



Why trust matters: female entrepreneurship and institutions in Zambia

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- Female entrepreneurs in Zambia earn about half as much as men, and are concentrated in low-return industries such as food and apparel.
- A central barrier is lack of trust: women are less likely to collaborate with men to take advantage of larger opportunities for their business.
- Institutions matter: when dispute resolution is available and not gender-biased, women's willingness to trust and collaborate rises.
- Experiments with real entrepreneurs show that access to adjudicators who are protective of the weak eliminates the gender trust gap and increases efficiency for both men and women.
- Strengthening accessible and trusted adjudication systems can help unlock women's entry into higher-return activities.

Policy motivation

In Lusaka, **female entrepreneurs remain absent from higher-value industries** such as metalworking, carpentry, and construction. Instead, they are concentrated in sectors with high competition and low margins - with over 75% of the female entrepreneurs making apparel, and over 18% making food.

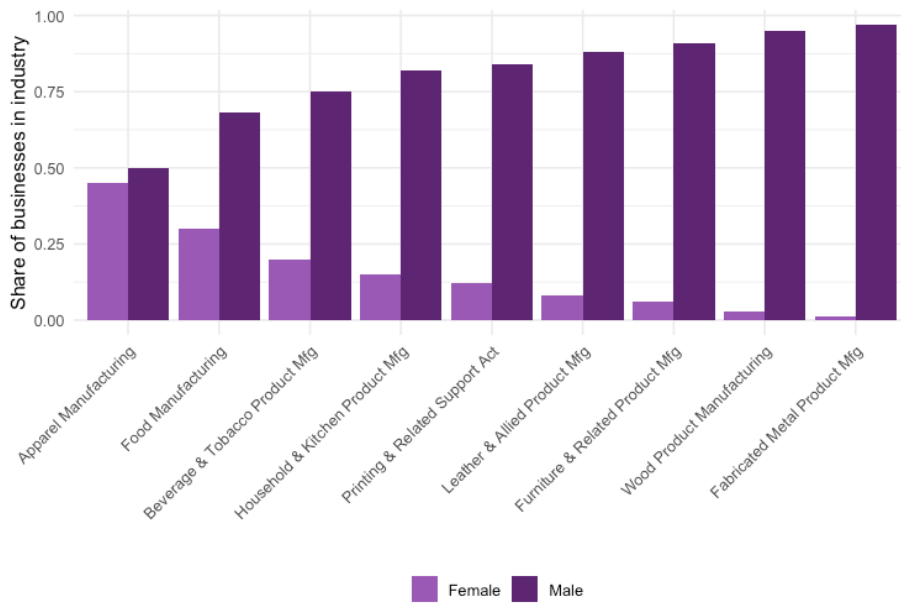
In addition, we document a substantial **gender gap in business collaboration** among small-scale manufacturers in Lusaka. Women are less likely to engage in activities that require trust - for example placing joint orders, equipment sharing, or subcontracting, and tend to have fewer partners, with cooperation strongly segregated by gender.

There could be several explanations for both sectoral segregation by gender and the gender gap in collaboration, such as differences in preferences (for example, sectoral appeal or flexibility), skills and training, or even social norms. However, a significant and less explored aspect of the business environment is the nature of imbalances in social power between men and women.

About 40% of the women business owners we surveyed report that a woman may turn down a cooperation opportunity with a man because of the fear of being taken advantage of. If women anticipate that they will not have power to effectively defend themselves from expropriation (either because adjudicators favour men, or because institutions are absent or weak), they may avoid partnerships entirely. In sectors like machine-manufacturing or metalwork, where collaboration with men is common and important to handle large orders or share equipment, women's lower trust may even discourage entry in the first place. The result is a cycle of gendered segregation and women's continued existence in low-return sectors.

Does fear of expropriation by men push women to work alone or primarily with other women? And is there room for contract enforcement institutions to effectively protect women from this fear? These are the main questions we ask in this project.

Figure 1: Share of male- vs female-owned businesses by industry



Research overview

This study combines theory, novel large-scale microdata, and experiments to understand trust among female entrepreneurs and how contract enforcement institutions shape their business decisions.

We first use **observational evidence** from novel microdata we collected in Lusaka. We mapped all the firms in the city – a full **census of over 48,000 firms** – and administered a detailed survey to all the firms in construction, manufacturing and mining with less than 20 employees. Of the 3,800 firms eligible to participate, 2,216 small-scale manufacturers took part (a 60% response rate). We complement this main data collection with a survey of market chiefs, which includes questions from the World Values Survey (WVS) and the World Justice Project (WJP) to measure their gender attitudes and potential bias against women.

We then conducted **two lab-in-the-field experiments with real entrepreneurs and market chiefs**. These experiments simulate business partnerships through trust games where participants can invest in each other's businesses under different dispute resolution rules. In the first experiment, we analyse the effect on trust of having access to 'gender-blind' enforcement (market chief does not know gender of disputing participants) vs no enforcement, while in the second we compare gender-blind to 'gender-aware' enforcement (market chief is told the gender of disputing participants).

Key findings

Observational evidence

Our survey with manufacturers – as well as additional surveys we collected with trust-game participants – reveal widespread **gender gaps in collaboration and knowledge sharing:**

- Male entrepreneurs are far more likely to have been taught their trade by another entrepreneur or a family member, while female entrepreneurs are usually formally trained.
- Women entrepreneurs collaborate less than men. For instance, while 35% of male entrepreneurs jointly bought materials with another business over the past year, only 27% of women have done so.
- When women do collaborate, they are much more likely to do so with other women. 53% of women collaborated with another female entrepreneur, while only 26% collaborated with a man in the last year. For male entrepreneurs, 68% collaborated with another man, while 33% collaborated with a woman.

