

GENDER, EDUCATION, AND THE TEACHING PROFESSION IN EUROPE

Héctor Cebolla Boado (UNED)

ETUCE - Education Trade Unions Addressing Gender Equality Through
Social Dialogue
28-29 March 2019

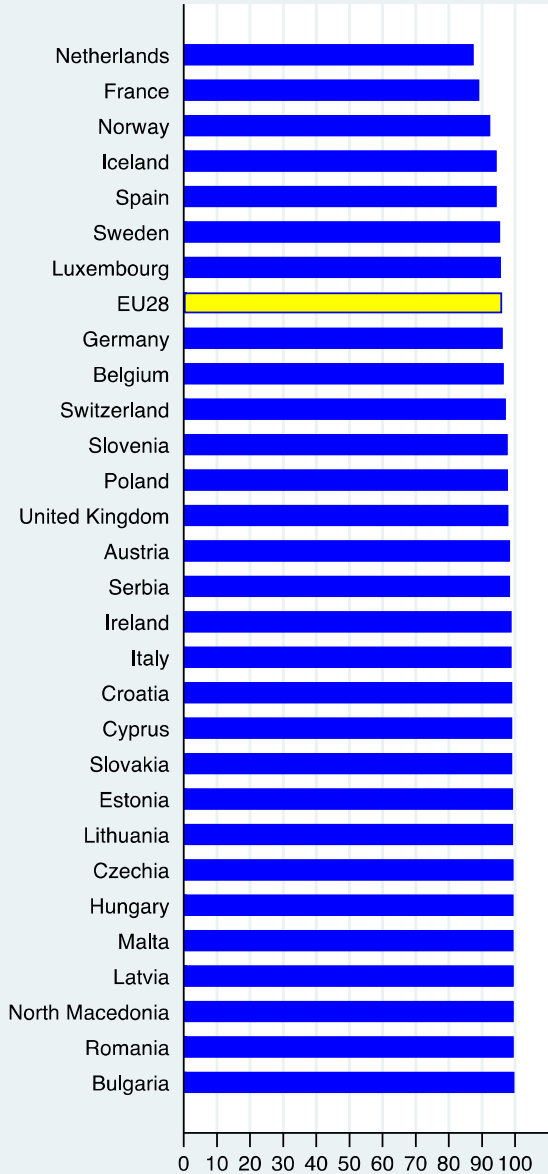
- How much feminization?
- Why that much?
- What consequences?
- Gender differences in what makes a good teacher?

HOW MUCH FEMINIZATION?

Feminisation of teaching profession

- Deep historical roots
 - 1800s women suited for the role of raising and training citizenry
 - Mass education: women's own aspirations for an alternative to the narrow opportunities available to them
- What feminisation?
 - A '**culture**' associated with women.
 - Men dominate managerial positions
 - The **numbers** of women within the profession
 - **Stratification** towards preprimary and primary.

