# Gender disparities in housework over the long run: A comparative analysis of France, Italy and the United States

#### **Abstract**

Individuals' use of time has dramatically changed across the last decades in most industrialized countries. However, women still perform the bulk of non market work. This paper addresses two main questions. Firstly, what change is observable in the patterns of men and women's time spent in housework and childcare over the past 3 decades in France, Italy and the US? Secondly, which factors play in favor or against the gender gap in housework and parenting? Is it technical progress and externalization of tasks, changes in family structure, changes in labor force participation, and or social changes and changes of norms? There is a slight decrease of the gender housework time gap over time, mainly due to the decrease of female participation in domestic tasks. Decomposition analysis shows that these trends are due to changes in practices rather than changes in individuals' characteristics.

#### **Background**

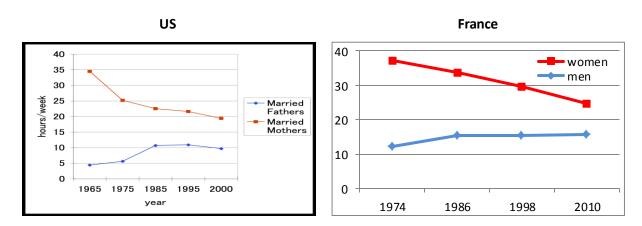
In most industrialized countries, individuals' use of time has dramatically changed across the last decades (Gershuny, 2000; Aguiar & Hurst, 2007; Robinson & Godbey, 1997; Huberman & Minns, 2007). From the 60ies, individuals have more free time, they spend less time doing housework and at work. These changes result from different factors. Structural changes in the labor market and population such as the increase in the number of retired people due to the population ageing, the decrease of the number of large families, the increase in the number of unemployed people due to economic hardship and industrial restructuring have reduced working time and increased leisure time. The considerable increase in female labor force participation has contributed to reduce housework time. Above these structural effects, technological progress in home activities has also reduced the domestic workload. Changes in individual preferences, norms and attitudes have also participated to these trends.

Even with the generalization of dual-earners couples, huge gender inequalities still exist and women still perform the bulk of domestic and parental tasks (Lachance-Gzela & Bouchard, 2010). The male involvement in unpaid work evolves slowly. However the time spent by men on home production evolves quite differently whether we consider only housework activities or childcare activities. Many studies on changes in parental time over the years show that despite the increasing participation of

women in the labor market, parental time has increased significantly over the last few decades, (see Gauthier, Smeeding and Furstenberg, 2004 for Canada; Sayer, Bianchi and Robinson, 2004; or Bianchi, 2000 for the United States; Fisher, Mc Culloch and Gershuny, 1999 for Great Britain), except in Sweden where it fell between 1984 and 1993 (Klevmarken and Stafford, 1999). Parental time has increased for women to some extent, but especially for men, and the gender gap has been substantially reduced (Gauthier et al., 2004, Bianchi, 2000 for the United States; Fisher, Mc Culloch and Gershuny, 1999 for Great Britain; Bittman 1999 for Australia).

For domestic time (excluding childcare), trends are different. Trends in the male-female distribution of domestic activities in the US and France show almost the same pattern of the last several decades (see figure 1): in both countries, the relative share of housework done by women has been decreasing. However, this (relative) reduction is mainly due to a reduction of the time spent by women on unpaid work, rather than by an increase in male participation (Chenu 2002). The time spent in housework by men has remained more or less constant since the mid 1980's (see figure 1). Of course, the gender gap in domestic work is not of the same magnitude in all of the industrialized countries. For instance, it is greater in Italy than in Sweden (Anxo et al, 2012). Nonetheless, it is apparent even in countries which made substantial progress toward gender equality, such as European Nordic countries.

Figure 1: Total hours in primary housework activities per week



#### **Research question**

This paper analyses the persistence of the gender gap in domestic work. The aim of this study is twofold. First it intends to describe the long term evolution of male and female involvement in housework and parenting in France, Italy and the US. Second, it aims at disentangle factors in favor

or against the gender gap in housework and parenting, i.e. technical progress, changes in family structure, changes in labor force participation, social changes and changes of norms.

The changes in the average times of men are of small magnitude but it might mask opposite forces that might balance in average: a general decrease of time spend on domestic work against a higher requirement of male participation to home work with the development of dual-earner couples. It might also hide other changes in the remaining part of the home production distribution, which concern only certain groups of people or types of couples.

#### Data

The four countries selected belong to different welfare state regimes, and have different labor market regulations, family and work life reconciliation policies.

Time-use Surveys represent a unique and precious source of information on daily activities. They use the time diary technique, whereby individuals report their time-use during the previous 24 hours, providing extremely detailed information on the activities performed during that day. The diary days are randomly distributed across days of the week for both men and women. Besides the diary, all the data sets contain rich sets of information on the background and socio-economic situation of individuals and households.

