

# Formation of social preferences during childhood

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# Back to textbook economics...

## Traditional assumptions about preferences

1. **Selfish:** their utility is a function only own payoff. In other words, unless there is scope for reputation-building, people will not trust anyone or will have no concern for fairness.
2. **Exogenous:** preferences are hard-wired traits that do not change much during the lifetime and do not respond to circumstances

Testing the second assumption is our focus now

# Are preferences fixed or shaped by social environment?

## **Traditional econ view: Preferences are stable**

*“... one does not argue about tastes for the same reason that one does not argue over the Rocky Mountains – both are there, will be there next year, too, and are the same to all men.” (Stigler and Becker 1977, p. 76)*

## **Other social sciences: Social environment shapes preferences**

*“Almost all sociologists take it as obvious that individuals’ preferences are formed by society and that society, so to speak, exists within persons.” (Peter Hedstrom, Oxford University)*

# Outline

When people acquire social preferences? What is the role of environment?

1. Do preferences **develop during early childhood**?
2. Does **parental background** affect the process of development of preferences?  
Do gaps in social preferences arise during childhood?
3. Can remedial **policies** close the gaps in social preferences?



**Do social preferences systematically develop during childhood? If yes, how? What do you think?**

① Start presenting to display the poll results on this slide.

# Social preferences in very small children

Fehr, Bernhard and Rockenbach (2008, Nature)

- **Research questions**
  - Are very small children selfish?
  - Do they acquire social preferences during early age?
  - What type of social preferences becomes more prevalent as they grow up?
- Sample: ~250 Children from kindergartens and primary schools in Switzerland, 3-8 yrs old
- **Task:** Allocation of sweets between a child and an anonymous partner
  - Costless sharing game: 1/1 vs 1/0
  - Costly sharing game: 2/0 vs. 1/1
  - Costless envy game: 1/1 vs. 1/2
- Two **treatment** conditions -> group identity
  - Ingroup: classmates
  - Outgroup: unknown children

# Social preferences in very small children

Fehr, Berhard and Rockenbach (2008)



Figure S1. Experimental set up (prosocial game)

# Social preferences in very small children

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  - Costless sharing game: 1/1 vs 1/0
  - Costly sharing game: 2/0 vs. 1/1
  - Costless envy game: 1/1 vs. 1/2
- **Linking theory and experimental tasks:** How are different social-preference types predicted to behave in these tasks?
  - Strongly inequality averse person?
  - Strongly altruistic person?
  - Selfish person?
  - Strongly spiteful person?





**How are different social preference types predicted to behave in these three allocation tasks? Type 1: Strongly inequality averse**



**How are different social preference types predicted to behave in these three allocation tasks? Type 2: Strongly altruistic**



**How are different social preference types predicted to behave in these three allocation tasks? Type 3: Spiteful**



**How are different social preference types predicted to behave in these three allocation tasks? Type 4: Selfish**

# Social preferences in very small children

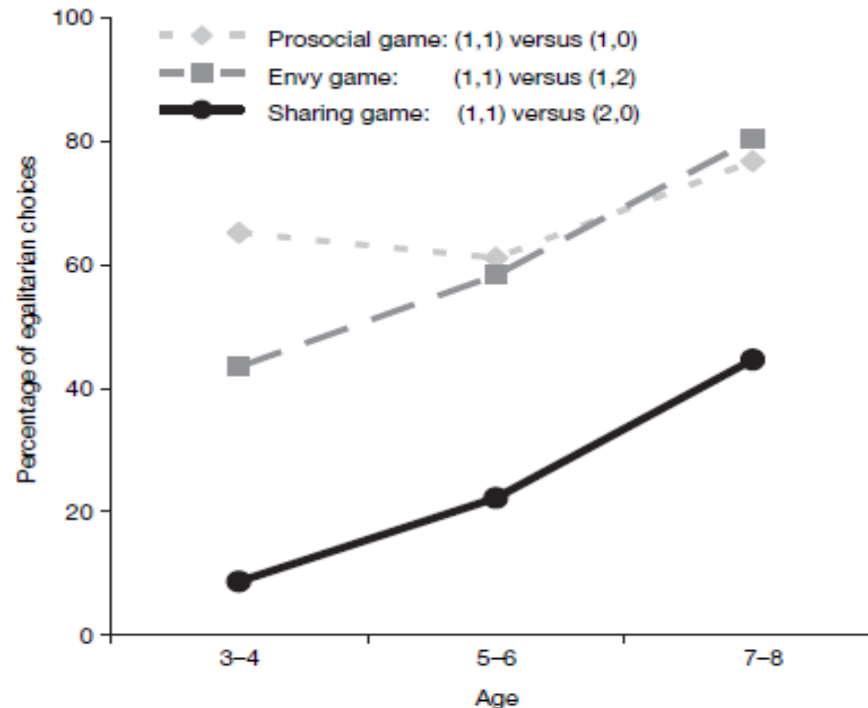
Fehr, Berhard and Rockenbach (2008)