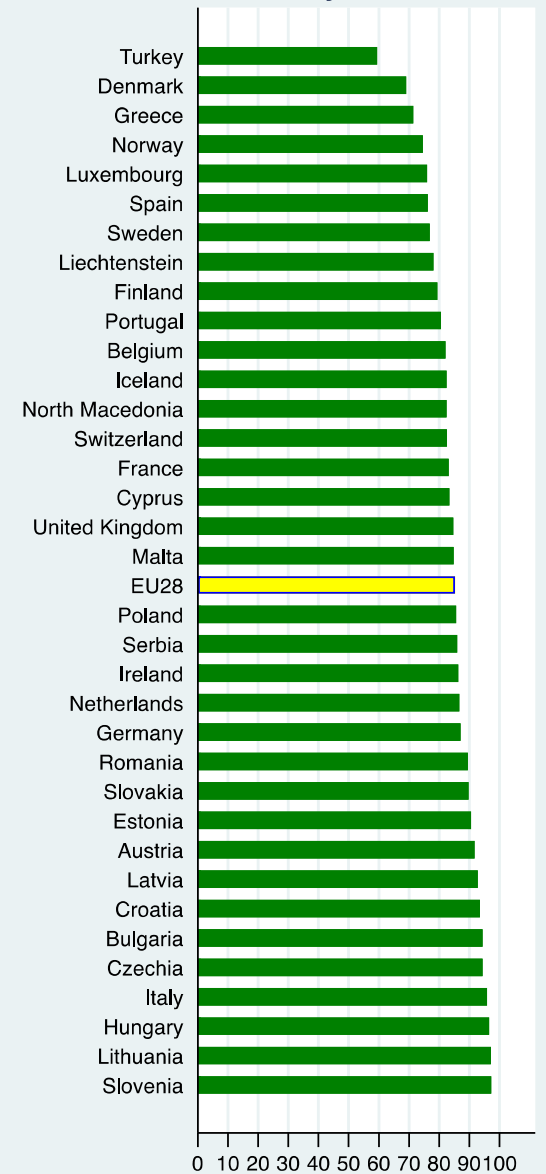
Early childhood education



Preprimary education



Primary education



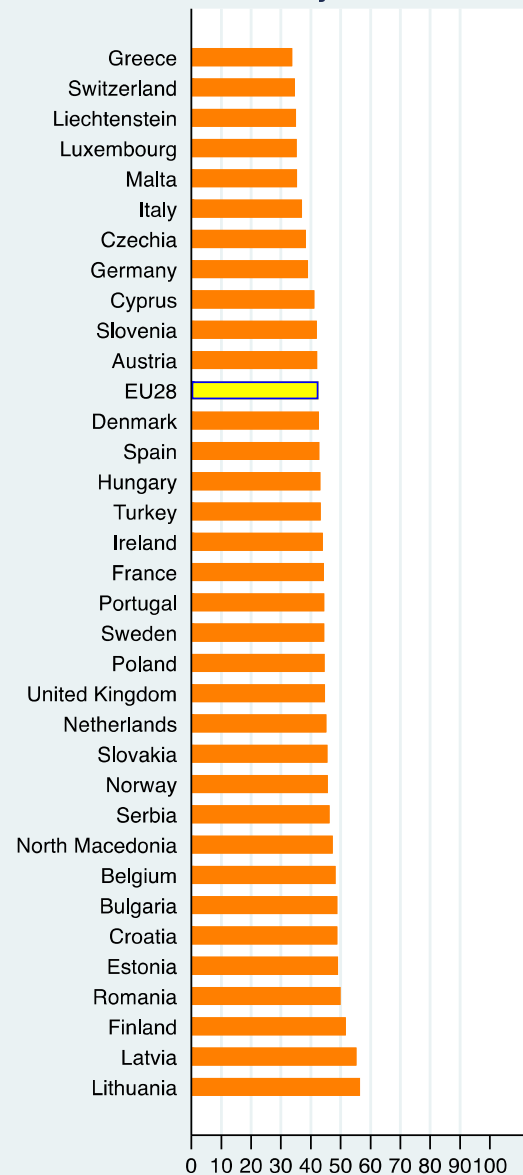
