Gender and intergenerational human capital transmission in Senegal 1940-2009

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Discussions

The purpose of the study

- The main purpose is to capture the intergenerational transmission of the human capital in Senegal

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- Identify the factors explaining access to education of parents and their Childs aged from 6 to 14 years using biographical survey over the period 1950 to 2009.

Background

- According to the Universal Declaration of Human Rights (1948), education allows "the full development of human personality."

- Education is a necessary and a primary factor for sustainable development

- In Senegal, it is an important and strategic in the process of economic, political and social development (40% of the budget goes to education)

- Strong links between education and poverty is well established

Background…..

- In Senegal, the education system is composed of formal and informal education.

- Education in Senegal is:
  - faced with shortage of supply relative to potential demand,
  - characterized by low quality explained by cyclical strikes of teachers
  - often effective in overcrowded classrooms and student strikes, reducing the annual number of hours required for a quality education.

Data source

- ## Quantitative survey
  - household surveys conducted in 2008
  - sample of 1200 households representing three strata of Senegal's population
  - 10.104 individuals were surveyed

- ## Biographic survey
  - conducted in 2008/2009 with a sample of 2400 individuals

Stylised facts Schooling

Table 1: Sample distribution by sex and area of residence

Sexe	Residence aera at the moment of the survey			
	Dakar	**Rural**	**Other urban**	**Total**
Male	266	535	232	**1033**
Female	462	363	190	**1015**
Total	**728**	**898**	**422**	**2048**

Stylised Facts Education

- Education and place of residence:
  - 80% of people living in rural areas have no education.
  - Within the population of Dakar, this proportion is 32%.
  - For primary education, Dakar recorded 35% against 30% and 14% for other cities and rural areas respectively
- Education, gender and generation:
  - There is an upward trend in the percentage of persons who have attained at least primary education starting from the old to new generations
  - This predominance of the number of people who reached primary level is more pronounced at the intermediate generations (1954 -1978)
- Regarding training,
  - More prevalent in women before 1954 (29.4%).
  - Among the men of the same generation, 19.2% had a vocational training

Table 2: Sample distribution by level of education and place of residence at the time of the survey

Highest Educational Level	Dakar		Other Urban		Rural		Total	
	Count	%	Count	%	Count	%	Count	%
None	233		160		719		1112	
		32%		38%		80%		54%
Primary	255		125		125		505	
		35%		30%		14%		25%
Professional	56		45		14		115	
		8%		11%		2%		6%
Secondary	166		85		37		288	
		23%		16%		4%		14%
Tertiary (university)	18		7		3		28	
		2,5%		1,7%		0,3%		1 ,4%
Total	728		422		898		2048	
		100%		100%		100%		100%

