

Finding and Punishing Cartels: The Role of Public and Private Antitrust Enforcement

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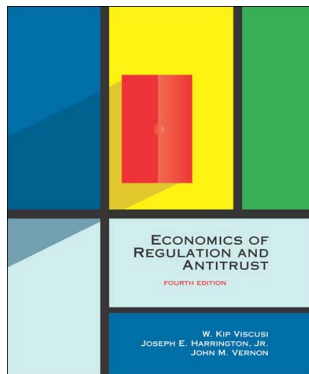
Introduction

- Market power is the inevitable result of a well-functioning market economy.
- Innovation creates market dominance \Rightarrow market power \Rightarrow anti-competitive conduct.
 - Examples: Apple, Google, Microsoft have a history of innovation and antitrust suits.
- Economies of scale results in high concentration \Rightarrow market power \Rightarrow anti-competitive conduct.
 - Examples: airlines, chicken processing, vitamins have had cartels

Introduction

Role for government intervention

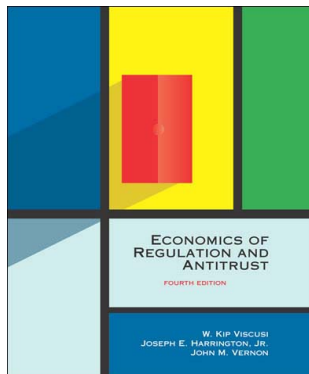
- When market power is abused or enhanced in ways that reduces efficiency.
- Challenge is reducing market power without harming the efficiency-enhancing process that creates market power.
- Two forms of intervention: antitrust, regulation



Introduction

Price regulation creates inefficiencies that tend to be *permanent*.

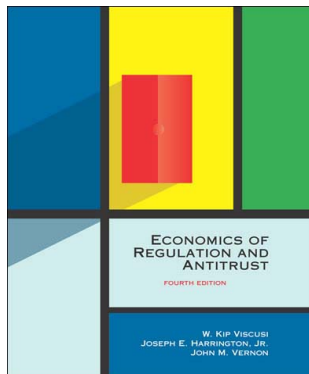
- Inefficient prices - regulators lack information about cost and demand.
- Reduced innovation - stifles incentives to innovate because firms are less able to appropriate the gains.
- Regulatory capture - regulators come to value stable prices and profits rather than "disruptive" entry and innovation.



Introduction

Antitrust (or competition policy) has inefficiencies but they tend to be *temporary*.

- Antitrust does not immediately detect or deter all collusion.
 - But cartels do not last forever. They internally collapse and are discovered and prosecuted.
- Antitrust often does not eliminate unilateral market power that causes price to exceed cost.
 - But entry and innovation can lower prices and improve consumer welfare.



Introduction

- Price regulation is rarely the answer to highly concentrated markets.
- Antitrust must be aggressive.
- Some approaches to a more aggressive competition policy in fighting cartels:
 - **Screening** market data can aid in actively searching for cartels.
 - **Private enforcement** has a prominent role to play in the discovery, prosecution, and penalization of cartels.

Cartel Screening

What is screening?

Screening is the analysis of market data for the purpose of detecting collusion.

- **Structural screening**
 - Identifying industries with a market structure conducive to collusion.
 - Conducive traits: high concentration, homogeneous products, excess capacity, etc.
 - Examples: cement, chemicals, construction
- **Behavioral screening**
 - Identifying collusive patterns in prices, bids, quantities, market shares, and other market data.
 - Examples: shrimp (The Netherlands - NMa), LIBOR (global - *Wall Street Journal*), generic drugs (Mexico - Cofece)

Cartel Screening

Requirements for behavioral screening

- 1 Data to examine for evidence of collusion
- 2 Knowing what to look for in the data
 - Structural break - change in the data-generating process which could be due to cartel birth, death, disruption
 - Collusive markers - patterns more consistent with collusion than with competition

Cartel Screening

What to look for in the data: Collusive markers

Collusive markers are regularities that distinguish collusion from competition and include:

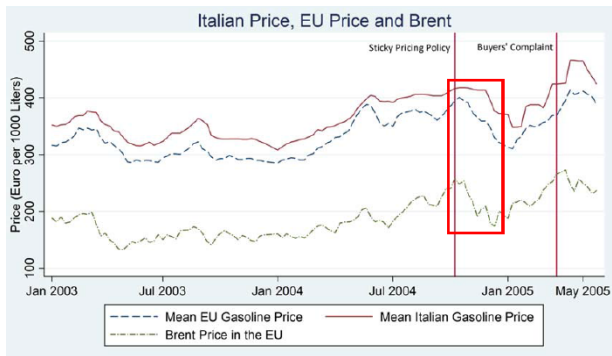
- High prices (compared to some competitive benchmark)
- V-shaped pattern to prices
- Low price variability
- Correlated bids at a procurement auction
- Stable market shares
- and others

Cartel Screening

What to look for in the data: Collusive markers

Collusive marker

- High prices compared to some competitive benchmark



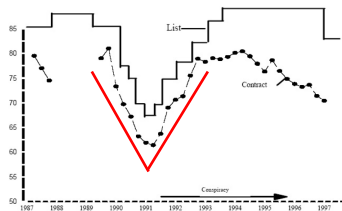
Gasoline (Italy)

Cartel Screening

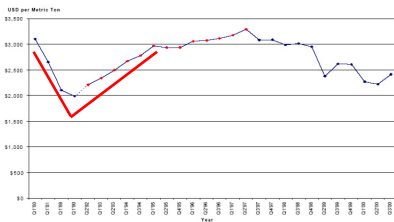
What to look for in the data: Collusive markers

Collusive marker

- V-shaped pattern to prices
 - Cartel formation is often preceded by price decline
 - Transition phase in which price gradually rises.