Lower secondary education



Upper secondary education



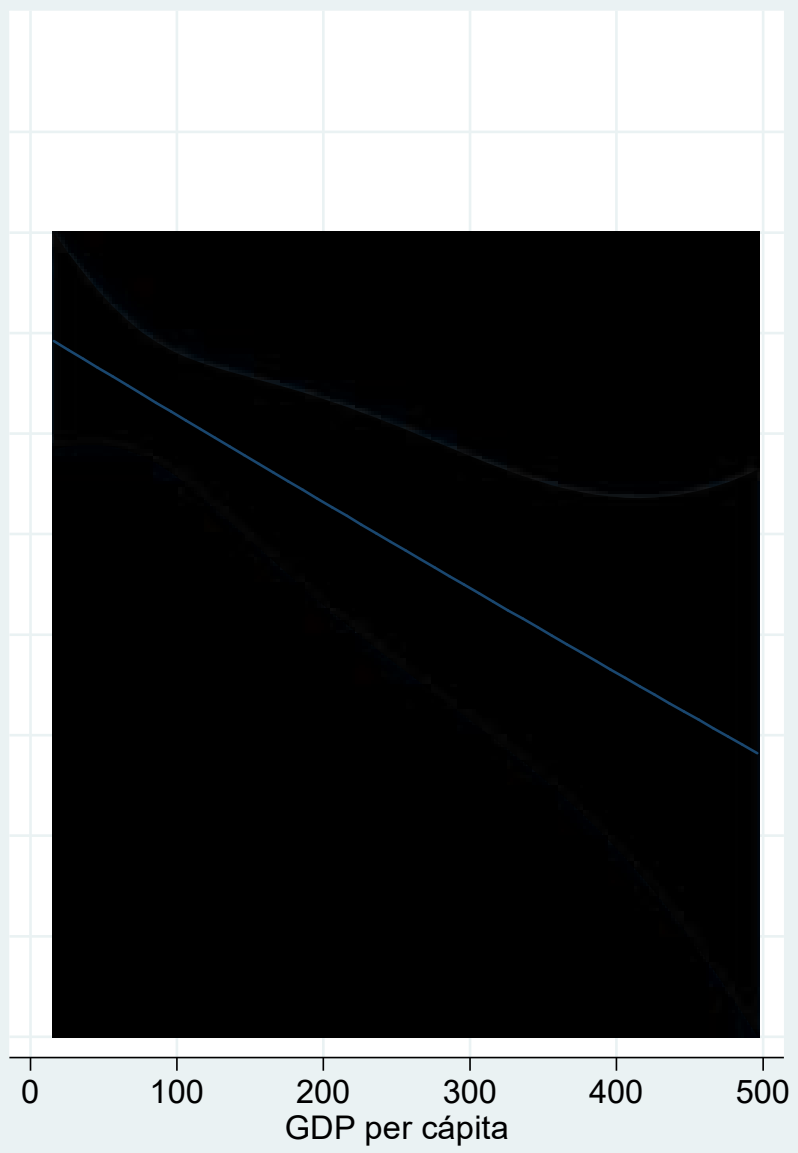
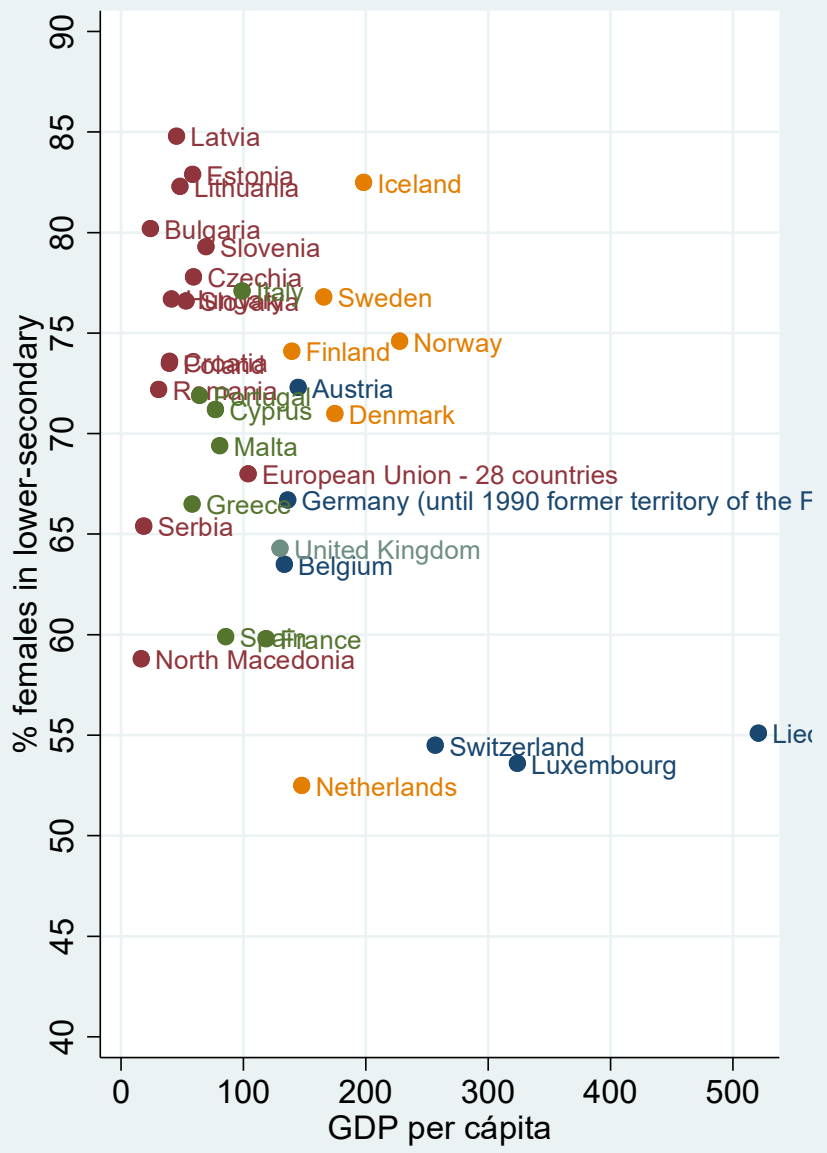
Tertiary education



