reason for their preference for salaried work, both public and private, is largely explained by the greater security these jobs provide. Given the fact that the majority of respondents preferring salaried work prefer public sector jobs, this means they find more job security in public sector employment.

Figure 19: Job Preference Among Urban Youth in Morocco


Job preference among urban males
salaried (private sector)
Source: World Bank, 2010, MHYS 2009-2010.
Figure 20: Reason for Preference for Salaried Employment Among Urban Youth in Morocco


Source: World Bank, 2010, MHYS 2009-2010.

## Comparison of values

To better understand the rationale behind the youth responses shown above, it is insightful to look at the values underlying Moroccan society. The World Value Survey, which consists of nationally representative surveys conducted in almost 100 countries and focuses on human beliefs and values, enables comparisons across countries by using a uniform questionnaire. The following section offers some comparisons between Morocco, Jordan, Malaysia, Chile, and Japan. Jordan is chosen as it shares similarities with Morocco, Malaysia is an Asian Muslim majority ${ }^{37}$ country, Chile is an example of a fast-growing country from Latin America, and Japan as a non-Muslim country with a "traditional" value set.

Men are perceived as the main income earners. Perceptions on gender roles vary across countries. In Jordan, Morocco, and Malaysia, majorities agreed with
the statement "when jobs are scarce, men should have more right to a job than women," while a majority of the sample in Chile disagreed, and almost half of the sample in Japan answered "neither." This would seem to confirm that a majority of people in Jordan, Morroco, and Malaysia believe that male employment should be prioritized, perhaps as they think it is likely that men are the main income earners in a family.

## Values around working women and housewives

 differ. When asked generally about the relationship between work and women, respondents in all five countries value the independence women enjoy when they have a job, with half of the samples agreeing with the statement, "having a job is the best way for a woman to be an independent person." Less than 30 percent of the sample disagreed with the statement, even in Morocco and Jordan.Figure 21: When Jobs Are Scarce, Men Should Have More Right to a Job Than Women
$\square$ Agree $\square$ Neither ■ Disagree


[^1]Figure 22: Having a Job Is the Best Way for a Woman to Be an Independent Person


However, the samples react differently to statements associating women with their role as mothers. To the statement representing "traditional" values, "when a mother works for pay, the children suffer," 57 percent of the sample in Jordan strongly agree, whereas in Malaysia 57 percent of the sample disagree, and 23 percent strongly disagree. Although people in Chile felt least strongly among the five countries about a man's right to employment, the proportion of people either disagreeing or strongly disagreeing is higher in Malaysia than in Chile. It seems that in Malaysia, the role of a mother is not considered to be undermined by the fact that she is working. Comparing Morocco to Jordan, Moroccan values are more moderate, with 25 percent of the sample strongly agreeing to the statement, while 39 percent agree and a total 26 percent either disagreeing or strongly disagreeing. An interesting case is Japan, in which almost half ( 48 percent) of the sample disagree, while one-third of the sample say they don't know, possibly reflecting conflicts of values among individuals.

Except for Japan, similar results show up regarding the statement focusing on the value of being a housewife.

People in Jordan and Morocco are positive toward the statement "being a housewife is just as fulfilling as working for pay," while people in Malaysia and Chile show more diverse values among people, with slightly more opposition. In the case of Japan, a majority of the sample agreed to the statement, in contrast to their disagreement to the statement about the negative image of working mothers.

Looking at the attitudes across the five countries, we could say that, in general, people agree with the notion that women become more independent when they have a job. However, when women become mothers, there are two types of countries: one which values the "formal" work of mothers as much as their "informal" work at home, and the other which perceives "formal" work by mothers negatively by assuming children would suffer from it. In the latter type of countries, including Morocco and Jordan, the value of housewives is highly regarded, which could lead young women to internalize these values and to more of them becoming housewives in these societies, unless there are other factors coming into play.

Figure 23: When a Mother Works for Pay, the Children Suffer


Figure 24: Being a Housewife Is Just as Fulling as Working for Pay


Women's education and their success in work. To the statement "university education is more important for a boy than for a girl," more than 70 percent of the sample population in four out of five countries disagrees (including strong disagreement). In Morocco, nearly 40 percent of the sample strongly disagrees to it, indicating the importance Moroccans put on tertiary
education for girls. This level of disagreement is the highest among the five countries. Taken together with the previous results, this might imply the different values Moroccans associate with young women before marriage and with those who are married, particularly with children.

Figure 25: University Education is More Important for a Boy than for a Girl


When asked about the potential performance of women at work, majorities in Jordan and in Morocco agree to the statement "on the whole, men make better business executives than women do." Similar results can be seen regarding men and women as political leaders. In Chile, about 70 percent of the sample disagree or strongly disagree. Interestingly,
in Malaysia, where working mothers are encouraged, 14 percent strongly agree to the statement and 45 percent agree, while only 36 percent disagree. In Malaysia, mothers seem to feel less guilty when they work, but that does not mean that female potential is recognized as much as that of men.

