CHAPTER 2

REGIONAL AND OCCUPATIONAL DIFFERENCES IN THE GENDER PAY GAP: EVIDENCE FROM THE TURKISH LABOR MARKET

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Introduction

In recent years, although there have been a number of improvements in education, technology, and social rights in many industrialized countries, inequality problems persist. Among these, the gender-based wage differential is one of the most common forms of social inequality (OECD, 2004). Labor statistics routinely ignore unpaid work performed by women, such as domestic labor, family farm work, and other informal income generating activities (Donahoe, 1999), so the fact that female workers are overlooked, undercounted, and undervalued is not new. Even though the gender wage gap has been decreasing for some developed countries (Beaudry and Lewis, 2014, Yamaguchi, 2014), female workers, especially in developing countries including Turkey, have historically experienced unequal wages.

From a neoclassical perspective, there is a link between gender equality and an efficient economy. Braunstein (2011) found that gender-based wage discrimination significantly reduced women's labor force participation, stunting growth because countries do not use their resources efficiently. Hence, the primary purpose of this study is to investigate the evolution of gender-based wage gap in the Turkish labor market over the last 12 years. This study makes two fundamental contributions to the economic inequality literature of Turkey. First, to the best of our knowledge, this paper is the first to examine the long-run regional wage differential (12 years) rather than a specific year. It investigates the link between recent increases in internal migration (from rural to urban areas) and the evolution in the gender wage gap for Turkey.

As a second issue, I examine the gender wage gap in different types of regions and occupations after the internal migration process. It may affect different occupations in different ways because rural workers' primary sectors are in

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view of the positive expectations in the labor market. The results of this study are consistent with Braunstein (2011), who pointed out that market imperfections and 'sticky' institutions may cause to gender inequality, which in turn may have a direct effect on economic growth, investments in human and physical capital in labor markets.

On the other hand, the internal migration situation may have accelerated because of the Syrian internal conflict and some terrorist organization activities, especially in southeastern Turkey. Under the circumstances, around 2 million Syrians have migrated to Turkey and these immigrants generally reside in rural areas and have been illegally hired as cheap labor, which can also be detrimental towards women's pay. This situation may continue in the near future and continue to impact unequal pay both regionally and occupationally in the Turkish labor markets. Therefore, we believe the findings of this paper present the benchmark for the evolution of Turkish wage inequality in the coming decades.

Acknowledgement

References

Aldan, A., & Gaygisiz, E. (2006). Convergence across provinces of Turkey: a spatial analysis. *Working Papers 0609*, Research and Monetary Policy Department, Central Bank of the Republic of Turkey.

Aslan, H., Tasci, H., & Yildiz, B. (2018). The Effect of Logistic Service Quality and Logistic Information Technology on Logistics and Firm Performance. *Journal of Current Researches on Social Sciences*, *8*(1), 343-358.

Atasoy, M. Environ Monit Assess (2018) 190: 713. https://doi.org/10.1007/s10661-018-7109-1

Barsky, R., Bound, J., Charles, K. K., & Lupton, J. P. (2002) Accounting for the black–white wealth gap: a nonparametric approach. *Journal of the American statistical Association*, *97*(459), 663-673.DOI :10.1198/016214502388618401

Beaudry, P.and Lewis, E.(2014) Do Male-Female Wage Differentials Reflect Differences in the Return to Skill? Cross-City Evidence from 1980–2000. *American Economic Journal: Applied Economics* 6(2): 178–194. DOI: 10.3386/w18159

Bicerli,M.K., Naci, G. (2009) Female Labor Force Participation in Urbanization Process: the Case of Turkey. *MPRA*, #18249, (2).URL: https://mpra.ub.uni-muenchen.de/18249/

Blinder, A. S. (1973) Wage discrimination: Reduced form and structural estimates. Journal of Human Resources 8: 436–455.

Braunstein,E.(2011) Gender Equality and Economic Growth.*Feminist Economics*3 (2):54-67.URL: http://cins.ankara.edu.tr/6_5.html

Corabatır, A, H., Husseini,M., Hashem,J., A., L., & Wahby, S. (2014). Ensuring quality education for young refugees from Syria. *Refugee Studies Centre. University of Oxford*. URL: https://www.rsc.ox.ac.uk/files/publications/other/rr-syria-youth-education-2014.pdf

Donahoe, A.D.(1999) Measuring Women's Work in Developing Countries.*Population and Development Review* 25(3):543-576DOI: 10.1111/j.1728-4457.1999.00543.x

Frolic, M.(2007) Propensity Score Matching Without Conditional Independence Assumption with an Application to the Gender Wage Gap in the United Kingdom. *Econometrics Journal* 10 (2): 359-407 DOI: 10.1111/j.1368-423X.2007.00212.x

Jefferson, T., and Preston, A. (2005), "Australia's Other Gender Wage Gap: Baby Boomers and Compulsory Superannuation Accounts", *Feminist Economics*, 11 (2).