WHAT EXPLAINS THE FEMINIZATION

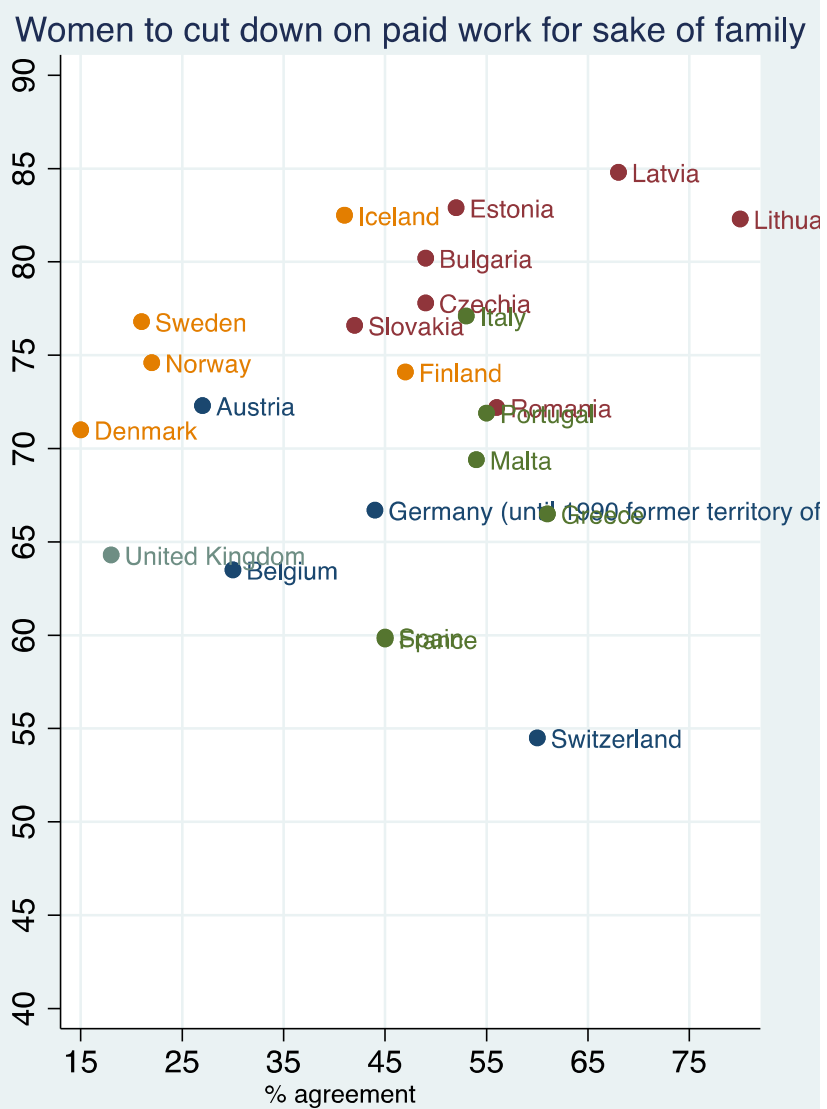
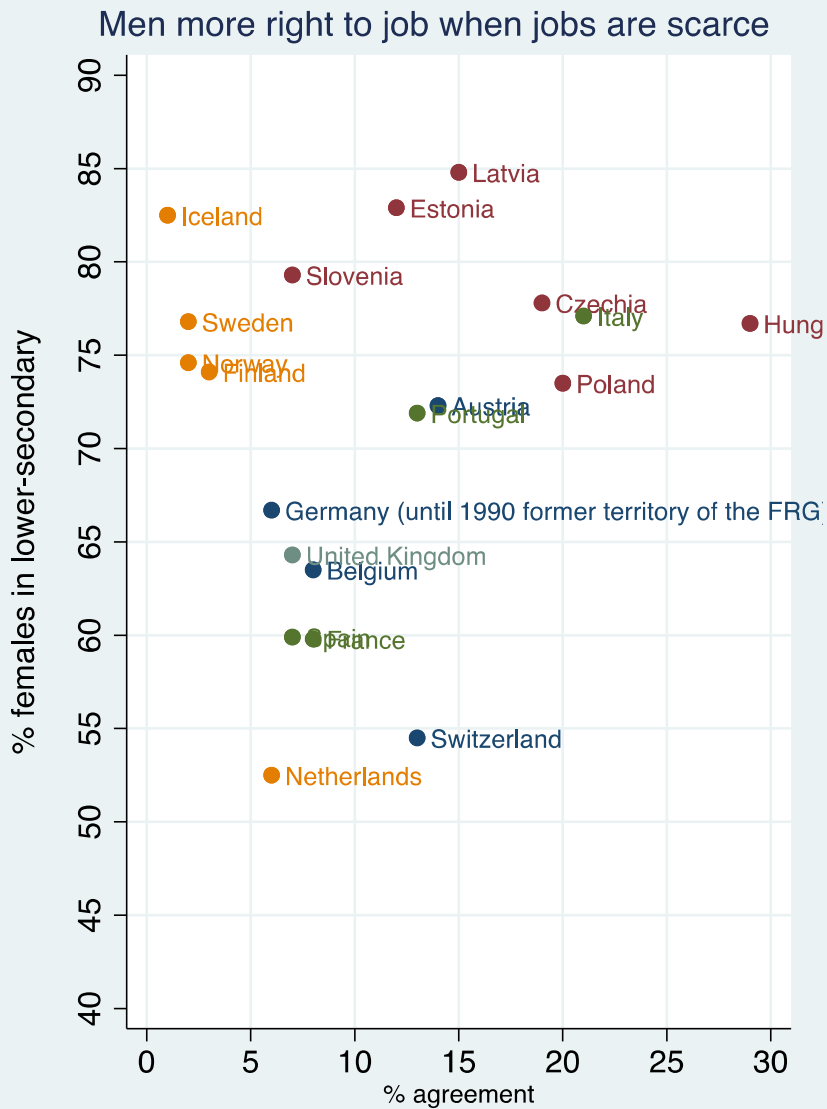
- Wealthier countries → less feminized
 - Requirements for economic efficiency: discrimination is costly:
- More progressive countries → less feminized
 - However, some of the most sex-segregated labor markets are found in the most gender-progressive countries