Figure 26: On the Whole, Men Make Better Business Executives than Women Do


## Policy suggestions

Based on the above analysis, urban females in Morocco have higher expectations of participating in the labor market when they are more educated. At the same time, because of greater job security, those females want public sector employment, which is becoming scarce for new entrants. Looking at the attitudes shared across different societies, we see that values such as university education for women's independence through employment are highly regarded by Moroccans, as much as they are in other countries. However, when it comes to women with children, they tend to prioritize their role as mothers over their role as workers. A pilot case in Jordan shows that an intervention through vocational training was more effective in rural communities than in an urban, heterogeneous environment. In urban areas, the job retention rate was only 20 percent after the intervention. Major constraints result from transportation challenges, wage level, marriage, type of job, and cultural issues. ${ }^{38}$

It would be interesting to look at Malaysia to help determine the factors making people believe in the value of working mothers. Although there might be a question on which comes first-reality or belief-in either case, such a case study would provide insights for Morocco, such as the importance of child care facilities or various forms of help from relatives in rearing children.

Another possible approach by the government is the promotion of decent work in the private sector. Improving the quality of private sector jobs in terms of job security and working environment would lower the physical and sociocultural hurdles for urban women to work in the private sector, thus enhancing female participation in the labor market. Creating decent jobs in the private sector is even more crucial given the public sector is no longer able to absorb all the new entrants seeking higher quality work. These aspects related to industry will be examined in the following part of the paper.

## DEMAND-SIDE FACTORS AND FLFP

## Overview of industry-related factors

The third approach uses demand-side factors to explain the low female labor force participation rate. This approach includes both macro-level analysis focusing on aggregated demand represented by the unemployment rate and micro-level analysis of demand from firms.

Before addressing the question of female participation, here are several findings from a recent report by the World Bank on job creation in the MENA region. First, GDP growth over the last two decades was driven by demographic change rather than labor productivity. Private sector job creation was too weak to absorb the fast-growing labor force. Second, the fundamentals of job creation in the MENA region are similar to those in other regions: it is young firms and more productive firms that create more jobs. In the MENA region, however, low firm turnover (firm entry and exit) and slow productivity growth limit the pool of young and more productive firms and, ultimately, reduce job creation. This is because of a combination of slow within-firm productivity growth and misallocation of labor and capital across firms. Third, various policies across MENA countries limit competition and undermine firm turnover, productivity growth, and job creation. Using Morocco as one case, the report shows that several dimensions of the business environment such as tax administration, corruption, and the cost of finance impact employment growth and disproportionately affect young firms. Finally, the report provides direct evidence that policies in MENA countries have often been captured by a few politically connected firms. This has led to a policy environment that creates privileges rather than a level playing field, and undermines private sector growth and job creation. ${ }^{39}$ These factors lie behind the high unemployment rate among youth in MENA countries.

Returning to the question of FLFP, the relationship between the unemployment rate and FLFP can be interpreted in two ways. When weak economic performance fails to generate sufficient levels of employment to absorb new entrants into the labor market, it is likely to result in lower FLFP, since employers prefer to hire men based on the understanding that male income is more important to their families. ${ }^{40}$ For instance, the International Labor Organization (ILO) ${ }^{41}$ reports that, in North Africa, the female youth unemployment rate increased by 9.1 percentage points in the aftermath of the economic crisis, compared to 3.1 percentage points for young males. And yet, comparison of the relationship between unemployment and female participation in OECD countries and MENA countries indicates that in the long term, a healthy economy with higher female participation in the labor force is also more likely to enjoy lower unemployment. ${ }^{42}$

In terms of micro-level analysis of demand-side factors, Fakih and Ghazalian ${ }^{43}$ find that firm-related fac-tors-mainly private foreign ownership and exporting activities-have positive implications for FLFP rates in MENA's manufacturing sector. Similar results are found in Egypt, where foreign-owned firms are more likely to employ women than their domestic counterparts. In addition, large firms are much more likely than small- and medium-sized firms to employ women, and the textile sector is the most likely of all sectors to employ women. ${ }^{44}$

Figures 27 and 28 show profiles of current active workers in urban areas in Morocco by industry and by professional category. As these figures focus on urban areas, workers are mainly engaged in either "industry, building and public work" or "services." In the "industry, building and public work" sector, more than 60 percent of the workers are classified as artisans and skilled craft workers for both men and women. The services

Figure 27: Sector and Profession, Urban Males


0: legislative members, locally elected personnels, directors and managements of companies

1: senior managers and members of liberal professions
2: middle managers
3: employees
4: merchants, commercial and financial intermediaries