We select 3 surveys for each country:

- 1985, 1998 and 2010 for France
- 1989, 2002 and 2011 for Italy
- 1985, 1994-1995 and 2010-2012 for the US

The three surveys are quite comparable in terms of questionnaire and methodology but present some differences in the sample design and the daily diaries. However, the patterns of time allocation by gender and age are quite comparable across surveys, because the 24 hours booklet gives a common picture of daily schedules.

We select for each country a sample of men and women in working age, belonging to one-family household. For parental time our sample is limited to individuals with at least one child under 18.

We define housework as cooking, dishwashing, laundry, cleanup, shopping, bookkeeping, administrative tasks, care of other family members, repair and maintenance within and outside the house and transports related to these activities.

Childcare includes activities directly aimed at household's children: physical care (e.g. minding, feeding, washing), Interactive childcare (e.g. homework, conversations, sports) and transports devoted to children.

#### Method

The decomposition proposed by Blinder-Oaxaca for decomposing the gender wage gap can be easily extended to the decomposition of change of housework time over time (Le & Miller, 2004; Smith & Welch1989).

For the change of the gender gap in housework from year 1985 to year 2010, the decomposition can been written as follow:

 $d(\ln Tf) - d(\ln Tm) = (dXf - dXm) bf10 + (dbf - db) Xf85 + (dbm - db) Xf85 + gX85 * dbf + dXf *gb10 + du$ 

The first term on the right-hand side of the decomposition denotes the change in the gender gap in housework due to changes in the characteristics between female and male. The second and the third terms capture changes over time for the differences between the actual and pooled returns for women and men in 1985, respectively, which is considered as unexplained by characteristics, and thus norms.

The final two terms represent the interaction effect which is the mixture of the gender gap and changes over time. The first of the interaction terms represents changes in the coefficients over time weighted by the gender gap in 1985. When male is used as the reference group, the positive term indicates an increase in the coefficient where males have an advantage. The second interaction term denotes changes in characteristics over time weighted by the gender gap in the coefficient in 2010. A positive value of the term indicates growth in characteristics over time where they were disadvantaged in terms of the time.

Our dependent variables are wen's time, women' time and the time gap for housework and childcare respectively. Our interest varaibles are dummies for years and we control for Family structure (number & age of children), marital status (married, unmarried, second unmarried union), Age (+ age gap), Level of education (college, high school, technical diploma, lowest level) (+ education gap), Employment status (in employment, unemployed, inactive, other inactive) and social class (executive, intermediate, self employed, employees & clerks), Homecare services (paid household assistance, deliveries of shopping and ready made meals) and home equipment (washing machine,

dishwasher, freezer, microwave) and Day of the week (weekday, weekend), number of rooms, size of settlement.

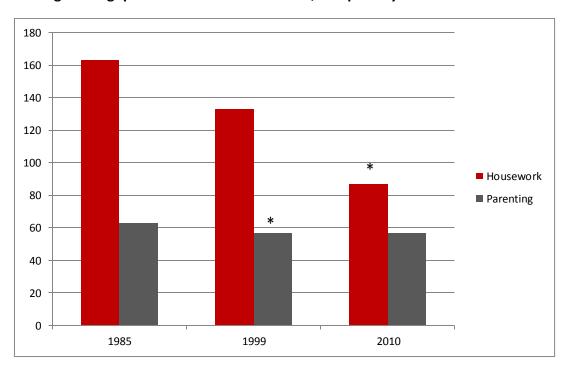
## Results

Up to now, analysis has been conducted for France and will be extended to the 2 other countries.

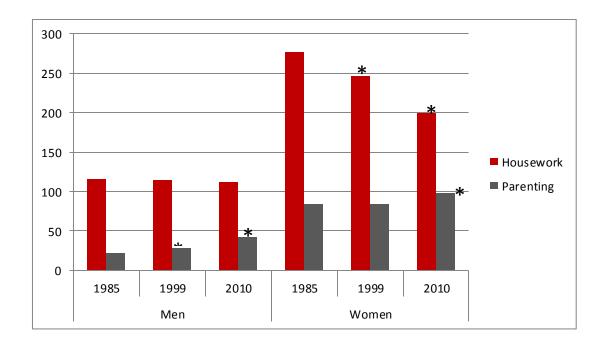
#### 1. Descriptives

Women perform much more housework than men, but there is a significant decrease in this time gap over time. In 1985, women spend more than 2 hours and a half per day doing housework, less than 1 hour and a half in 2010. The gap is lower for childcare, and sable around 1 hour from the 80ies. We clearly see that it is the decrease of female average housework time drives the reduction of the time gap. For childcare, both men and women increase their time.

