Work Session on Gender Statistics
Neuchâtel, 15 - 17 May 2019

Gender wage differences and their determinants in Italy

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Introduction

Participation of women in the workforce contributes to their empowerment; also receiving the same wage treatment than men creates an environment in which they can become economic, social, and political forces.

Properly analyzing the sources of gender wage differentials is an important issue to understand if it is a matter of discrimination and if there are useful elements to fill the disadvantages of women compared to men.

The purpose of this paper is to provide a detailed and comprehensive representation of wages in Italy in small enterprises of the private sector and of the most significant variables mainly contributing to determine wages.

Data

Multiple administrative and statistical sources, integrated at micro-data level and referring to individual job positions:

i) ASIA statistical register and information system on employment;

ii) RACLI thematic register, extension of the aforementioned “information system on employment”;

iii) Extended register Frame-SBS.

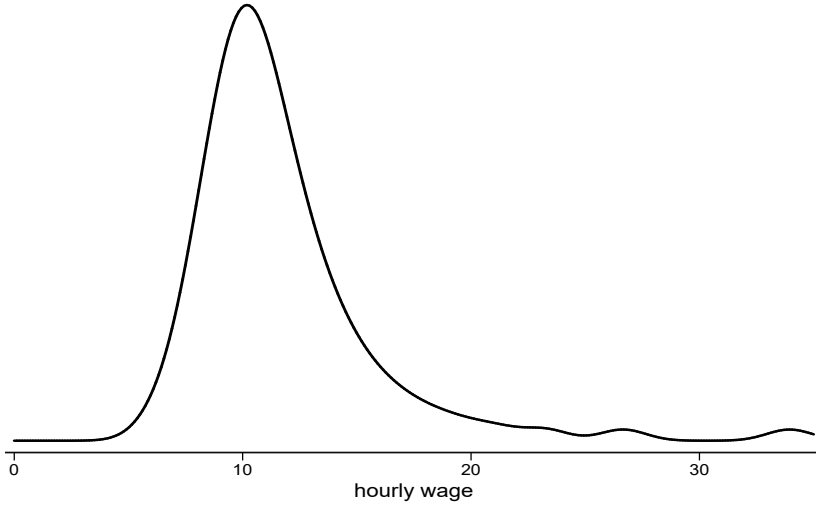
Data refer to **year 2014.**

Analysis is restricted to **private sector employees**, in uni-localised active enterprises with less than 50 employees:
-1 million 404 thousand enterprises
(1/3 of the private enterprises with dependent employees)
- 7 millions 830 thousands job positions
(48% of the dependent employees in private sector).

The Hourly Wages Density Distribution*

It is a right-skewed distribution; the Gini index is 0.185 and the quintile share ratio s80/s20 is 2.4

(the ratio of total hourly wages received by the 20% of the employees with the highest wages to that received by the 20% of the employees with the lowest wages)



** The hourly wages are weighted by yearly paid hours of work (Brandolini, Rosolia 2016)*

The Factors Mainly Contributing to Determine Wage Levels*:

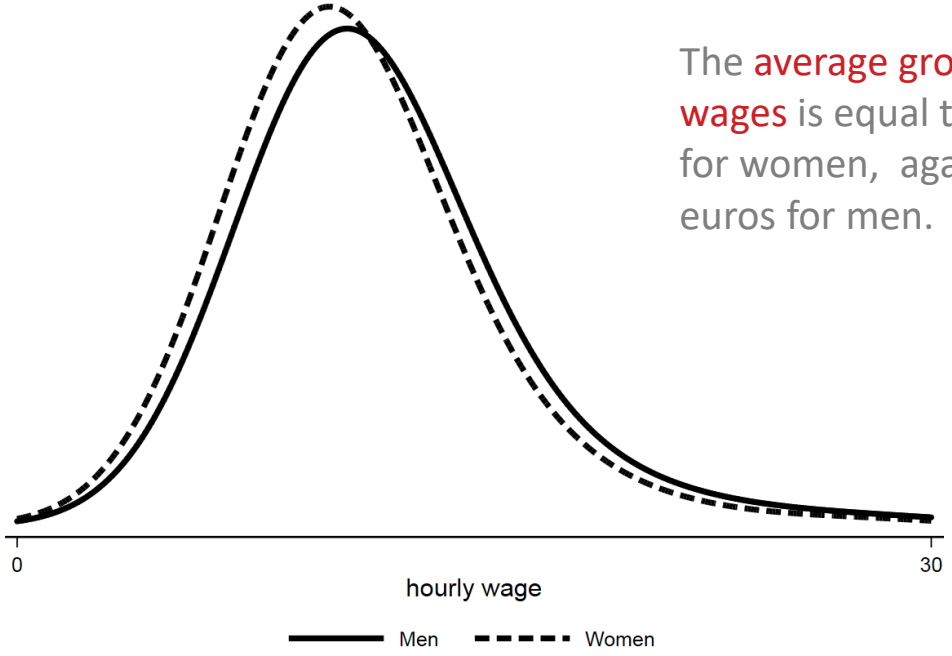
- Professional qualification (30% of the wages variability in logarithmic form)
- Enterprise productivity (value added level per employee) (12%)
- Length of continuous service in the enterprise (tenure) (2.9%)
- Sex (2.1%)
- Age (1.4%)
- Economic activity sector (1.4%)
- Group membership (1%)
- L.U. region (0.7%)
- Education level (0.6%)