Figure 28: Sector and Profession, Urban Females


5: operators in agriculture, fishery or forestry
6: artisans and skilled craft workers
7: laborers in agriculture and fishery including skilled laborers
8: plant and machine operators and assembly workers
9: non-agricultural laborers, workers in small businesses
10: out of classification

Source: Haut Commissariat au Plan, 2012. Activity, Employment and Unemployment.
professional category varies more, covering almost all professional categories. Among females, services sector workers are mainly managers, employees, and small business workers. We see that the services sector is providing a significant number of salaried positions for women. It is especially remarkable that 35 percent of female workers in services correspond to the professional categories $0-2$, while only 14 percent of male positions do. This implies that there is a higher percentage of senior management-level jobs among urban working women in the services industry.

We know that the low FLFP represents a large opportunity cost for MENA societies, while even young males are having difficulties getting decent private sector work. Also, industrial policies in these countries sometimes hinder healthy competition among firms and therefore result in fewer jobs than might be expected. What industrial policies are being pursued in Morocco in order to spur job creation and promote higher FLFP? In the following sections, the paper takes a closer look at the tourism sector in the services industry and manufacturing industry as an example. It examines strategies set by the Government of Morocco for tourism—Vision 2020—and for the manufacturing industry—Emergence Plan—and their impact on job creation. It is noteworthy that neither strategy makes explicit reference to issues affecting, or policies promoting, FLFP.

## Tourism as a job-creating industry: from "Vision 2010" to "Vision 2020" <br> Labor dynamics in the tourism industry

According to the ILO, the tourism industry is one of the fastest-growing sectors of the global economy, accounting for more than one-third of the total global services trade. ${ }^{45}$ By 2022, it is estimated that employment in tourism would account for 328 million jobs world-
wide, equivalent to nearly one in 10 jobs in the global workforce. ${ }^{46}$ The high intensity of labor within the industry makes it a significant source of employment and places it among the world's top creators of jobs that require varying degrees of skills and allow for quick entry into the workforce by youth, women and migrant workers. ${ }^{47}$ Tourism's ability to generate employment, not only in the formal sector but also in informal sector activities, has been cited as one of its key advantages for developing countries. ${ }^{48}$ Sinclair ${ }^{49}$ also points out that empirical studies have revealed the relatively skill-intensive nature of tourism employment. This requires more detailed study, as a more recent analysis indicates a high proportion of low-skilled domestic-type jobs, which are open to female workers in the sector. ${ }^{50}$ Another important point is that the tourism industry has a significant multiplier effect on employment in other sectors. With regard to the sectoral supply chain, one job in the core tourism industry indirectly generates roughly 1.5 additional jobs in the related economy. ${ }^{51}$

With regard to gender in tourism-related employment, a United Nations Environment and Development UK (UNED-UK) study estimated that, on average, 46 percent of the tourism workforce was female in $2002 .{ }^{52}$ At the same time, many companies in the tourism sector are small and often family enterprises, the mixture of paid work and domestic work among women is unclear, which makes it difficult to distinguish between formal and informal employment. ${ }^{53}$ In terms of income disparities, there is a significant income gap between male and female workers in the sector, with females earning less than males, which might be due to more managerial posts being occupied by men. ${ }^{54}$ The ILO notes education and vocational training are key requisites for the operational effectiveness of the sector. ${ }^{55}$ Whether the required training is to be provided by the government or by employers, the sector needs qualified employees to improve its quality.

## Overview of the tourism sector strategy: Vision 2010 and Vision 2020

In Morocco, the tourism sector plays a big role in the economy. In 2010, it represented 7.5 percent of GDP, 6.6 percent of the working population, and almost 15 percent of revenue in balance of payments. In 2001, recognizing the industry's importance, the Government of Morocco published a 10-year strategic plan for the tourism sector entitled "Vision 2010." Over the course of "Vision 2010," the sector grew rapidly despite the global economic downturn. According to the Ministry of Tourism of Morocco, the number of international tourists to the country more than doubled from 4.4 million people in 2001 to 9.3 million people in 2010, with an average annual growth of 8.7 percent. This growth made tourism the biggest source of foreign currency for the country, surpassing remittances from Moroccans living abroad. The amount of direct employment in the sector also increased-substantially, by 40 percent, to 450,000 jobs-making it the second biggest source of employment after agriculture. The development of human capital was among the pillars of "Vision 2010." Collaboration between the Ministry of Tourism, vocational training offices, and private stakeholders resulted in training for 12,300 people in 2010, compared to only 2,000 in 2001.