Heckman, J. (1997). Instrumental variables: A study of implicit behavioral assumptions used in making program evaluations. *Journal of human resources*, 441-462.DOI: 10.2307/146178

Hirsch, B (2009) "The Gender Pay Gap Under Duopsony: Joan Robinson Meets Harolds Hotelling", *Scottish Journal of Political Economy*, 56(5), pp, 543-559.

Hirsch, B., Keonig,. M, and Mioller, J (2013) "Is There a Gap in the Gap? Regional Differences in the Gender Pay Gap", *Scottish Journal of Political Economy*, 60, (4).

Household Budget Survey Data, Turkish Statistical Institutehttp://www.tuik.gov.tr/ Microdata /HBA.html

Kara,O (2006) Occupational gender wage discrimination in Turkey.*Journal of Economic Studies* 33(2): 130-143DOI: http://dx.doi.org/10.1108/01443580610666082

Nopo, H (2004), "Matching as a Tool to decompose Wage Gaps", *IZA Discussion Paper* No.981, January 2004.DOI:10.1162/rest.90.2.290

Nopo, H. (2008) Matching as a Tool to Decompose wage gaps. *Review of Economics and Statistics* 90 (2): 290-299 (2008) DOI:10.1162/rest.90.2.290

Pigou, A. C. (1932). *The Economics of Welfare, 4th ed.* London: Macmillan.

Ransom, M.R., and Oaxaca, R.L (2010) New Market power models and Sex Differences in Pay. *Journal of Labor Economics* 28 (2): 267-290DOI: http://dx.doi.org/10.1086/651245

Robinson, J. V. (1969). *The Economics of Imperfect Competition, 2nd ed.* London: Macmillan.

Rosenbaum, P. R., & Rubin, D. B. (1983). The central role of the propensity score in observational studies for causal effects. *Biometrika*, *70*(1), 41-55. DOI: 10.1093/ biomet/70.1.41

Smith, J. A., and Todd, P. E. (2005). Does matching overcome LaLonde's critique of nonexperimental estimators?. *Journal of econometrics*, *125*(1), 305-353. DOI: http:// dx.doi.org/10.1016/j.jeconom.2004.04.011

Maani, S., A. and Cruickshank, A., A., (2010) "What is the effect of housework on the market wage, and can it explain the gender wage gap?" *Journal of Economic Survey*, 24 (3):402-427

Madden, J., F., (1977), "A spatial theory of sex discrimination", *Journal of Regional Science,* 17(3):369-380.

Oaxaca, R.(1973) Male-Female Wage Differentials In Urban Labor Markets. *International Economic Review* (14)3: 693-708.DOI: 10.2307/2525981

Tansel,A (2005) Public-Private Employment Choice, Wage Differentials, and Gender in Turkey.*Economic Development and Cultural* Change 53(2): 453-477DOI: 10.1086/425374

Taskin, T. (2014) GDP Growth in Turkey: Inclusive or Not?.Research and Monetary Policy Department, *Central Bank of the Republic of Turkey* 1-14. URL:http://search.proquest.com/openview/d3ce873416d4297caf9f9932f2346e87/1?pq-origsite=gscholar

United Nations Human Rights Council.http://www.unhcr.org.tr, accessed 26December 2014.

Yamaguchi, S.(2014) Changes in Returns to Task-Specific Skills and GenderWage Gap DOI:http://dx.doi.org/10.2139/ssrn.2035833

Wolaver, A., M., White, N. E,(2006) Racial wage differences among young male job changers: the relative contribution of migration, occupation change, site characteristics, and human capital. *Growth and Change* 37(1): 34–59Doi: 10.1111/j.1468-2257.2006.00303

World Bank'sTurkey Economic Reforms, Living Standards and Social Welfare Study. (2000) Report No. 20029-TU, *Poverty Ruction and Economic Management Unit*, World Bank:D.C

Appendix

Some Theoretical Information

There are many theoretical studies explaining discrimination in the labor market. Becker's discrimination theory (1971) is one of the seminal studies that explains discrimination. In the theory, discrimination arises from distaste that is modeled by means of employers' utility functions. In the theory, employers do not only regard profit, but also consider gender, race, or the origin-based composition of their workforce depending on their taste. For example, an employer who is nepotistic toward females (or males) will obtain positive utility by hiring females (males). Nevertheless, Becker's discrimination theory has been criticized because it is not clear about regional differences. Additionally, his theory would be costly for employers in a long-run competitive market (Madden, 1977). For these reasons, I adopt Hirsch's (2009) spatial duopsony model, which uses a Hotelling-style duopsony model and Robinsonian discrimination. Hirsch's theory informs a simple duopsony model of the labor market in which workers and employers are located in different places and the assumptions are as follows:

There are equally productive workers and a number of competitive firms. Firm j and its two direct competitors, firms j - 1 and j + 1, which are both at an equal distance Y from this firm. All workers face travel costs including direct and indirect (time, opportunity) costs. Workers' homes are equally distributed along the real line on the density function D, and firms' wage offers are independent of distance. Firm j pays a wage w and its competitor pays $w1$. A worker is located at distance y from his or her workplace, so $0 \leq y \leq Y$. Workers choose their employers such that their incomes are maximized. If t is the travel cost per unit of distance, a worker's income acquired from firm j is w −ty and from j's competitor