The following variables enter the model and, together, explain less than 1%:

Enterprise size, Citizenship, Enterprise share of dependent employment , Type of contract, Value added per inhabitant, Contract coverage in the year, Enterprise export propensity, Number of job positions, Non-observed economy rate, Irregular work rate, Enterprise age, Municipality type (degree of remoteness), Unemployment rate in the Local Labour Systems, Share of dependent employees on total employees of the Local Labour Systems, Potential labour forces rate, Unemployment rate aged 25-34, Employment rate aged 25-34

** Regression model for log-hourly wage, R^2=0.53*

The Hourly Wages Density Distribution by sex



The average gross hourly wages is equal to 11.30 euros for women, against 12.42 euros for men.

The Net Effect of Sex on Wage

Holding all other independent variables' modalities constant, the job positions held by women are paid 9% less than those held by men.

The hourly pay difference between men and women increases as the salary level increases: the value of the first decile for positions held by women is about 6% lower than that of men and the gap rises to 12% for the last decile.

Inequality Indices Decomposition - Oaxaca-Blinder

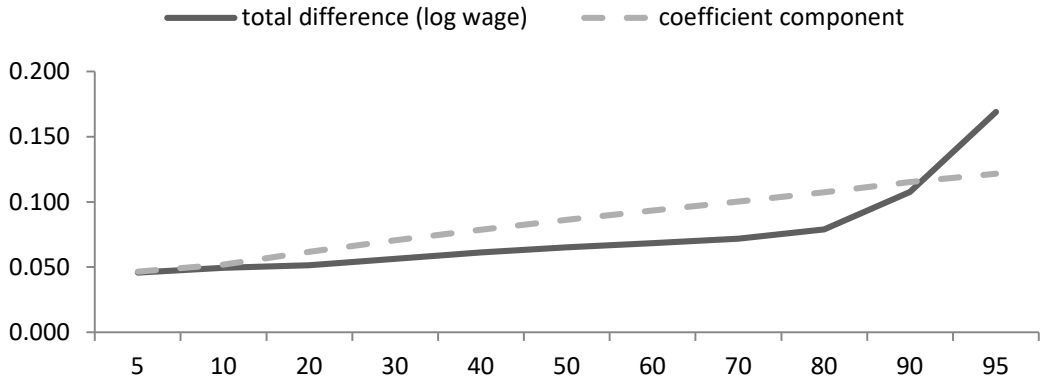
Wage inequality is higher among men than women, especially at the upper end of the wage distribution.

[Oaxaca-Blinder Decomposition
By using linear regression models, the difference in average wages between males and females is decomposed into two additive components: one attributable to differences in average characteristics of the individuals (characteristic component), and the other to differences in the rewards of these characteristics (coefficient/unexplained component). The coefficient component contains the effects of both gender differences in unobserved characteristics rewarded by the market and discrimination' in the labor market. The linear regression models explain only about half of the wage variability.]

If women had "the same endowment" as men, their wage levels would decrease by an additional 3% (women have better endowments than men).

It follows that the unexplained gap is about 12%.

Decomposing Gender Wage Differentials across the Wage Distribution



Wage differences among men and women increases as the wage level increases.
The unexplained component is always higher than the observed gender wage difference, confirming that women have better endowments than men for each wage level.
Furthermore, the weight of the unexplained component increases as the wage level increases …
… at the top of the wage distribution there's a possible glass ceiling effect*.

* It's an invisible barrier preventing women rise in leadership positions.

Inequality Indices Decomposition by Professional Qualification

Both for men and women, wage inequality increases as the professional qualification and wage level increases, following the more marked increase of the within component.

The inequality among women, in comparison with men, is :

- similar for managers or executives at the bottom of the wage distribution and lower at the upper of the distribution;
- lower for white or blue collars;
- higher for apprentices.

Oaxaca-Blinder Decomposition by Professional Qualification

Gender wage differential increases as the professional qualification increases: 3% among apprentices, 14% among managers.

The unexplained component increases as the professional qualification increases: from 51% among apprentices to 86% among managers.

The endowment component decreases as the wage level increases.

The "negative" endowment effect disappears when the analysis is conducted by professional profile: the highest women endowment - on average - is essentially the effect of a lower spread of women among lowest professional qualifications.