Building on the success of "Vision 2010," the government set up "Vision 2020," showing its commitment to the tourism sector as one of the driving forces of the economic, social, and cultural development of the country. The goal of the new "Vision 2020" strategy is to double the size of the tourism sector. In addition to its goals relating to accommodation capacity and the number of international and domestic tourists, the plan aims to generate 470,000 new direct positions in the sector, creating a total of almost 1 million jobs by 2020. The strategy argues for the need to train 130,000 young people and to make the industry more attractive
for younger job seekers. In order to overcome these challenges, there are plans to create new schools specializing in tourism and hotel management.

From 2012 to 2013, the active population in Morocco increased by $157,000 .{ }^{56}$ If the strategy is successful, it will create an average of 47,000 new positions each year, comprised of nearly one-third of the new entrants to the active population. This number is made more significant when we take into account the associated indirect employment opportunities, which has previously equated to 1.5 additional indirect positions for every direct position.

According to the National Confederation of Tourism of Morocco (CNT), the proportion of female workers in the Moroccan tourism sector is relatively low at 25.9 percent. ${ }^{57}$ This figure is lower than the average for the tourism sector overall ( 46 percent). Recognizing that the low rate of female labor participation is not particularly sector specific, the CNT indicates that it also reflects a widespread disparity between men and women in Morocco. Consequently, the CNT proposes taking affirmative action to enhance female participation in the tourism sector, such as providing increased access to education and employment in the sector. The CNT asserts that in the current strategy, gender issues are not prioritized, nor are they systematically integrated into the strategy. In order to distribute job creation in the tourism sector equitably, steps to mitigate gender disparities should be incorporated into the planning, implementation, and evaluation stages of the process.

## Policy suggestions

It is clear that the tourism sector has great potential for future job creation in Morocco. More effort should be made to measure female labor participation in the tourism sector. In a report on Moroccan women
and the labor market prepared by HCP, the services industry is treated as one category without a more detailed analysis of its sub-sectors. ${ }^{58}$ In addition, while it might be technically difficult to quantify the tourism sector's effects on indirect employment, efforts should be made to measure its broader impact and multiplier effects. Since the tourism sector is the country's second-largest employer, gender issues should be factored into the strategy's planning, implementation and evaluation processes, in order to fully realize the potential of the female labor force in Morocco.

## Manufacturing as a strategic industry: "Emergence Plan"

## Labor dynamics in the manufacturing sector

According to Morocco's Ministry of Economy and Finance report on employment in the manufacturing sector, ${ }^{59}$ the gross job destruction rate was stable from 1986 to 2003, while the gross job creation rate varied significantly. It implies that the labor adjustment by firms has mainly been implemented through job creation, not through job destruction. This is in contrast to
developed economies in which firms adapt to market change through decreasing the number of positions.

At the same time, the creation of temporary employment in the manufacturing industry is double that of permanent employment. This phenomenon can be explained by rigid labor regulations, which make it difficult for firms to fire workers. ${ }^{60}$ This rigidity of regulation concerning firing is also suggested by Bottini and Gasiorek, ${ }^{61}$ who study the relationship between trade and job reallocation in Morocco. By analyzing the impact of trade openness on the labor market, they found that increased exposure to external markets has a substantially positive impact on job creation. On the other hand, the increased openness of domestic markets has a negative impact on job creation, although there is little evidence of an increase in job destruction. This is likely attributable to the strict laws regarding firing workers, which limits the economy's capacity for adjustment.

Another important aspect is technological change, which improves productivity. GDP growth decomposition covering 2006 to 2010 shows that the single factor contributing positively to growth was productivity, fol-

Figure 29: Growth Decomposition into Productivity, Employment and Working Age Population (2006-2010)

|  | Percent of total change in per <br> capita value added growth |
| :--- | :---: |
| Total Growth in per capita GDP (value added) | 100 |
| Growth linked to output per worker | 97.17 |
| Growth linked to changes in employment rate | -23.53 |
| Growth linked to changes in the share of population of working Age | 26.36 |

Source: Paolo et al. (2014).
lowed by an increase in the size of the working population. Indeed, changes in employment had a negative effect on growth (Figure 29).

Bottini and Gasiorek indicate from their firm-level analysis that Morocco is specializing in unskilled laborintensive sectors in manufacturing. What is more, firmlevel regressions confirm the labor-saving nature of technological change, and an increase in productivity reduces the demand for labor, particularly for unskilled workers. This leaves the government with the challenge of promoting technological change to improve productivity in order to achieve long-term economic growth, while trying to maintain current jobs and creating new ones in the shorter term.

In terms of female participation, the Enterprise Survey of Morocco shows that in the manufacturing sector, the proportion of female full-time workers in large firms is more than twice as high as that of small firms. Firms with more than 10 percent foreign ownership have a higher proportion of female workers compared to domestic firms. What is most remarkable is the factor of export. The proportion of female workers in exporting firms is almost twice as high as that of non-exporting firms (Figure 30).