	Choice in		
	Prosocial game [(1,1) vs. (1,0)]	Envy game [(1,1) vs. (1,2)]	Sharing game [(1,1) vs. (2,0)]
strongly egalitarian	(1,1)	(1,1)	(1,1)
weakly egalitarian	(1,1)	(1,1)	(2,0)
strongly generous	(1,1)	(1,2)	(1,1)
weakly generous	(1,1)	(1,2)	(2,0)
ambiguous type	(1,0)	(1,1)	(1,1)
spiteful	(1,0)	(1,1)	(2,0)
ambiguous type	(1,0)	(1,2)	(1,1)
ambiguous type	(1,0)	(1,2)	(2,0)

# Social preferences in very small children

Fehr, Berhard and Rockenbach (2008)

**Finding 1:** Most of the 3-4 yr-old children act selfishly towards their classmates

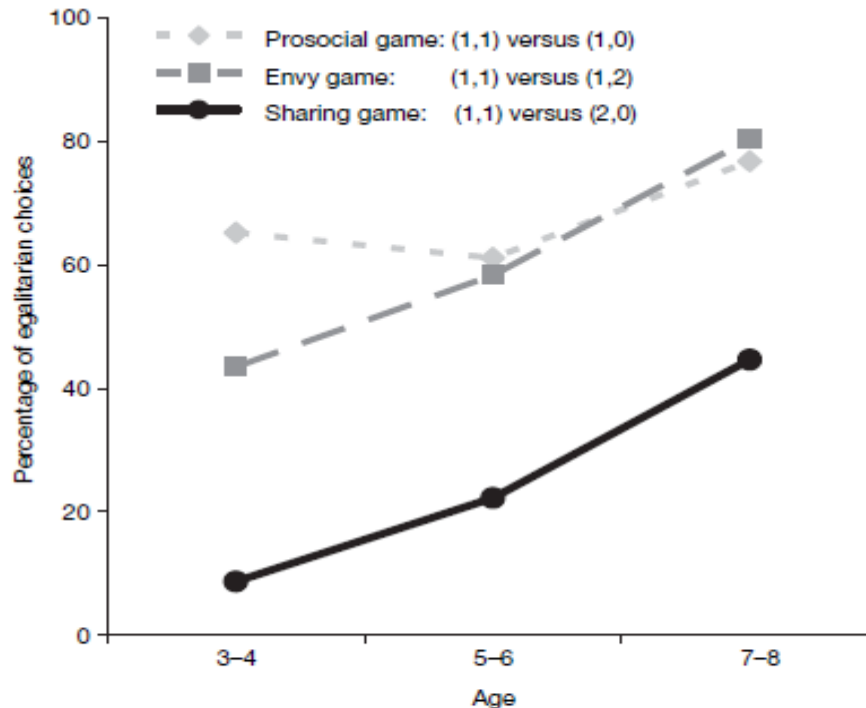


**Figure 1 | The relative frequency of egalitarian choices across all ingroup treatments.** In these treatments, the decision maker's choice determines the resources of an ingroup partner. The frequency of egalitarian choices strongly increases with age across all three ingroup treatments, and most children prefer equality at age 7-8 in the prosocial and the envy game. However, if equality is costly for the children, they choose the egalitarian allocation less frequently—as indicated by the behaviour in the sharing game—and at age 3-4, self-interested choices dominate almost completely.