We find that being located inside markets, where firms can have access to market chiefs in case of disputes, reduces these gender gaps:

- On average, women collaborate disproportionately more than men inside markets. This fact implies that the gender gap in collaboration disappears for businesses located inside markets compared to firms located in the same area, but just outside the borders of the market;

We then go beyond averages and look at differences in collaboration behaviour for male- and female-led businesses located in markets with more or less gender-supportive chiefs. The idea is that the gender gap in collaboration should be particularly small in markets where chiefs are more supportive of women.

- Our surveys reveal that chiefs have, on average, more progressive gender attitudes than the average Zambian citizen, but they also vary in these attitudes;
- Gender gaps in collaboration inside markets vary with chiefs' gender attitudes:
 - Women inside markets with unbiased chiefs cooperate as much as men.

- Women's cooperation is substantially lower in markets with a chief with above-median gender bias.

Experimental evidence

A limitation of the empirical analysis conducted with observational data is that businesses and chiefs sort across markets in a non-random way, and this selection may be correlated with their collaboration behaviour.

In order to ascertain the causal effect of having access to the market chiefs' protection on female trust, we ran two experiments with entrepreneurs located across markets. Both were variants of the trust game (Berg, 1995), where pairs of players play together in the roles of investor and trustee:

- The investor receives 10 tokens (to be converted into real money) and has to decide how much to 'invest' in a partnership with another entrepreneur (the Trustee);
- Any tokens invested are tripled before being received by the Trustee: if someone sends 3 tokens, their partner receives 9 tokens;
- The Trustee then decides how much to return:
 - the amount invested shows trust (how much risk a participant takes); and
 - the amount returned is a measure of trustworthiness (how individuals reciprocate).

This setup mimics the risks entrepreneurs face in real life when they work with partners and rely on others to honor agreements.

Experiments revealed how institutions shape women's trust

Experiment 1 – Neutral adjudication

Question: Does access to an unbiased adjudicator change women's willingness to trust business partners?

Design: Entrepreneurs across 16 markets were randomly assigned to one of two conditions of the games:

1. **No adjudicator**
2. **Gender-blind market chief:** if not satisfied with the number of tokens received by the trustee, the investor can complain to their local chief. The chief is unaware of the identity of the parties involved in the game.

Results

In games without adjudication, women invested less than men, showing lower trust. This confirms our observational results on the gender gap in trust and collaboration. When a gender-blind chief was available, women's investments rose to match men's. The gender gap in trust disappeared, and the overall surplus - i.e. number of tokens - produced within the game increased. This is evidence that impartial dispute resolution increases both equity and efficiency.

Furthermore, the increase in women's investments was larger in markets with gender-biased chiefs, showing that neutral enforcement is particularly valuable where existing enforcement is unequal.

Experiment 2 – Gender-blind vs Gender-aware chiefs

Question: When institutions see gender, does this visibility help or harm women?

Design: Entrepreneurs across 12 markets were randomly assigned to one of two conditions of the games:

1. **Gender-blind market chief:** if not satisfied, investors could complain to their chief. In case of a complaint, gender and identity were hidden from the chief as in experiment 1.
2. **Gender-aware market chief:** if not satisfied, investors could complain to their chief. In case of a complaint, the investor's gender was revealed to the chief, while other personal details remained hidden.

The two conditions thus only differ in whether the chief can observe gender, but both allow investors to access an adjudicator if they want to. In addition to behavior in the game, we run surveys with both participants and chiefs before the experiment.

Results

On average, women prefer to have their gender revealed to the adjudicator and, accordingly, trust more (i.e. send more tokens) when they are randomized into the gender-aware market chief condition. Women's preference for and higher trust when institutions see their gender is justified: chiefs are more likely to take action to address women's complaints in markets where women trust more when their gender is revealed. This suggests that women perceive market dynamics accurately. This result is confirmed by differences in the treatment effects across markets. Women's higher trust when their gender is revealed is concentrated in markets with less-biased chiefs and where women have less social power, pointing to a key role of the chief in protecting weaker groups (even beyond gender).

Overall, these results show that women adjust their willingness to collaborate based on the perceived protective attitudes of institutions. When adjudicators are perceived to be neutral or protective, women trust and invest more. Furthermore, this increase in trust and cooperation by women results in increased overall economic surplus in the game.

Policy implications

The findings highlight that trust is not simply cultural - it responds to institutional design. Policymakers seeking to promote women's entrepreneurship should focus on institutions that make collaboration less risky:

- **Further improve informal adjudication:** Market chiefs remain the first point of contact for most, and have tremendous influence on

entrepreneurs. If market chiefs are perceived as protective, it could repair the trust deficit among female entrepreneurs and encourage more women to enter male-dominated, collaboration-heavy sectors like manufacturing. In addition, integrating chiefs into broader justice reforms could help bridge formal and informal systems rather than leaving them in conflict.

- **Strengthen access to adjudication (SCCs):** Many entrepreneurs are unaware of the Small Claims Court (SCC). Expanding awareness campaigns, simplifying procedures, and lowering costs of access can increase their use.
- **Target women's entry into high-return sectors:** Stronger institutions are most valuable when women can act on them. Complementary interventions, such as targeted training, information on profitable industries, or support for women's producer groups, would help women move into sectors where collaboration is essential, amplifying the gains from institutional reform.

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