## Overview of the "Emergence Plan"

The Government of Morocco continues to make considerable efforts to develop its industry. In 2005, the government launched the "Emergence Strategy," an industrial policy framework later elaborated into the

Figure 30: Proportion of Permanent Full-Time Workers that Are Female in Manufacturing Firms in Morocco (Percent)


[^2]**Foreign-owned: 10\% or more foreign ownership

[^3]"National Pact for Industrial Emergence" covering the period 2009-2015. Under this framework, the government has designated six priority sectors and promoted their development. The designated sectors are: automobile, aeronautics, offshoring (of services), electronics, textile and leather, and food processing industries. The plan has five main pillars, namely, the promotion of the six strategic sectors, promotion of SME competitiveness, the promotion of human resource development for industry, improvement of the business environment, and the creation of a Moroccan investment development agency. The plan aims to promote domestic and foreign investment in these sectors to advance their development, and is designed to achieve four goals by 2015: the creation of 220,000 jobs, an increase in industry-related GDP by an additional 50 billion Moroccan dirhams (MAD), which is equivalent to about $\$ 5$ billion, an increase in export volume by 95 billion MAD ( $\$ 9.5$ billion), and 50 billion MAD ( $\$ 5$ billion) of private investment in industry-related activities. Table 1 provides a breakdown by industry of where the new positions are intended to be added.

Table 2 shows the status regarding job creation at the end of 2012, the strategy's midway point. By adding 111,000 jobs, the plan has attained roughly half of the overall objective, but with considerable variation across sectors and years (see Table 2). In absolute numbers, the automobile industry has created the most new jobs, adding more than 31,200 from 2009 to 2012, followed by offshoring, which created more than 29,600 new positions. These are the two sectors with the biggest job creation targets (70,000 jobs) over the plan's duration, and these results suggest that the initial prioritization of these sectors has worked to some extent. At the same time, job creation in the offshoring sector has been rather unstable, showing variation across years. What is more problematic is that there were sectors that recorded a net decline in jobs in 2011 and 2012, such as electronics and textile and leather. Although exports grew steadily during these years, job creation remained disappointing. This phenomenon might be because of higher productivity achieved in these sectors, or lower demand in the domestic market, offsetting the growth in exports.

Table 1: Profile of Necessary New Positions for 2009-2015

| Profile | Offshoring | Car <br> industry |  | Aeronautics | Electronics | Textile and <br> leather |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Food |  |  |  |  |  |  |
| industry |  |  |  |  |  |  |$|$

[^4]
## Table 2: Midterm Job Creation Results in the Six Strategic Sectors

|  |  |  |  |  |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | :---: | :---: |
|  | 2009 | 2010 | 2011 | Job Creation |  |  |  |  |  |
| Car industry | 4,739 | 8,293 | 9,149 | 9,024 | 31,205 | Total | Objective: <br> 2009-2015 |  |  |
| Aeronautics* | 1,531 | 400 | 694 | 1,106 | 3,731 | 15,000 | $45 \%$ |  |  |
| Offshoring** | 14,633 | 4,000 | 9,555 | 1,445 | 29,633 | 70,000 | $25 \%$ |  |  |
| Electronics | 1,748 | 1,700 | -550 | -559 | 2,339 | 9,000 | $42 \%$ |  |  |
| Textile and <br> Leather | 6,310 | 20,014 | $-4,622$ | -710 | 20,992 | 32,000 | $26 \%$ |  |  |
| Food industry | 3,863 | 12,271 | 3,343 | 3,612 | 23,089 | 24,000 | $66 \%$ |  |  |
| Total | 32,824 | 46,678 | 17,569 | 13,918 | 110,989 | 220,000 | $96 \%$ |  |  |

* Data for Aeronautics do not include companies for service
** For Offshoring, data concern figures in the exporting location
Source: Bank AI Maghrib, Annual Report 2012. Government of Morocco, Emergence Plan.

To achieve its export target, the plan needs to be boosted. Table 3 shows the increase in exports in the strategic sectors from 2009 to 2012. The increase remains relatively low at 26.6 billion MAD in total, compared to the target of an additional 95 billion MAD of exports from 2009 to 2015. Although we need to take into consideration the fact that the period 2009-2012 coincided with a difficult external environment and the economic crisis in Europe,

Morocco's main export destination, an achievement rate of 28 percent after three years will make it difficult to realize the targeted increase of 95 billion MAD by 2015. Still, in 2013, the car industry saw exports hit 31 billion MAD, while aeronautics and electronics exports grew to 8.1 billion MAD and to 7.8 billion MAD, respectively, stimulated by large-scale investment from global companies, such as Renault and Bombardier. ${ }^{62}$

Table 3: Midterm Results for Exports in the Six Strategic Sectors

|  | Export (billion MAD) |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | :---: |
|  | 2009 | 2010 | 2011 | 2012 |  |
| Car industry | 12 | 18.3 | 23.4 | 27 |  |
| Aeronautics* | 4.1 | 4.7 | 5.8 | 6.4 |  |
| Offshoring** | 4.9 | 6 | 7.1 | 7.3 |  |
| Electronics | 5.1 | 6.3 | 7.1 | 7 |  |
| Textile and Leather | 30.7 | 31.9 | 34 | 33.3 |  |
| Food industry | 15.5 | 16.7 | 15.9 | 17.9 |  |
| Total | 72.3 | 83.9 | 93.3 | 98.9 |  |

[^5]Source: Bank Al Maghrib, Annual Report 2012.