Figure 1: Sample Distribution (%) according to the generation and the percentage of people with at least reached the level of primary education.
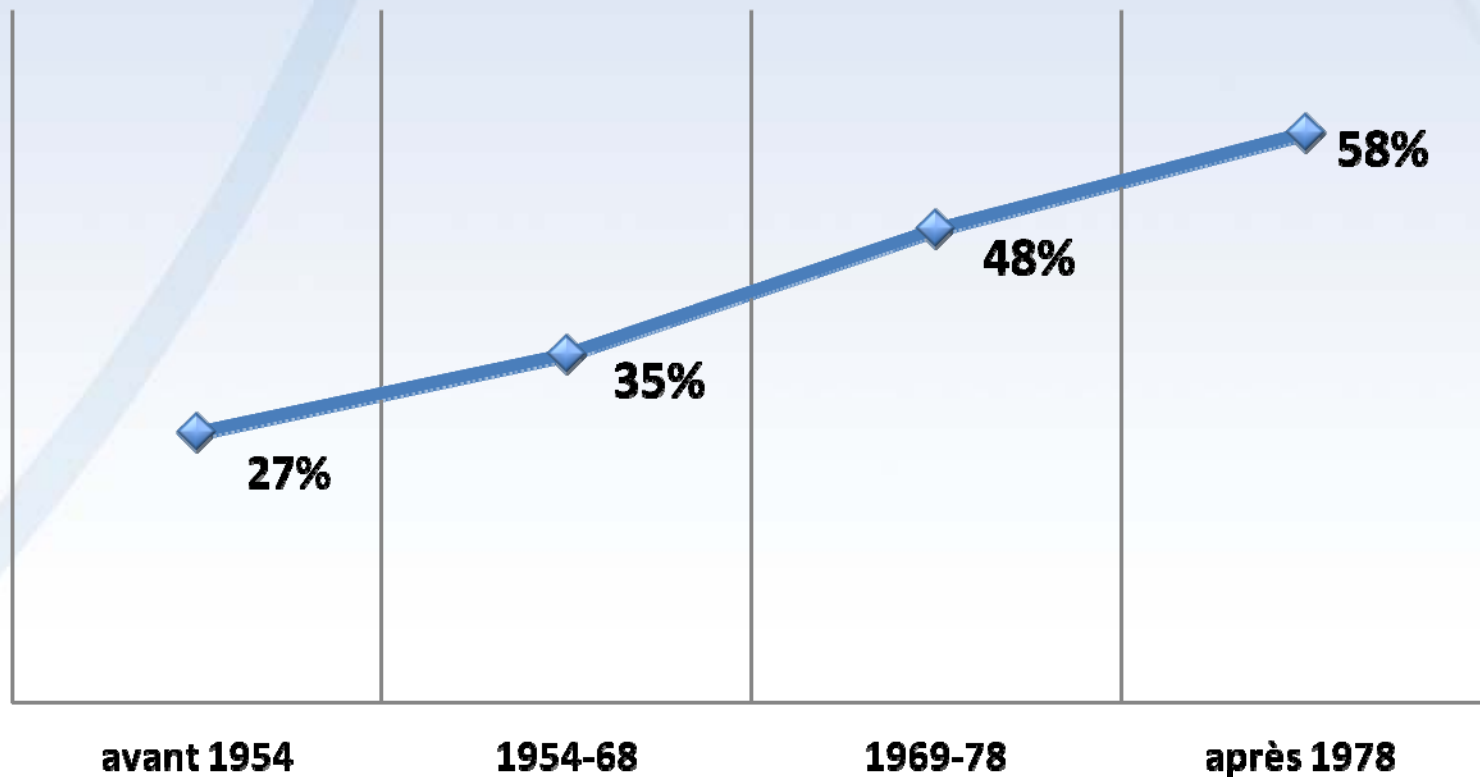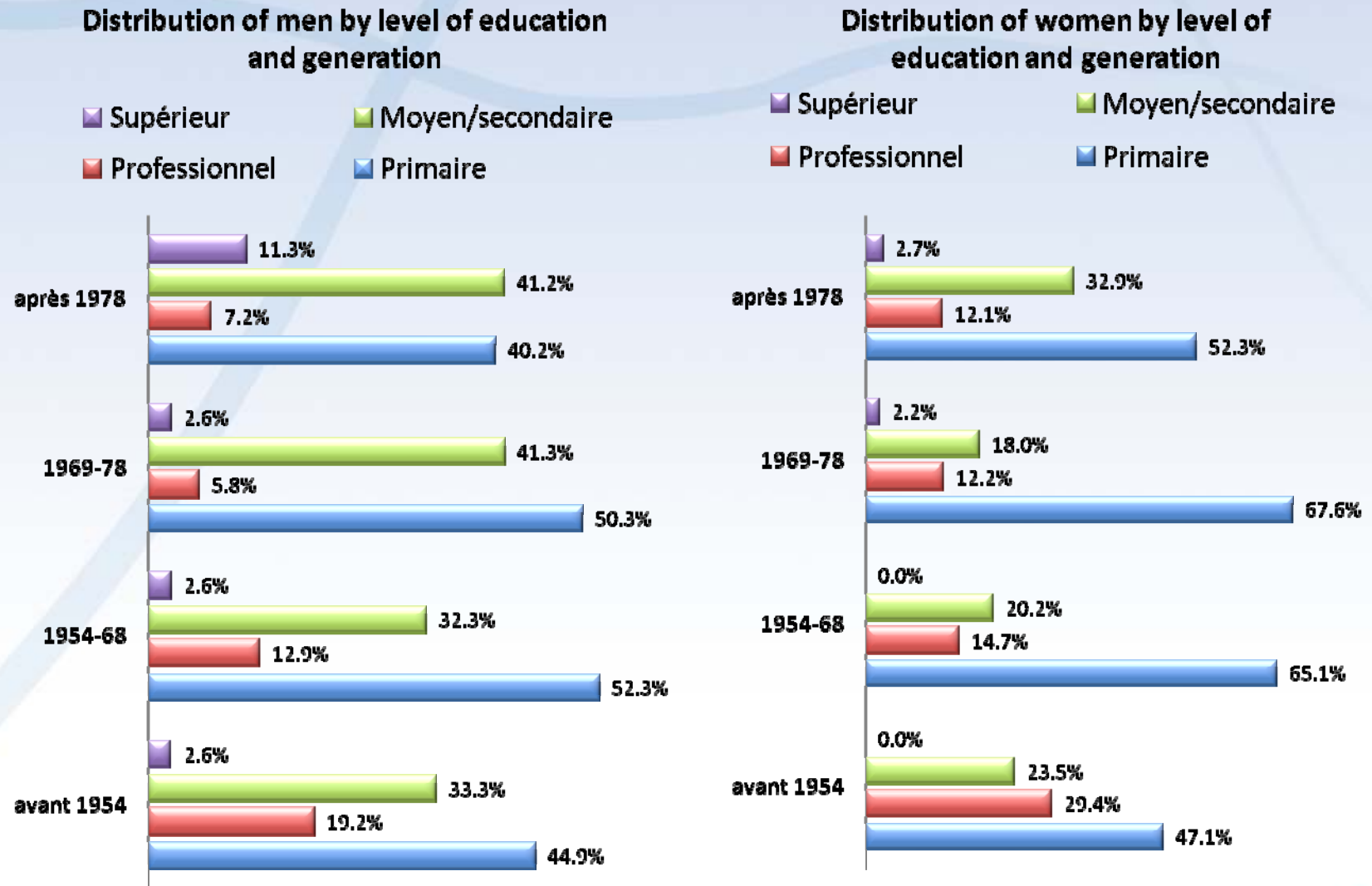
Figure 2: Comparison of educational attainment by gender and generation