# Social preferences in very small children

Fehr, Bernhard and Rockenbach (2008)

**Finding 2:** They become more egalitarian at the age of 7-8 years.



**Figure 1 | The relative frequency of egalitarian choices across all ingroup treatments.** In these treatments, the decision maker's choice determines the resources of an ingroup partner. The frequency of egalitarian choices strongly increases with age across all three ingroup treatments, and most children prefer equality at age 7-8 in the prosocial and the envy game. However, if equality is costly for the children, they choose the egalitarian allocation less frequently—as indicated by the behaviour in the sharing game—and at age 3-4, self-interested choices dominate almost completely.

# Social preferences in very small children

## **Lessons**

- Small children are mostly selfish but acquire social preferences during childhood.
- Initially they become inequality averse (around 7-8 yrs).
- Later they also become concerned about efficiency (social welfare) and altruistic

## **Next questions**

- Does social background/environment matter? Do children acquire preferences of their parents?
- Can formation of preferences be affected by social policies?





**Do social preferences of children from low socio-economic status families differ from those children with higher SES? What do you think?**

# Effect of policies on social behavior

Kosse et al. 2016

## Questions

- Are low SES children less pro-social than high SES children?
- Does random variation in the social environment affect pro-social behavior of low SES children? Can social policies close the gap?

## Methods

- Sample: primary school children in Germany
- Policy intervention: **one-year mentoring program.**
  - Mentors are typically university students who meet children once a week and engage in activities such as visiting the zoo, museum, playground, reading, cooking, or just having a conversation.
- Comparing behavior of three groups
  - High SES children
  - Treatment low SES children
  - Control low SES

# Effect of policies on social behavior

Kosse et al. 2016

- Measuring **social behavior**
  - Altruism –a set incentivized dictator games
  - Trust elicited using a survey – ranking agreement with statements: One can trust other people”, “Other people have good intentions towards me”, and “One can rely on other people, even if one does not know them well”
  - Mother filled extensive questionnaire on social behavior of children in everyday life

# Effect of policies on social behavior

Kosse et al. 2016

## Parental background matters.

Two important patterns (also found elsewhere)

1. **Socio-economic status matters:** Low SES kids are less prosocial than high SES kids
2. **Transmission of preferences from parents to children:** Kids with less prosocial mothers are less prosocial themselves

