

Taxation and Public Financial Management

1 Introduction

Taxation and public financial management (PFM) are highly relevant to SDG 16, in no small part because the domestic revenue mobilization is important to financing efforts to reach these goals. Additionally, improving taxation and PFM relate directly to several aspects of SDG 16, including:

- 16.4: Significantly reducing illicit financial flows
- 16.5: Reducing corruption and bribery in all forms
- 16.6: Developing effective, accountable and transparent institutions
- 16.7: Ensuring responsive, inclusive, participatory, and representative decision-making
- 16.10: Ensuring public access to information

The link between taxation/PFM and these goals derives from the notion that improving tax administration and enforcement is central both to building state capacity and establishing a social contract between state and society (Brautigam et al 2008, Moore 2007). It is sometimes argued that, when the state increases its fiscal reliance on taxation, a bargaining process between state and society over the terms of taxation ensues. If higher taxes induce evasion or political mobilization by potential taxpayers, governments have an incentive to implement reforms to elicit voluntary taxpayer compliance. Such reforms can entail improving service provision; enhancing transparency; combatting corruption; increasing fairness and equitability in taxing and spending; and strengthening democracy. In sum, taxation has the potential not only to increase citizen demand for better governance but also leaders' incentives to comply with those demands.

While improving taxation has the potential to yield these outcomes, the evidence to support this is much more tenuous. While much of the macro-literature supports these broad linkages (e.g. Ross 2004), the micro-level literature has focused on testing more specific aspects of strengthening taxation and PFM. The micro-level literature has helped to uncover the determinants of taxpayer compliance; factors in civil servant performance; and the role for IT in PFM. While there is a growing evidence base for thinking about how to improve tax and PFM capacity, we still don't know enough about whether these reforms will yield the broader governance dividends at the heart of SDG 16. This entails thinking about the broader political economy context of tax and PFM reform.

2 Key Questions

1. **Capacity.** What are the most effective strategies for improving capacity with respect to tax administration and public financial management?
2. **Voluntary compliance.** In what ways can government effectively strengthen voluntary taxpayer compliance?
3. **Civil servant performance.** What are the most effective strategies for attracting competent civil servants and minimizing the scope for bureaucratic corruption and collusion in tax administration and PFM?
4. **Bargaining power of taxpayers.** How can taxpayers be empowered to generate bottom-up pressure on government for better tax administration and PFM?

3 Interventions and Outcomes

The following tables provide examples of research (mostly experimental) that is addressing core questions related to tax administration and PFM. Many of these studies were completed recently and are indicative of trends towards designing interventions for individuals (e.g. taxpayers and civil servants) as well as for local or subnational governments. One advantage of studies on taxation and PFM is that outcomes can often be measured with objective administrative data (e.g. tax payments or audit outcomes).

