Women’s Empowerment vs. Son Preference: Effects on Time to Conception

**Background**

Son preference influences childbearing by increasing family size in high fertility settings and intensifying skewed sex ratios in low fertility settings. It is associated with an increased hazard of a subsequent birth and shorter duration to conception. In contrast, women’s empowerment is associated with smaller family sizes and potentially balanced sex preferences.

Which effects time to conception more?

**Hypotheses**

1. **Son preference**: A preference for sons will manifest in an increased hazard ratio and shorter survival time to next conception among women who do not yet have a surviving son.
2. **Moderation effect**: More empowered women will exhibit a lower hazard ratio and longer survival time to next conception than their less empowered counterparts because they hold weaker sex preferences.
3. **Intensification effect**: Empowered women also have son preference and are more capable of achieving those preferences because they possess greater agency. They will have an even shorter time to conception than less empowered peers.

**Methods**

- **Setting**: Madhya Pradesh, India. A high fertility setting with conservative gender norms and documented son preference.
- **Data**: Retrospective reproductive histories (n=9,127 pregnancies) for a representative sample of 2,444 married women aged 19-39 with ≥1 child.
- **Analysis**: Kaplan-Meier survival curves (S(t)) at each interval >1 stratified by: a) prior number of sons b) empowerment status.

**Results**

Son preference lengthens time to conception while son preference shortens it. The effects of women’s empowerment weaken in the presence of socio-demographic controls. Sex composition, in contrast, is a persistent and strong factor increasing the hazard of subsequent conception.

**Conclusion**

Women’s empowerment lengthens time to conception while son preference shortens it. The effects of women’s empowerment weaken in the presence of socio-demographic controls. Sex composition, in contrast, is a persistent and strong factor increasing the hazard of subsequent conception.

**Son Preference**

In the 2nd and each subsequent interval, a higher proportion of women with no sons became pregnant at each observed time point and their average time to conception was significantly shorter than for women with one or more sons (p<0.001). Differences between strata widened at higher parities (intervals 3 and 4 shown).

**Women’s Empowerment**

Time to conception differed by each measure of empowerment as well (mobility shown). In all intervals, women who had unrestricted mobility were consistently less likely to experience a pregnancy and experienced longer times to conception than women who faced restrictions on their mobility (p<0.001) and these differences increased as intervals progressed.

**Multivariate Hazards Model**

The sex composition variable is a consistently noteworthy explanatory variable in both the simple model (model 1) and the full model with all control variables (model 2). Exponentiating the coefficient, we see that the expected time to pregnancy increases by 12% with each additional son in interval 3, by nearly 30% in interval 4, and 39% in interval 5.

The women’s empowerment variables also operate in the expected direction: the time to conception is 11% longer for women with unrestricted mobility in the 1st interval and 53% longer in intervals 6 and higher, controlling for sex composition. However, women’s empowerment does not always remain significant when socio-demographic controls are introduced.