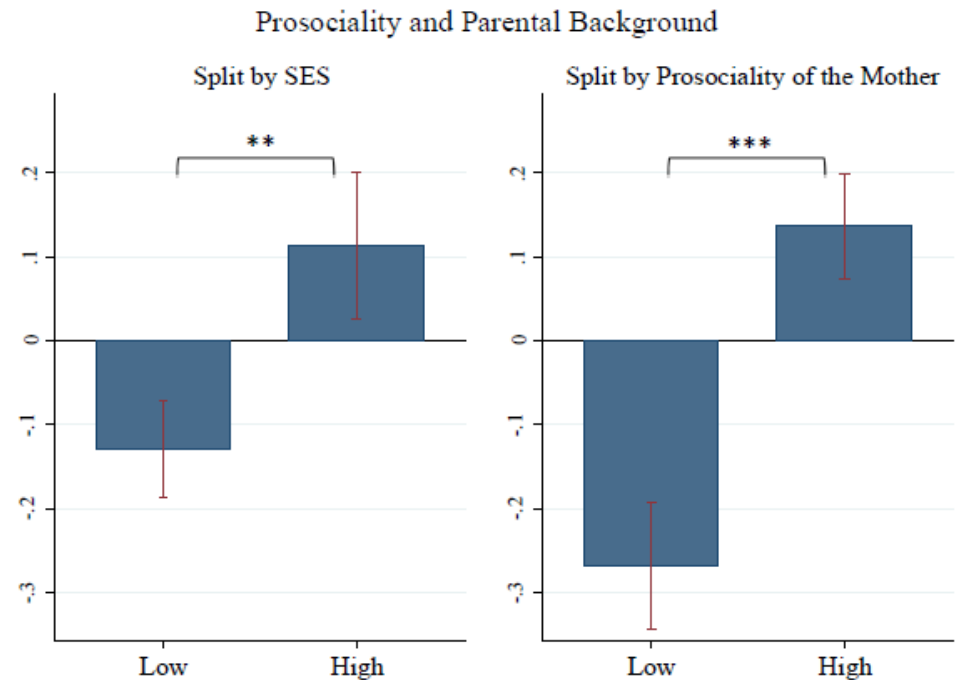
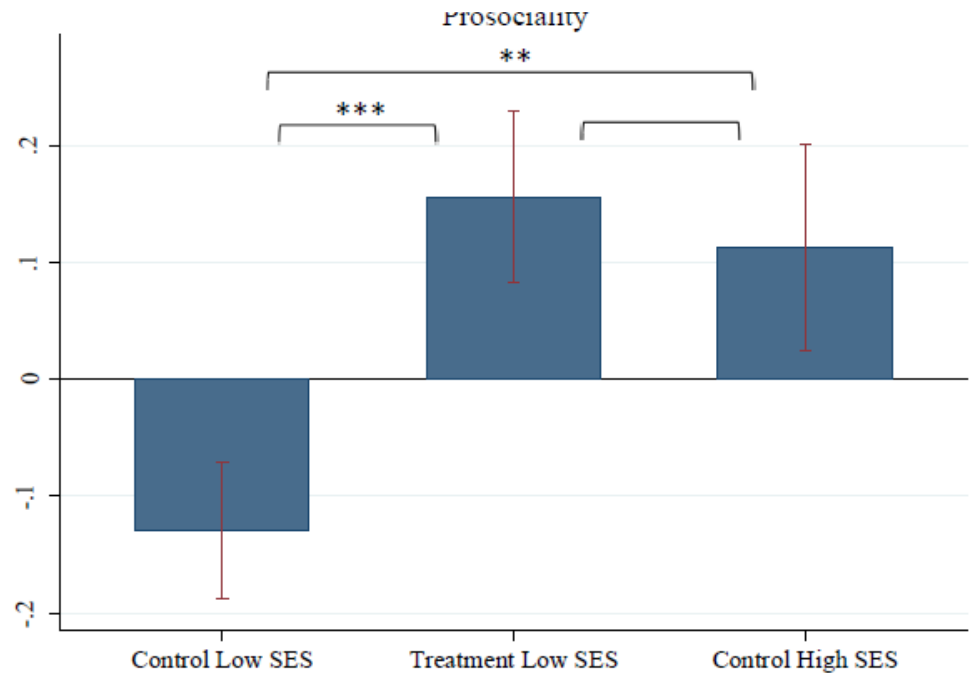


Fig. 1. Prososity and Parental Background. The left panel shows higher levels of children's prosociality in the Control High SES group compared to the Control Low SES group. The right panel shows higher levels of prosociality for children of highly prosocial mothers (above median) compared to children of mothers who score below median. The prosociality measures of mother and child are constructed as equally weighted scores of standardized measures of altruism, trust and other-regarding behavior, respectively. The scale on the y-axis indicates z-scores (i.e., standardized measures) of children's prosociality. Error bars show standard errors of the means (SEM). \*\*\*, \*\* indicate significant differences at the 1% and 5% level, respectively (two-sample *t*-tests,  $N(\text{left panel}) = 424$ ,  $N(\text{right panel}) = 410$ , difference due incomplete mother questionnaires).

# Effect of policies on social behavior

Kosse et al. 2016

- Significantly higher levels of prosocial behavior for treated children compared untreated children
- The intervention closes the gap in prosocial behavior between high and low SES children.