#### Average time gap between women and men, min per day



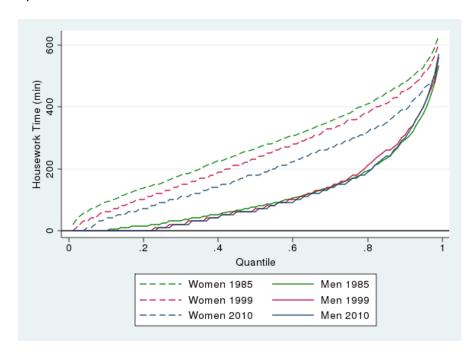
Average housework and parenting time, min per day



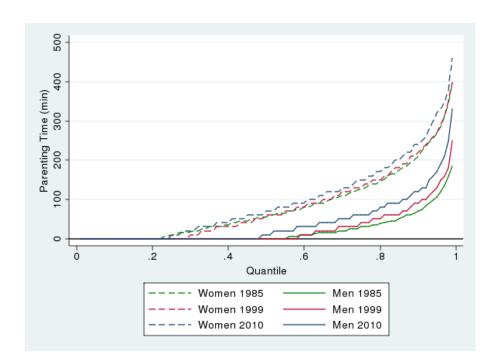
There is a reduction in housework for women, whatever the quartile. In other words, all women decrease their involvement in housework over time. For men, there is no change, even for men in the top of the distribution. For childcare, the increase is a little bit higher in the top of the distribution, for women and men as well.

## **Evolution over quantiles:**

## a) Housework



## b) Parenting



# 2. Decomposition of change

The decomposition shows that the drop is mainly explained by changes of practices for a given characteristic, rather than changes in the characteristics of the population.

For childcare, there is a significant increase for women in the last decade, and over 25 years for men.

Again, the rise is mainly explained by changes of practices for a given characteristic

## **Decomposition of individual housework**

	Women		Men	
Housework	1985 - 1999	1999-2010	1985 - 1999	1999-2010
Differential	-31,17***	-46,94***	-0.79	-2,03
Characteristics	-8,65	-3,47	2.76	3,28
Returns	-22,52***	-43,47***	-3,55	-5,30

	Women		Men	
Childcare	1985 - 1999	1999-2010	1985 - 1999	1999-2010
Differential	-1,08	12.13***	5.37***	13.12***
Characteristics	-2.02	2.49	2,94**	3,01***
Returns	0.93	9.64***	2.43	10.06***

Now have a look at which characteristics have played in the change in housework time (we observe the number of minutes due to changes in employment, family size...).

The decrease of housework for women is driven by the decrease of inactive women over the 25 years, the progression of unmarried couples & education level during the 90ies, the increase of externalization during the last decade. For men the progression of housework is linked with the increase in male unemployment and with the increase in their spouse employment.

The increase of childcare for women is driven by the progression of their education level and externalisation of housework, the progression of female participation reduces childcare time. For men the progression of childcare is linked with the increase in their education level and the decrease in their spouse participation rate (small effects).

The decrease in family size reduces parental time during the 90ies; its increase during the last decade goes in the opposite direction.

#### **Changes in characteristics- Housework**

	Women		M	en
	1985 - 1999	1999-2010	1985 - 1999	1999-2010
Family structure	0,5	0,0	0,2	0,6
Marital status	-3,2 ***	0,1	0,1	0,8
Education level	-4,0 ***	-1,0	0,8	-0,2
Professional status	-5 <i>,</i> 6***	-5 <i>,</i> 7***	2,8 ***	1,7
Spouse professional status	-0,5 *	0,0	1,1 ***	0,6
Home equipement	-1,9	3,4*	-3,1	-1,6
Externalisation	0,4	-2,2 ***	-0,9	-0,1
Other	5,6***	1,7	1,8	1,2

#### Changes in characteristics- Childcare

Childcare	Women		Men	
	1985 - 1999	1999-2010	1985 - 1999	1999-2010
Family structure	-1,9 *	4,7 ***	-0,5	1,6***
Marital status	-0,5	0,4	0,2	0,4
Education level	2,2 ***	0,4	0,8***	0,2
Professional status	-1,5 **	-1,8 ***	0,4	0,4
Spouse professional status	-0,2	-0,1	0,1*	0,4 **
Home equipement	-0,7	0,5	1,7	-0,5
Externalisation	1,4 ***	-0,2	0,4	-0,4
Other	-0,9 *	-1,2	-0,2	0,9 *

In France there is a slight decrease of the gender housework time gap over time. It is mainly due to the decrease of female participation in domestic tasks. There is also a slight increase in childcare for men and women. Trends are due to changes in practices rather than in individuals' characteristics. Among structural factors the main drivers of changes in female time are the increase of female labor market participation, of female level of education and in outsourcing. It also comes from fewer married couples. Increasing housework time for men is mainly due to more male unemployment and to the fact that their spouse are more frequently employed.