## Overview of each sector's strategy

## a) Offshoring sector

The implementation of the initial emergence strategy launched in 2005 went well for the offshoring sector. In terms of employment, the sector created more than 20,000 new jobs between 2005 and 2008, while more than 50 firms expressed interest in relocating to the two existing industrial zones-Casanearshore and Rabat Technopolis-within one year. An additional four industrial platforms for offshoring are planned in Fez, Tetouan, Oujda and Marrakech.

The 2009-2015 strategy offers economic incentives over the first three years following a firm's relocation to an industrial zone, such as a tax ceiling of 20 percent on profits, for firms making more than 70 percent of their turnover from exports. Eligible firms can also benefit from government subsidies for the training of new and existing employees. The amount of subsidy varies depending on an employee's profile, but can reach as high as 65,000 MAD. ${ }^{63}$

## b) Car industry

Describing the car industry as a sector with strong potential, the 2009-2015 strategy focuses on the development of manufacturing equipment and on the building of a second assembly plant in Morocco. The first assembly plant operated by Renault was inaugurated in February 2012 with a production capacity of 170,000 cars per year, which had increased to 340,000 cars per year by October 2013. In order to promote further development of the sector, the government set up two industrial zones dedicated to automobile equipment manufacturing, the Tanger Automotive City located near Renault plant, and the Kenitra Automotive City. Both of the zones will be developed over 300 hectares and will accommodate about 15,000 jobs by 2015 . Wiring, textiles, and plastics are recognized as the country's three naturally strong manufacturing areas, so the strategy places emphasis
on promoting higher value-added manufacturing, particularly in metallurgy such as stamping, surface treatment, and electronics.

## c) Aeronautics

At the time of launch of the 2009-2015 plan, aeronautics was a newly developing sector with only 60 firms, of which more than 70 percent were less than 5 years old, and supporting around 7,000 jobs. Given aeronautics are typically closely connected to other advanced technology and industries, the government chose aeronautics as one of the priority sectors for which it would incentivize investment. It paid off: In 2011, the Canadian aerospace manufacturing company Bombardier decided to establish a $\$ 200$ million facility in Nouasser, which became operational in 2014 and is expected to employ 850 skilled workers by $2020 .{ }^{64}$

In terms of industrial zoning, the majority of the existing firms were concentrated around "Aeropole of Nouasser." The 2009-2015 plan doubled the zone's area to 200 hectares, and re-branded it as "Nouasser Aerospace City."

## d) Electronics

The electronics sector has two different categories: electronics for the general public, such as brown products (e.g., televisions and radios) or white products (e.g., refrigerators and washing machines), and specialized electronics such as embedded electronics for cars and aircraft, medical devices or industrial electronics. This specialized electronics sector is considered to have especially high potential to advance Moroccan industrialization, as it is labor-intensive but requires low levels of capital and technical expertise, while structural changes in industry would allow Morocco to produce more integrated and higher value-added products over the longer term. The 2009-2015 plan identifies three priority sub-sectors of specialized electronics: mechatron-
ics, industrial electronics, and embedded electronics for automobile and aeronautic products.

The electronics sector industrial zones are grouped together by specialization: mechatronics and industrial electronics in the Casablanca region (40-50 hectares), two zones for automobile-embedded electronics in Tanger and Kenitra (5-10 hectares), a zone for aeronautical electronics in Nouasser (5-10 hectares), and a cluster of electronics in Mohammedia (40 hectares).

## e) Textile and leather sector

Textile and leather is the most important manufacturing sector in Moroccan industry, comprising 40 percent of manufacturing jobs $(20,000), 13$ percent of GDP ( 9.6 billion MAD), and 27 percent of industrial exports. However, the export performance of the Moroccan textile sector is largely affected by changes to the EU import quota for Chinese products, as the EU is the main export destination for Moroccan textiles. This leaves the sector vulnerable, as the sector's exports go to just a few European countries. In addition, the textile and leather sector is composed of small firms (with average turnover of around 15 million MAD), with 60-70 percent of their turnover relying on subcontracting. The 20092015 plan aims to stabilize the industry in this competitive international market, while realizing the sector's full potential through two different initiatives: the promotion of Morocco's wider industrial value chain to encourage exports of higher value-added products, ${ }^{65}$ and the development of Morocco's domestic market, for which potential growth is expected to be as high as 60 percent by 2015. The objective for 2015 is for the sector to contribute an additional 1 billion MAD to GDP and 32,000 new jobs by 2015.

