Integrity and Incentives
Leniency, Whistleblowers, and the Deterrence of Corruption and Collusion in Public Procurement

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Introduction: Crime Deterrence

- Many social aims of Law Enforcement: Crime Deterrence, Desistance, Prosecution, Justice, Welfare

- Traditional ‘Economic View’: Efficient Deterrence
  - Rational choice philosopher Montesquieu, Beccaria, Bentham, analyse first “efficient” law enforcement
  - Then Becker (1968) analysis of optimal law enforcement
  - Hundreds of papers followed Becker’s analysis mostly focusing on single agent committing one illegal act

Very little attention to specificity of organized/multi-agent crimes like bid-rigging cartels and corruption
Cartels, Corruption, Fraud are Special

1. *Intrinsic governance problem*, instability due to opportunism, e.g. need to police *secret price cuts* (Stigler (1964), lack of explicit contractibility, equilibria).

2. Each member of the criminal team has *free information on others’* wrongdoing that can be extracted (there are always witnesses).

Imply novel types of deterrence:

*destabilizing/preventing collusive/corrupt agreements by offering leniency to self-reporting parties and protecting/rewarding witnesses that blow the whistle*
Leniency and Cartels

- In Antitrust: “Leniency revolution” in most advanced countries

- “Normal way” to detect cartels changed from buyer complaints, audits and dawn raids, to well designed leniency policies and self-reporting cartel participants

- Following the US “success”, Leniency Programs (LPs) introduced in the EU and most advanced countries

- Schemes similar to Prisoner’s Dilemma.
  - Can be designed badly and be counterproductive (Buccirossi-Spagnolo 2006),
  - but have very promising potential properties if well designed and administered (Spagnolo 2004, Aubert et al. 2006)
Main features of LPs

- Reduce sanctions against colluding/corrupting firm (or corrupt employee) that reports information to authorities

- only the first party that self reports eligible to maximal reduction in sanctions;

- max reductions to reports before an investigation has begun, and rapidly fall the later the report

- who self-reports and cooperates second can only obtain very limited forms of leniency (plea bargaining in US)

- individual leniency where individual liability
What’s New about Leniency?

- Common in war: Julius Cesar “Divide et Impera”, Nazis against “Resistance”, US against Hussein family, Al Quaeda

- In law enforcement: exchanges leniency/cooperation after detection and capture always made: Prisoner’s Dilemma

- Bounties against “Wanted” criminals before capture but after detection, individually tailored

- New: generality and publicity
  Codified programs, apply before detection to any wrongdoer
  May display direct deterrence effects (destabilizing cartels reducing “trust”), the stronger the most advertised

Similar to Italian “pentiti” program against Mafia and Terrorism
Crucial features according to “users”

- **Transparency**, certainty: give up discretion in prosecution

- **Generosity**: “automatic full amnesty” for first applicant, even after investigation started

- **First only**: second applicant no leniency or much worse

- **High expected sanctions**: increase value of amnesty

- **Threats/rewards**: Amnesty Plus, ILP, etc.

(see Hammond 2004)
Bigoni et al. (2009a,b)

Focus: Organized (economic) crime, corruption, collusion, fraud

Premise: Organized crime as the equilibrium outcome of a dynamic game between wrongdoers => additional deterrence channels:

- Organized crime must rely on self-enforcing agreements
  1. Incentive compatibility of the criminal agreement
  2. Trust among the members of the criminal organization

- There are witnesses: criminal partners have information on each others’ crimes, which may be elicited by suitably designed revelation mechanisms

Problem: Not observed unless detected. Detection rates may increase as a sign of effectiveness of a policy or because of its failure in deterrence. How to understand which policies work better?
What we did

Ran a set of laboratory experiments on explicit collusion in oligopoly

Results also relevant for strategically equivalent forms of corporate crime such as corruption, financial fraud, etc.

Simulated a repeated oligopoly in the lab embedded in different law enforcement environments

- Absence of enforcement: collusion is allowed
- "Traditional" law enforcement policies
- Leniency programs

Focus on how deterrence varies under these alternative policies depending on

- size of fines
- rewards for who betrays
- probability of detection
- experience
What we found

Main results

- Well designed leniency polices strongly increase deterrence, in particular when rewards are used, but not only then…
- … and alter the main mechanisms through which deterrence works:
  - Absent leniency deterrence increases with the expected fine
  - With leniency deterrence increases only with the actual fine
    => the trust problem prevails
- Significant deterrence effect of the sum of the fines paid in the past
  => Salience

Policy implications

1. Well designed leniency policies and rewards should be used extensively, particularly when resources for direct audits are few

2. Leniency should be complemented with high absolute sanctions rather than with a high probability of detection
   => Improves the efficiency of law enforcement
Rewards to whistleblowers

- *Qui Tam* rewards under *False Claim Act*: success
  - Lots of funds recovered
  - No problems of information fabrication
  - Useful intermediation/screening by DoJ

- US Internal Revenue Service: 30% of fines and recovered taxes to whistleblowers

- Essential to explicitly reward and protect whistleblowers in public procurement contracts