Challenge 1: Improving taxpayer compliance

Study	Country	Question	Who	Intervention	Outcome
Kleven et al (2011)	Denmark	Do audits and audit threats increase taxpayer compliance?	40,000 individual income tax filers	Treatment Year 1: Half of tax filers randomly audited. Treatment Year 2: Half of tax filers randomly threatened with audit.	Prior audits and threat-of-audit letters have significant effects on reported income, but only for self-reported income (not third-party reported income).
Pomeranz (2014)	Chile	Do the self-enforcing features of VAT work?	445,000 firms	Pure control + one treatment: Letters notifying of increased probability of audit. Also secondary experiment where firms suspected of evasion randomly received notice of upcoming audit.	Treatment significantly increased VAT payments. Effect weaker for transactions between firms (where paper-trail is strongest) and stronger on sales to final consumers. Indicates that VAT paper-trail works and audit threats produce strong spillover effects.
Fellner et al (2013)	Austria	What is most effective at boosting taxpayer compliance: Deterrence, moral appeals or social appeals?	About 50,000 Austrian HH required by law to self-register to pay annual public broadcasting TV fee	Pure control + three treatments: (1) threat of detection and sanctions, (2) moral appeal referring to fairness, and (3) social information highlighting high level of compliance.	Mailings increase compliance, small effect for detection threat letter and no real effect for moral or social appeals. Some evidence that social appeals letter has bigger effect where tax evasion is common.
Castro and Scartascini (2013)	Argentina	What is most effective at boosting taxpayer compliance: Deterrence, perceived equity, or perceived fairness?	23,000 individual taxpayers of a property-based tax in a municipality in Buenos Aires.	Pure control + three treatments: (1) deterrence (beliefs about enforcement and fines), (2) equity (beliefs about other taxpayers' behavior), and (3) fairness (beliefs about how resources used by government).	Deterrence was the most effective message (5 percentage point increase over control). No effects for other two messages.
Dunning et al (2015)	Uruguay	Do positive inducements work better than negative sanctions at eliciting compliance?	Approximately 12,000 taxpayers	Three experiments combined. (1) Natural/policy experiment: Use lottery to study impact of winning a tax holiday. (2) Field experiment where mailers with different info and primes sent to taxpayers, and (3) survey experiments	Winning the lottery <i>reduces</i> tax compliance among good (eligible) taxpayers, attributed to the adverse effects of breaking a habit of tax compliance. Of the mailing, a simple reminder that taxes are due had greatest effect. Info on lottery increases perceptions of fairness of tax system and benefits of being up to date on taxes.

Challenge 2: Improving civil servant performance and reducing corruption and collusion in the bureaucracy

Study	Country	Question	Who	Intervention	Outcome
Khan, Kwaja, and Olken (2015)	Punjab, Pakistan	What strategies for improving tax collector performance raise the most revenue while minimizing predatory taxation and collusion?	482 property tax units followed for two years	Pure control + three treatments: (1) reward based on revenue collected, (2) reward based on revenue collected plus taxpayer satisfaction, (3) reward determined flexibly by superiors	Rewards based purely on revenue performance were effective without generating compromising taxpayer satisfaction BUT some increased collusion as well.
Ashraf et al (2015)	Zambia	Do career incentives attract better civil servants at the recruitment stage?	Assignment was at the district level	Control districts: Recruitment emphasizes benefits to community. Treated districts: Recruitment materials emphasize career possibilities. (Note: those who are employed learn about career opportunities, thus effect is entirely driven by who selects to apply).	Employees recruited with career incentives visit more households and organize more community meetings. Also usage of health services is higher in treatment districts.
Dal Bo et al (2013)	Mexico	How do financial incentives (salaries) affect the quality of civil service applicants? (main question)	1,920 applicants to 350 community development positions	Two treatments: (1) randomly assigned applicants to low/high wage offers, and (2) randomly assigned job offers (randomly matching candidates to locations).	Higher wages attract a better candidate pool in terms of quality and motivation.
Duflo et al (2013)	Gujarat, India	How does changing the market structure for audits improve over third-party auditing (which creates scope for collusion)	473 audit-eligible industrial plants	Complex treatments: (1) Treatment plans assigned randomly to auditors; auditors paid for by central funds (not the firm), (2) audit firms were randomly audited, (3) performance bonuses in second year tied to accuracy of audits	Treatments had a substantial effect on increasing truthful auditing and reducing the fraction of plans that were falsely reporting. Also, treatment plans reduced emissions

Challenge 3: Reducing corruption and increasing efficiency in PFM through information technology (IT)

Study	Country	Goal	Who	Intervention	Outcome
Lewis-Faupel et al (2014)	India and Indonesia	Does introducing e-procurement procedures improve infrastructure outcomes?		Observational data comparing outcomes before/after for subnational governments with and without e-procurement	No evidence that e-procurement lowers the costs paid by government but e-procurement improves quality by reducing time overrun and higher quality roads in India (measured through independent audit report).
Banerjee et al (2015)	Bihar, India (12 districts)	Do e-governance reforms that improve information and reduce the		Pure control + treatment: In pure control, funds flowed from state department to village government and involved 4 tiers of hierarchy.	Treatment significantly reduced program expenditure and reported employment (ghost workers) but with no impact

number of administrative tiers for fiscal transfers improve fund flow? In treatment group, disbursed funds were linked to actual expenditures and reduced reporting tiers. on actual employment.