What explain these differences? GDP



Source :Eurostat

What explains these differences? Gender attitudes



Source :Eurostat

IMPACT OF FEMINISATION

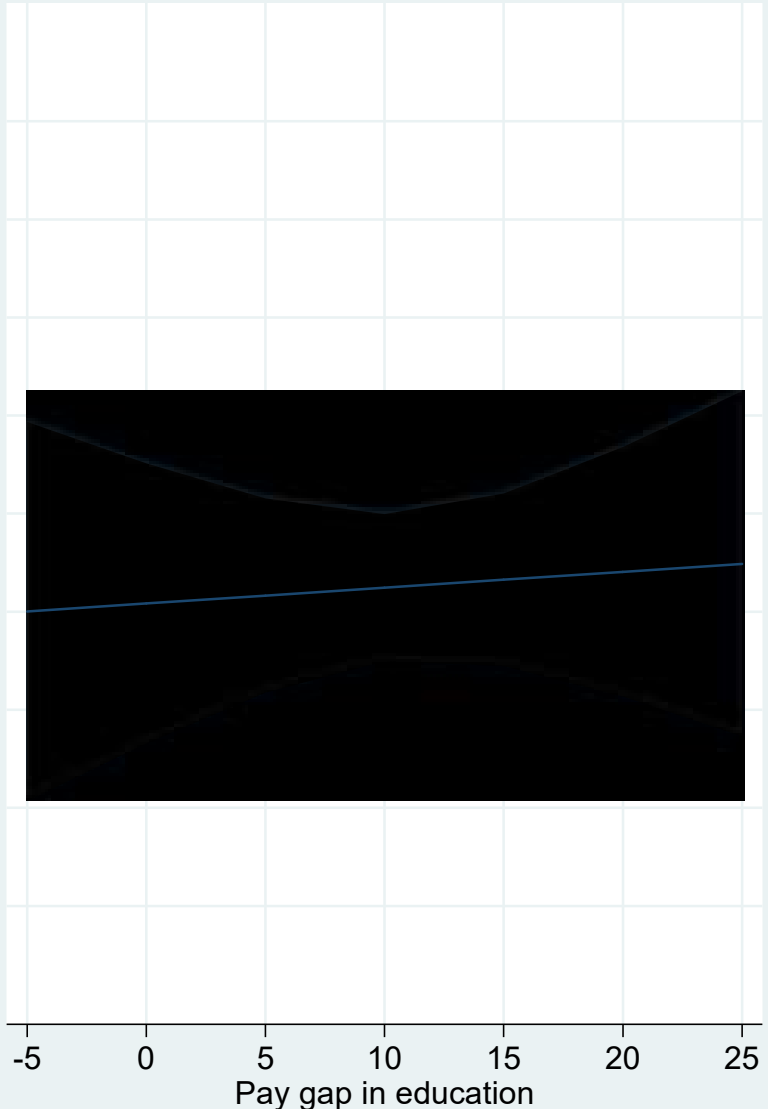
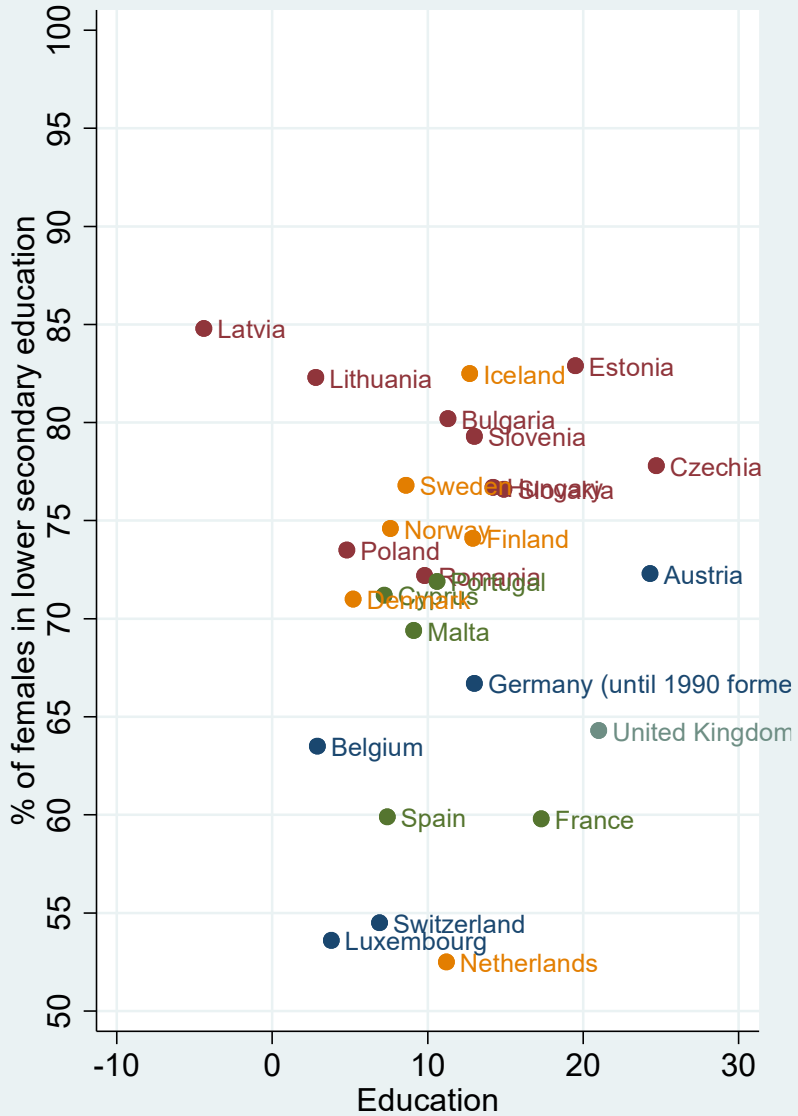
Does it matter?

- Is it bad?
 - Implications for feminism (Griffiths 2006)
- Most societies find it annoying
 - ‘The Quality of the Teaching Workforce’: the decline in the proportion of men in teaching is an issue of concern for policy-makers (OECD, 2004).
- Why?
 1. Prestige of teaching profession
 2. Unfair for the other gender
 3. Gender gap in STEM
 4. Male educational failure
- Really? Mixed evidence
 - **Non-existent** (to small) effect using **observational data**
 - Systematic sorting of students into classrooms makes it difficult to identify causal effects
 - **Small** effects using **experimental evidence**
 - Random sorting of teachers and students

2.1 Prestige of teaching profession

- Teachers are the most important ingredient of educational quality.
- Loss of prestige following feminisation
 - Calls for more men to enter the profession as a means of raising the profession's status and desirability as a professional career choice