## f) Food processing industry

The food processing industry in Morocco is important, representing 35 percent of industrial GDP, as well as

15-20 percent of industrial companies and formal employment. Recognizing Morocco's advantages of having a low-cost labor force, available agricultural products, and its geographic location, the 2009-2015 plan tries to strategically leverage the agricultural sector (Plan Maroc Vert), to increase domestic demand, and secure stable external demand for "mediterranean products." By 2015, the impact is estimated to be worth an additional 10 billion MAD to GDP and 24,000 new jobs.

## Analysis of female participation in the manufacturing sector

## a) Methodology

This analysis uses industrial statistics from 2011, made public through the Moroccan Industry Observatory. ${ }^{66}$ The statistics contain major indicators such as turnover, value-added, export, and number of employees by sex. In order to look at the relationship between industrial growth and job creation in the five industrial sectors chosen in the "Emergence Plan," the analysis used the following five sub-sectors included in the statistics: food industry (2-digit code: 15), textile and leather (adding up three 2-digit codes: 17, 18 and 19) ${ }^{67}$ ), manufacturing of electronic machines and devices (2-digit code:31), the car industry (2-digit code:34), and manufacturing of other transport materials (2-digit code:35), as an approximation for aeronautics.

## b) Analysis of five strategic industrial sectors

There are three categories of industry size. As shown in Figure 31, the size of turnover and exports in five sectors of the "Emergence Plan" varies significantly. The biggest turnover can be seen in the food industry, with more than double the amount of the sec-ond-largest groups, textile and leather and electronics. As for the other two industries-namely the car industry and other transport material manufacturing-as of

Figure 31: Size of Turnover and Export


Source: Moroccan Industry Observatory (2011), Industry in Number.

2011, their importance was still small in terms of the amount of turnover and exports.

The textile and leather sector is a major source of employment, especially for women. The industry size in terms of turnover amount and its capacity for employment does not correspond because of the difference in labor intensity in each industry. Among the five sectors, the food industry makes up 23 percent of overall industry turnover while it represents 21 percent of the total industrial employment. Meanwhile, textile and leather work is more labor intensive, making up 34 percent of the total industrial employment while accounting for only 6 percent of total turnover. Another important feature of the textile and leather industry is the high proportion of female employees. As shown in Figure 32, 71 percent of all textile and leather industry employees are female, which is the highest among the five sectors and is followed by 57 percent in electronics and 44 percent in the food industry. The ratio of female employees in the car industry and other transport ma-
terials manufacturing is much lower, at 10 percent and 32 percent, respectively. According to the statistics, the total ratio of female employees is reported to be as high as 45 percent.

## There is large variation in productivity and labor

 costs. When we look at Figure 33, it becomes clear that the highly labor-intensive textile and leather industry is relying on low-cost labor supply, especially from the female labor force, and has a low level of productivity. It is likely that those female workers completed no more than primary education, resulting in non-skilled or low-skilled labor. The car industry shows the highest productivity, while its employment capacity remains low. However, higher productivity in the car industry can lead to the development of a skilled labor force in Moroccan industry, which is important for its long-term growth. Interestingly, labor costs across the sectors do not vary as much as productivity, although the textile and leather sector and the electronics sector have the cheapest labor cost and the highest female employee ratio.Figure 32: Female Employee Ratio


Source: Moroccan Industry Observatory (2011), Industry in Numbers.

Figure 33: Productivity and Cost per Employee


Exporting companies play a crucial role. Figure 34 indicates the crucial role played by exporting companies in these sectors. Except for the food industry, for which exporting companies represent only 45 percent of the total turnover amount, all the other sectors rely largely on exporting companies for their turnover: 78 percent for textile and leather, 94 percent for electronics, 74 percent for the car industry, and 84 percent for manufacturing of other transport materials. This might be partly explained by the domestic market size for each product, which is large for the food industry and much smaller for expensive products such as electronics or cars.

Exporting companies in the electronics sector are the biggest employers. As seen previously, exporting companies are playing an important role in terms of turnover. Figure 35 shows the comparison of average turnover per company in exporting companies and non-exporting companies. The four sectors excluding the car industry show larger turnover among
exporting companies, most remarkably in the food industry and the electronics industry, for which an exporting company's average turnover is five times as big as that of a non-exporting company.

There are similar differences when comparing the number of people employed by exporting and non-exporting companies. As indicated in Figure 36, exporting companies generally employ at least four times as many people as non-exporting companies, and as many as nine times more in the food industry and 20 times more in the electronics industry.