Challenge 4: Increasing taxpayer bargaining power to strengthen bottom-up pressure for better tax administration and PFM

Study	Country	Question	Who	Intervention	Outcome
Paler (2013)	Indonesia	Does paying taxes increase citizen willingness to take political action and punish corrupt officials?	1,863 citizens in Blora, Indonesia	Lab-in-the-field experiment with two treatments: (1) revenue treatment varied whether district revenue perceived to come from taxes vs. windfall revenue, (2) info treatment provided actual info on government spending.	Simulated tax payments increased demand for information and willingness to take political action, especially when citizens had little information on government spending.
Martin (2015)	Uganda	Does paying taxes increase citizen willingness to take political action and punish corrupt officials?	371 individuals in Kampala, Uganda	Lab-in-the-field: Behavioral games that simulate whypaying taxes increases likelihood of punishing a 'leader' for their allocation decision.	Individuals are significantly more likely to punish 'leaders' for corruption when it involves their tax dollars instead of grants.
Ferraz and Finan (2008)	Brazil	Do audits that reveal corruption lead voters to hold elected politicians accountable?	Municipalities with mayors eligible for re-election in 2004.	Natural experiment where treatment is the random selection of Brazilian municipalities for audits of federally transferred funds	Mayors with at least two corruption violations (as revealed in the audit) are significantly less likely to get re-elected (17 percentage points); effect stronger in areas with better local media.
Reinikka and Svensson (2011)	Uganda	Can a newspaper campaign that provides parents with information to monitor local officials' handling of a large education grant program reduce corruption?	Schools entitled to receive capitation grants from the central government	Policy experiment: Compares before/after outcomes for 'treatment' schools that had access to news reports (vs. controls).	Huge effects: prior to the experiment schools received only 24% of yearly capitation grants—this increased to 80% attributable to the campaign.
Olken (2007)	Indonesia	Do government audits reduce corruption?	600 Indonesian village road projects	Two over-lapping treatments: (1) audits by central government audit agency, (2) increasing grassroots monitoring	Audits lead to decreased missing expenditures but to more family members of project officials being hired (substitution of corruption for nepotism).

4 Priorities for discussion

1. **What interventions for strengthening tax and PFM administration and capacity are most important for further investigation?** The evidence reviewed above suggests the importance of increasing auditing capacity; recruiting and incentivizing civil servants; and incorporating IT into procurement and fiscal transfers. With taxation and PFM there is scope for collusion between tax collectors and taxpayers or between civil servants handling procurement and contractors. There is still a need for more knowledge on how to use audits or other monitoring strategies for mitigating corruption. More monitoring and auditing of (shell) companies and banks is also needed to combat a growing trend towards illicit financial flows. Overall, what are the administrative reforms or IT solutions that are most promising?
2. **What are the important reforms at the macro-level that could be examined rigorously?** High-level interventions may be hard or impossible to implement with random variation but still merit consideration. For instance, with respect to taxation, we still know little about whether revenue decentralization to subnational governments is beneficial for increasing efficiency and/or accountability. Another important question centers on the effects on revenue mobilization, efficiency, and governance outcomes associated with different types of taxes (e.g. direct taxes like property taxes or indirect taxes like VAT) and different tax rates. Alternatively, it might be important to consider the effects of national level administrative reforms, like the introduction of semi-autonomous revenue agencies (SARAs).
3. **How should political economy considerations be linked into reforms of taxation and PFM?** The existing lack of evidence for the role of tax morale (i.e. all reforms to encourage voluntary taxpayer compliance) is plausibly an artifact of weak designs—informing taxpayers in developing countries that their taxes are important for funding services will not necessarily yield higher compliance if taxpayers do not believe that information. This suggests that governments have to do more to demonstrably and credibly link taxes and spending or combat corruption within administration to start inducing voluntary taxpayer compliance. Additionally, it could be important to empower taxpayers, for instance through providing information, facilitating participation, exploring technological solutions, or mobilizing collective action with the assistance of civil society.

5 References

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