Pay gap in education and % females



2.2 Unfair for other gender

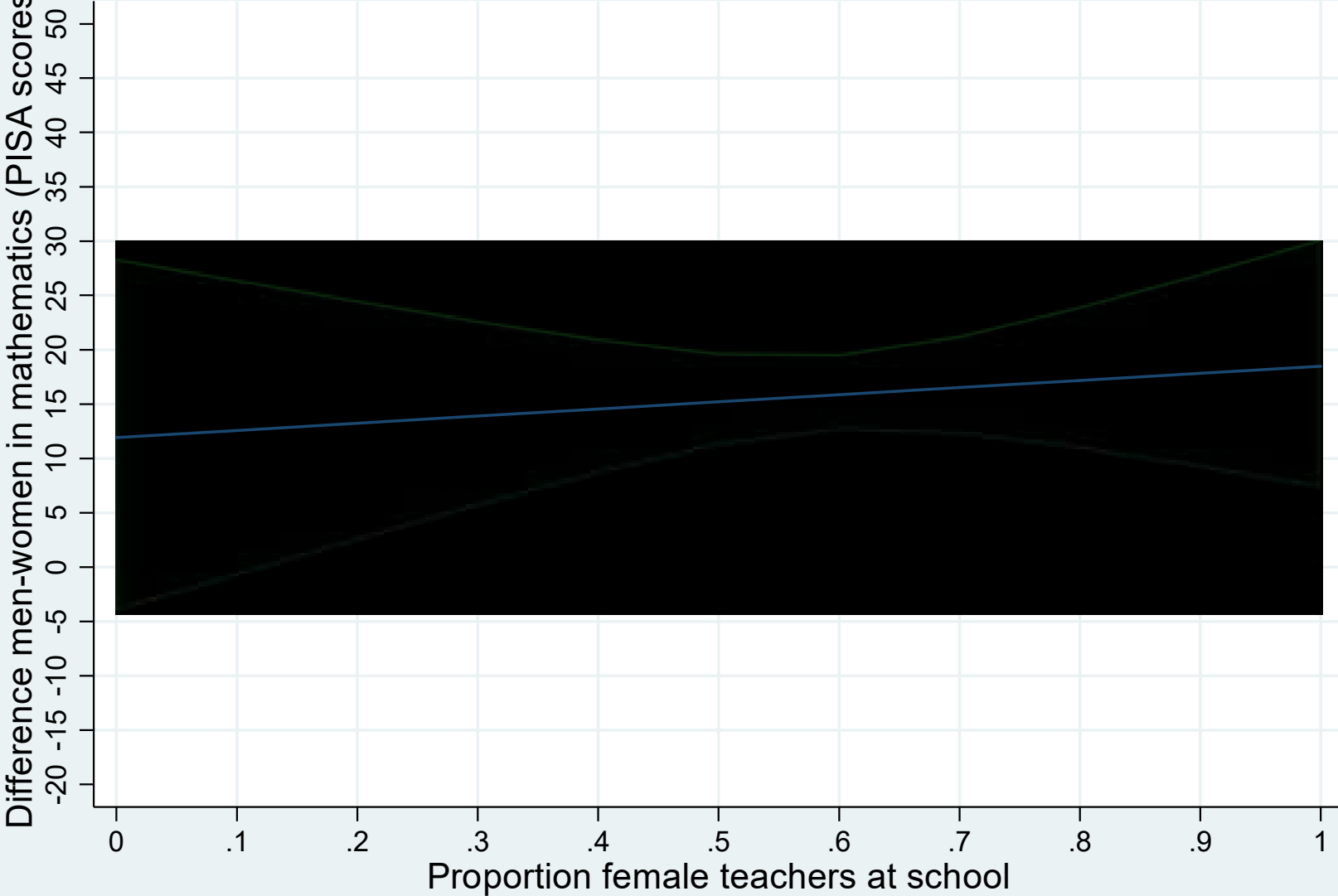
- Teacher–student interactions benefit one sex at the expense of the other (Paredes 2014).
 - Impact on student performances and career decisions
 - (Antecol, Ozkan, & Serkan, 2015; Dee, 2007; Holmlund & Sund, 2008; Muralidharan & Sheth, 2016; Paredes, 2014; Winters, Haight, Swaim, & Pickering, 2013; Bettinger & Long, 2005; Bottia, Stearns, Mickelson, Coller, & Valentino, 2015; Carrell, Page, & West, 2010; Griffith, 2010; Hoffmann & Oreopoulos, 2009; Price, 2010).
- Why?
 - **Organization:** teachers from different gender may structure their classroom, select topics, communicate, evaluate and provide examples differently.
 - **Role-model effects:** more student engaged with same-gender teacher & opposite-gender teachers strengthen stereotypes
 - **Gender specific effects:**
 - Gender gap in STEM
 - Male underperformance

2.3 Gender gap STEM

- Disadvantage emanates from a stereotyping of female cognitive ability
- Huge public concern:
 - Implications for gender equality
 - Shortage of STEM workers
- **Math anxiety hypothesis (Antecol et al., 2015)**
 - **Beilock et al. (2010)**: more anxious female teachers endorse the stereotype “boys are good at math, and girls are good at reading”

Gender in mathematics - % of female teachers in school

Gender gap in mathematics (males-females)



Source :TALIS-PISA Link (Spain)