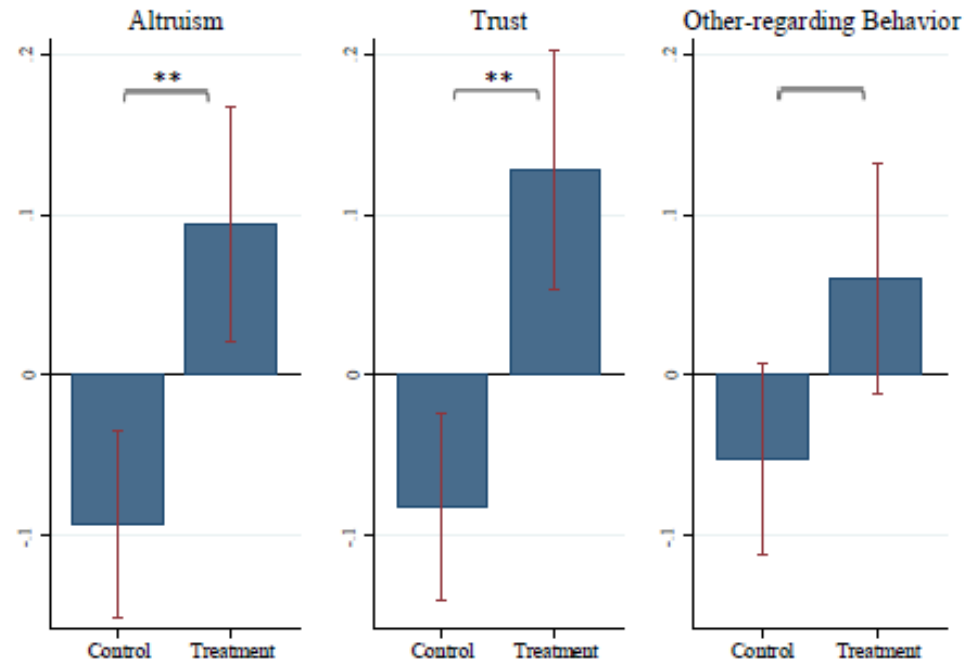


**Fig. 2. Significantly higher levels of prosociality for treated children compared to untreated children (Treatment Low SES vs. Control Low SES).** There is no significant difference between Treatment Low SES and Control High SES. The prosociality measure is constructed as equally weighted score of standardized measures of altruism, trust and other-regarding behavior. The scale on the y-axis indicates z-scores (i.e., standardized measures) of children's prosociality. Error bars show standard errors of the means (SEM). \*\*\* and \*\* indicates significant differences at the 1% and 5% level, respectively (two-sample *t*-tests,  $N(\text{Treatment Low vs. Control Low}) = 490$ ,  $N(\text{Control High vs. Control Low}) = 424$ ,  $N(\text{Treatment Low vs. Control High}) = 290$ ).

# Effect of policies on social behavior

Kosse et al. 2016

- Results robust across multiple measures of prosocial behavior
- **Important implication:** The environment in which we grow up matters. It shapes our personality. Differences between people are not just about genes!



**Fig. S4. Treatment effects for facets of prosociality.** Higher levels of altruism, trust and other-regarding behavior for treated children compared to untreated children (Treatment Low SES vs. Control Low SES). Altruism is measured using three different incentivized dictator games. The trust measure is based on children's responses to a questionnaire. Other-regarding behavior is a questionnaire rating by the mother (Prosocial Scale of SDQ) with respect to other-regarding behavior in every-day life of her child. The scale on the y-axis indicates z-scores (i.e., standardized measures) of respective prosociality facet of the child. Error bars show standard errors of the means (SEM). \*\* indicate significant differences at the 5% level (two-sample t-tests,  $N(\text{altruism}) = 492$ ,  $N(\text{trust}) = 494$ ,  $N(\text{other-regarding behavior}) = 492$ . Number of observations varies due to failed control questions or missing answers.).

# Summary

- Childhood is a sensitive period in formation of preferences
- Parental background matters: gaps in pro-social behavior emerge early
  - Lower SES, lower pro-sociality
  - Transmission of preferences from parents to children
- Differences in personality traits and preferences are not due to genes only, but also about culture and social environment
  - Remedial programs have capacity to close gaps originating in low SES of parents and thus attenuate inter-generational transmission of preferences
  - Kosse et al (2018) suggests that exposure to role models is important (people copy and internalize behavior of their parents or other individuals in their social neighborhood)
- **Question:** Why should we as economists care about this?