Stylised Facts Education

→Within the female population, higher education is almost absent until 1969-1978 generations. The proportion of women born after 1968 who have reached higher level of education does not reach 3%.

→In terms of men:

- there is 2.6% of individuals who have reached higher levels of education on the generations before 1978

• Education and poverty:

– There is the low rate of all educational levels in the group victims of chronic poverty

Figure 3: Comparison of the maximum level of education according to the poverty of the individual child
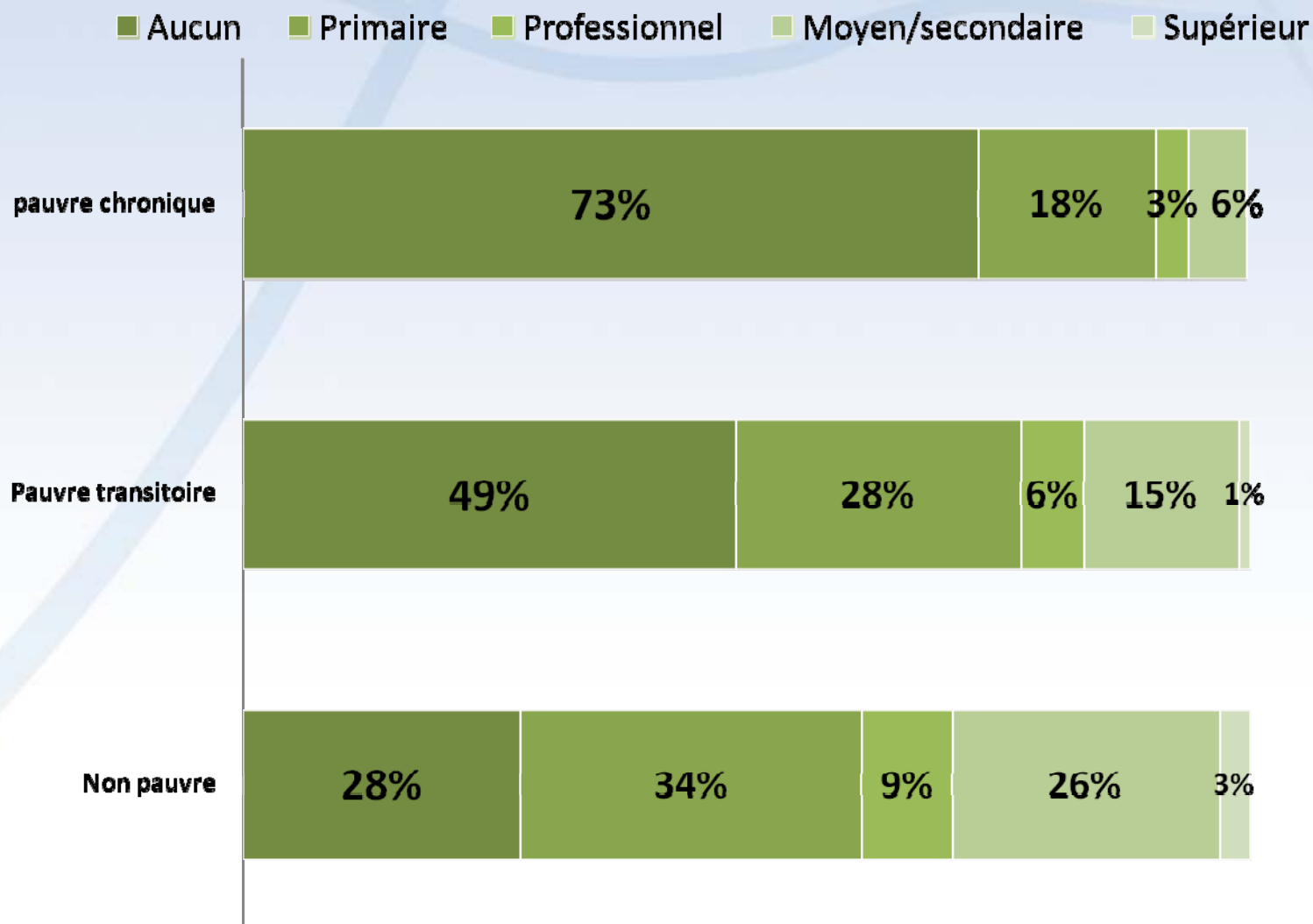
Methodology: Theoretical model

Based on the traditional models of education (Becker, 1964, 1975 and 1993), it is assumed that each individual household member has an individual utility function is written:

$$U_m = U_m(X, l, q, m, w)$$

→ Xm represents the goods purchased and consumed by the individual, the consumption of leisure,

→ θ, consumer prices produced by the household including elements such as education, health,

→ μ is a set of characteristics that can affect taste of the individual

→ ω a heterogeneous set of variables unobserved.

Methodology: The theoretical model

The function of household welfare W depends on the utility of each household member. For the household member m, the function of well-being is written as:

$$W=W[\ U_1(X,l,q,m,w)\ldots\ldots,U_M(X,l,q,m,w)]$$

Objective of the household is to maximize this function under constraint of production and the household budget

The multi level logit model is used to estimate the theoretical model

Methodology: Empirical models

Two levels of analysis that justifies the use of multilevel modeling: a parent level (level 2) and a child level (level 1).

- The variables of the first level (children) are:
  - gender,
  - Rank on birth
  - Living with a parent or not
  - Going to school or not

- The second-level variables (parents) are:
  - sexbirth,
  - poverty status,
  - area of residence,
  - marital status
  - instruction of the person who take care of the children ,
  - age of parent at the time of raised the ascendancy

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Results

- Individuals living in neighborhoods lacking social services have **31%** less chance to access to school compared to other that are in neighborhoods with access to these services

- Chronic poverty in childhood reduced **64%** chance of being educated

- Characteristics of the parent (sex, place of residence, education of the parent) explain more than **20%** of the probability of children to school

- If the parents has no education, the chances of a child to go to school fell by **69%**

Results

- Child between 6 to 15 years who don't live with their parents would reduce their chances of being enrolled at school by **44%**

- children raised in households headed by women had **21%** more chance to attend school compared to those headed by men.

- Childs for no educated parents probability to be enrolled felt by **69%** compared to a child whose parent has educated.

- If the person who brought up the parent is not educated, the chances of the child of this parent to going to school fell by **55%**

- Childs of a transient poor person have **56%** less chance to attend school

- Childs of chronic poor has **59%** less chance to go to school.

POLICIES

To a social minimum on public investment in
Senegal

No more temporary shelters in my community

Making accessibility on education it is possible

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THANK YOU