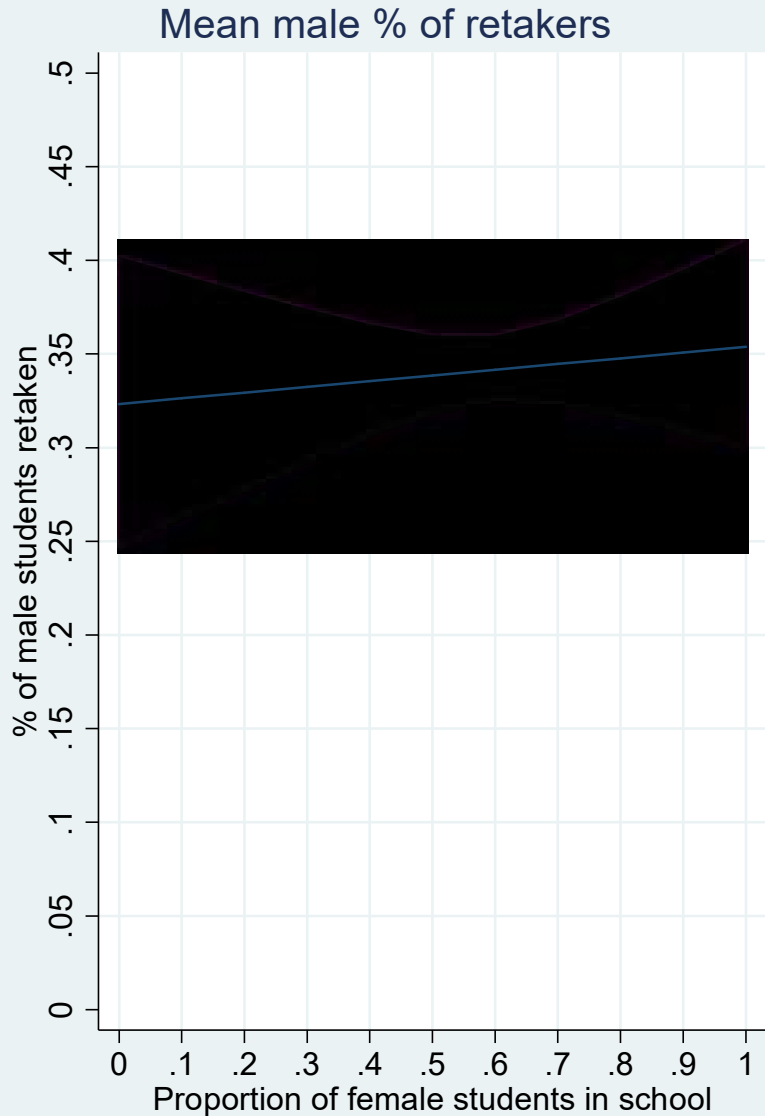
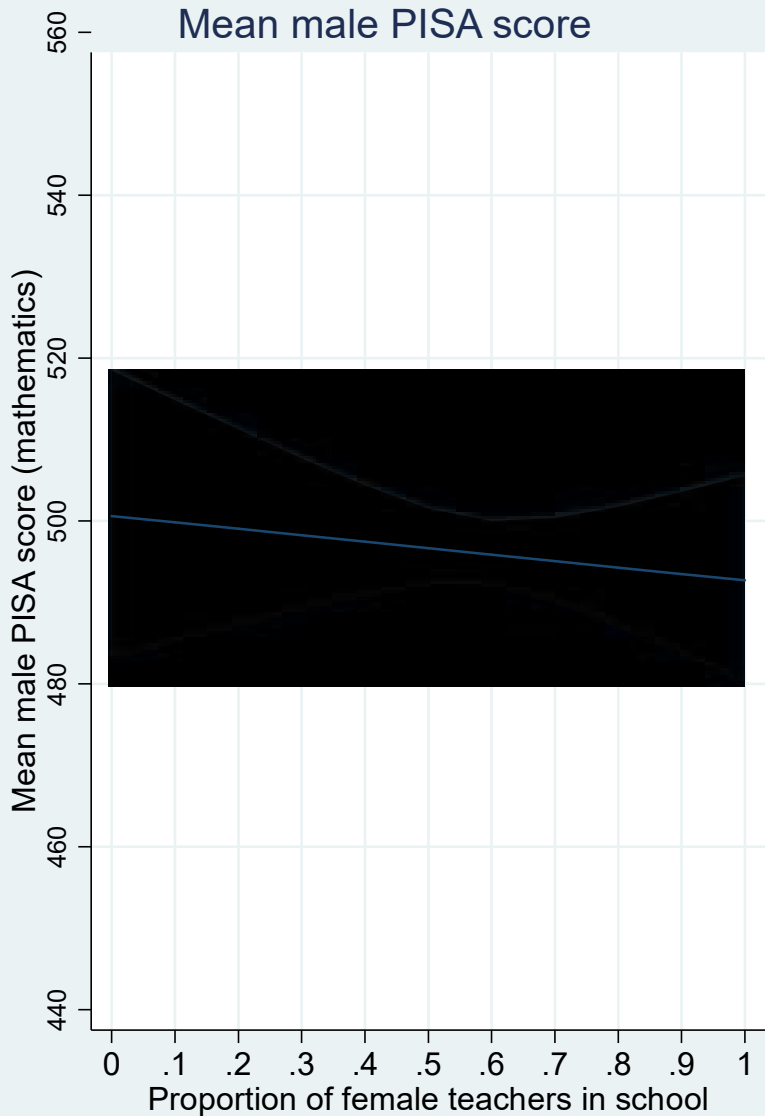
EXPERIMENTAL EVIDENCE

- Antecol, Eren & Ozbeklik (2015)
 - Randomized experiment that was conducted to evaluate the effectiveness of the Teach for America (TFA) Program.
 - Female students assigned to a female teacher → lower math test scores.
 - Becomes (marginally) positive in the classrooms where the female teacher had a math or a math-related major in college/post-college

2.4. Male school failure

- Female teachers, feminized curricula, assessment regimes and teaching methods → male underachievement
 - UK to encourage more males into teacher training colleges since the late 1990s (Carrington and McPhee, 2008).
- But...
 - **Not strong causal evidence**
 - Probably better to unpack societal constructions of masculinities and how this impacts on boys in certain contexts

Male underachievement - % female teachers in school



EXPERIMENTAL EVIDENCE

- Lavy 2004
 - Blind and non blind grading in high school in Israel
 - The bias estimated was clearly against boys.
 - Range from 0.05 to 0.25 of a standard deviation of the blind-score distribution.