## A large number of female workers are employed

 by exporting companies. Exporting companies employ large numbers of workers, especially female workers, compared to non-exporting companies. In the textile and leather sector, 74 percent of workers in exporting companies are female, while the ratio is 58 percent in the electronics sector.Figure 34: Ratio of Exporting Companies (Size of Turnover)


Source: Moroccan Industry Observatory (2011), Industry in Numbers.

Figure 35: Business size: Average Turnover per Company


Source: Moroccan Industry Observatory (2011), Industry in Numbers.

Figure 36: Average Number of Employees per Company


Source: Moroccan Industry Observatory (2011), Industry in Numbers.

Figure 37: Ratio of Male and Female Employees in Exporting /Non-Exporting Companies


Source: Moroccan Industry Observatory (2011), Industry in Numbers.

## Policy suggestions

In the manufacturing industry, exporting companies in the textile and leather sector are currently the main employers of female labor. This is down to the labor-intensive nature of the sector, which employs the largest number of workers among the five priority sectors, as well as the low cost of female labor. Indeed, 71 percent of all employees in the sector are female. However, this situation only reinforces existing structural challenges for the female labor force, as it is difficult for them to advance and develop the skills that could lead to higher wages in the future. The textile and leather industry mainly uses low-skilled labor.

In order for the economy to use the underutilized potential of urban educated women, the electronics sector shows promise. The current female employee ratio of the electronics sector is 54 percent, which is already the second highest among the five priority sectors after the textile and leather sector. Another characteristic of the electronics sector is the high proportion of exporting companies, which account for 98 percent in terms of total turnover of the sector. It requires more detailed study to determine why exporting companies employ female workers more than non-exporting companies. In an interview conducted
with the management of one of the foreign-owned factories making electronics devices, it was suggested that they see female employees as diligent and precise in their work. According to the management, female workers prefer working for their factory because of the favorable working environment, including the good relations that exist between the management and workers. As there are various products manufactured in the electronics sector, it provides an opportunity for low-skilled workers to receive training and raise their skill level by working on the production of more complicated products and, eventually, to work in more complicated sectors such as the car industry. In parallel, as young firms create more jobs, it would be important to enhance a system with higher firm turnover as a result of healthy competition. In order to stimulate such competition, it is important to level the playing field for all the actors. The government has already succeeded in attracting large-scale factories in the car and aeronautics industries into the country. In order to realize active job creation dynamics using these factories, policies should be carefully chosen to promote small young local firms with quality. It is in policymakers' interests to incentivize regulatory adherence among small firms.

## CONCLUSION

The low female labor participation rate in Morocco is hindering the country's full potential for economic development, as shown in the U-shape model (Figure 3). Since various factors lie behind this issue, such as social institutions, societal values, female education levels, and employers' preferences in different industries, it is important to view the issue of female labor force participation through multiple lenses. This paper considered three components: the role of social institutions, supply-side factors, and demand-side factors.

Through its social institutions, Morocco can increase female participation in the labor market by modernizing its legal framework, particularly as it relates to family law. From the supply side, young females are getting more and more education in urban areas, without necessarily getting a job. As they face opposition to working from family members, it is necessary to create jobs with decent conditions in both the public and private sectors, to provide more options to those women who see public sector work as the only source of stable employment. Further research might consider in more detail countries such as Malaysia, which shares similar values to Morocco, while having much higher FLFP. On the demand side, private sec-
tor growth should be promoted to create more jobs. In addition, as the quality of working environment is an important factor for female workers, policies to create decent jobs ${ }^{68}$ should be prioritized. The tourism sector has strong potential to provide jobs in the future, but female labor participation in tourism needs further study to determine the opportunities and challenges, including the impact on indirect job creation. As for manufacturing, the electronics sector can benefit from tapping into a pool of urban educated female workers to advance their product line. Proper training can support skill development, together with policies to connect foreign-owned large-scale factories with local small firms. Currently, neither of the two industrial strategies examined in this paper paid specific attention to female labor participation. The government needs to recognize the opportunity cost the economy is paying by not fully using the potential of women, and to focus on measures to promote female labor force participation in their strategies.

It is clear FLFP is a complex issue and requires careful coordination of many stakeholders to fully address all of the challenges. Government leadership, with careful coordination among ministries and agencies, will be indispensable for effective policies to promote FLFP.

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[^0]:    Source: World Development Indicators, World Bank.

[^1]:    Source: World Value Survey 2010-2014.

[^2]:    *Exporter: Directs exports are 10\% or more of sales

[^3]:    Source: Enterprise Survey Database on Morocco, 2007.

[^4]:    Source: Program—contract 2009-2015 for "Emergence Plan."

[^5]:    * Data for Aeronautics do not include companies for service
    ** For Offshoring, data concern figures in the exporting location