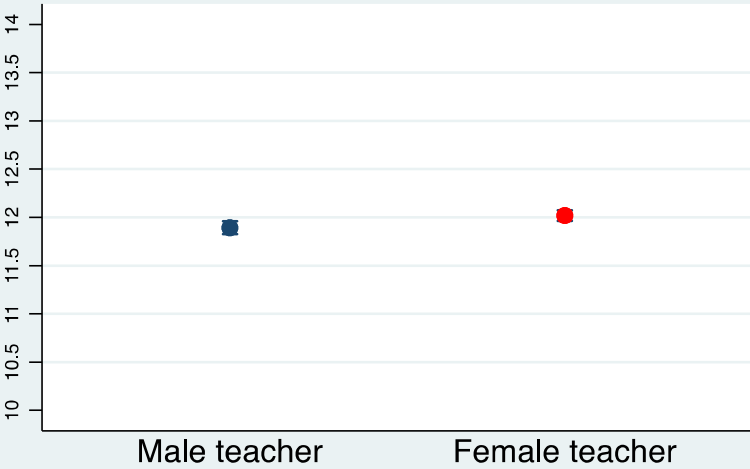
WHAT MAKES A GOOD
TEACHER?

What makes a good teacher?

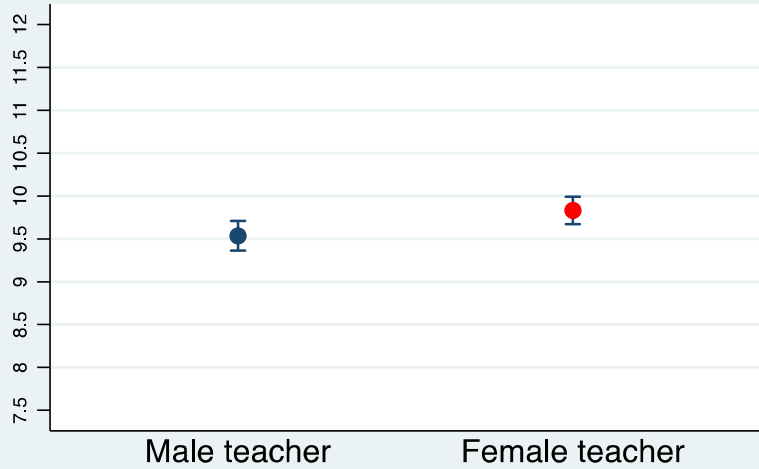
- **Background** of teachers?
 - Easy to measure: formal education, experience or credentials.
 - Little scientific evidence showing a direct impact on student achievement
- Other common ideas...
 - Teachers with strong **pedagogical knowledge** are more effective
 - Teachers' **verbal ability**
 - **Academic skills** measured by scores in achievement tests
- Newer arguments: **self confidence** and **self efficacy**.
 - Intangible features: belief in their own abilities or an ability to connect with students.
-

Male and female teacher's self efficacy

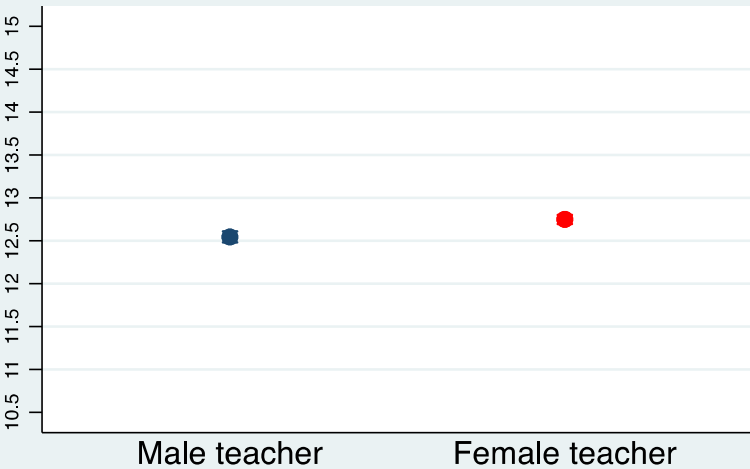
Teacher self-efficacy



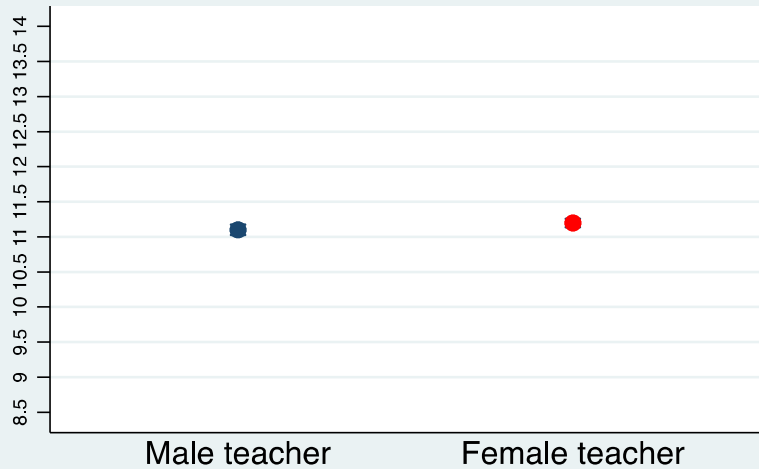
Efficacy in mathematics



Efficacy in instruction



Efficacy in student engagement



Conclusions

- **HOW MUCH FEMINIZATION?**
 - High levels of feminization across Europe.
 - Bias towards early stages of the educational path
- **WHY?**
 - GDP but no gender equality
- **DOES IT MATTER?**
 - Mixed evidence...
 - The most generalizable data (aggregate, survey): little to no effect
 - The most internally valid data (experiments) little effect
 - No lack of prestige of the occupation
 - Little impact on gender gap in STEM areas; male underachievement
- **WHAT MAKES A GOOD TEACHER?**
 - Similar distribution of positive teacher characteristics

Thank you