Citric Acid (global)



Graphite Electrodes (global)

Cartel Screening

What to look for in the data: Collusive markers

Collusive marker

- Low price variability
- Unresponsiveness to cost shocks

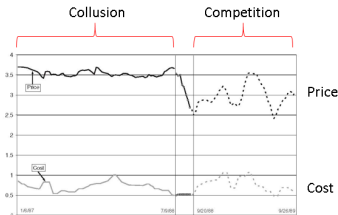
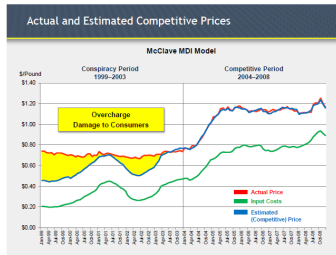


Fig. 1. Frozen perch prices and costs: 1987-9/26/99.

Frozen Perch (U.S.)



Urethane (U.S.)

Cartel Screening

What to look for in the data: Structural break

Structural break is a change in the data-generating process that could be due to cartel birth, death, or disruption

- Cartels can be detected at birth
 - Collusion must mean a change in the price-generating process which, in principle, can be identified.
- Cartels can be detected when disrupted by non-cartel members or death
 - Disruptions are not easily "managed" by colluding firms which often means sharply lower and more volatile prices.

Cartel Screening

What to look for in the data: Structural break

Pattern consistent with collusion: Entry has very large price response

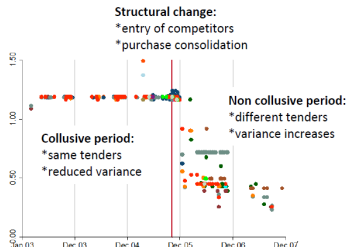
Under competition:

- modest decline in price

Under collusion:

- switch to competition \Rightarrow large decline in price

Figure 1. Medicine 1 average price 1



Generic drugs (Mexico)
Price levels went down
Price variability went up

Cartel Screening

Who should engage in screening?

Competition authorities

- Screening can be the basis for an investigation.
- Screening is more effective in the presence of a leniency program.
 - If a competition authority discovers a suspected cartel, an investigation might induce a firm to apply for leniency.

Economic consulting firms and plaintiff law firms

- Screening can be the basis for litigation to claim customer damages.

Cartel Screening

Who should engage in screening?

Companies

- Screening to determine if any suppliers are colluding.
 - Deutsche Bahn has a cartel detection team.
- Screening to determine if any employees are colluding.
 - Upon an employee's departure from Kühne, an internal audit revealed evidence of price-fixing in the EU industrial bulk vinegar market.
- Screening as part of a due diligence process before a merger or acquisition.
 - Only after acquiring Hoechst's chemicals business did Clariant discover Hoechst was involved in the MCAA cartel.

Cartel Screening

Screening retail markets

Some Retail Markets with Cartels in Recent Years

Auto insurance	Bank interest rates	Beer	Bread
Buses	Chicken	Cooking oil	Detergent
Generic drugs	Maize	Milk	Newspapers
Pharmacies	Propane	Sugar	Telephone services
Toilet paper	Tortillas	Toys	Wheat flour

Note: Peruvian cases in **bold**

Cartel Screening

Screening retail markets

- Data
 - Price data is public (not proprietary) though may not always be easily available.
 - Benchmark price series for other markets may be available.
- Patterns
 - Are prices high relative to a benchmark?
 - Are prices excessively stable? Are they unresponsive to input prices?
 - Was there a significant change in the price series? in the responsiveness of price to cost?

Private Enforcement

Overview

- 1 Government fines are too low and are insufficient to deter collusion.
 - Critical role for private litigation to increase penalties through customer damages
- 2 Competition authorities do not prosecute all suspected cases because of resource constraints and case selection.
 - Critical role for private litigation to supplement public enforcement

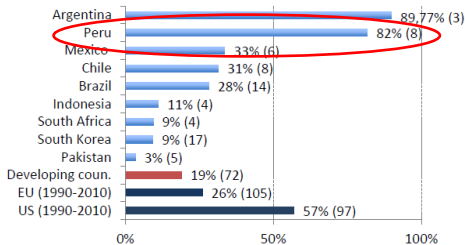
"These private suits provide a significant supplement to the limited resources to the Department of Justice." U.S. Supreme Court (Reiter v. Sonotone Corp., 1979)

Private Enforcement

Government fines are too low

- Deterrence requires that the penalty is a significant multiple of excess profit in order to make collusion unprofitable *in expectation*.
- In practice, collusion is profitable *even after having been penalized!*
- Peru performed relatively well only because cartel duration was short.

Graph 1: Comparison of penalty-excess profits ratios, %



Ivaldi, Jenny, and Khimich (2016)

Private Enforcement

Government fines are too low

Toilet Paper Cartel (Peru, 2005-2014)

- Market sales = 790 million nuevo sol/year
- Retail price = 67 céntimos/roll, Quantity = 1.2 billion rolls/year
- Cartel: Market share = 88%, Quantity = 1 billion rolls/year
- Overcharge = 10-20% or 10 céntimos/roll
- Excess profit = $.10 \times (1B) \times (10 \text{ years}) = \$1 \text{ billion nuevo sol}$
- "The fines ... could exceed US\$1 million [3.3 million nuevo sol] for each company."



Data source: *Peru Reports* December 15, 2015

Private Enforcement

Government fines are too low

- Fining guidelines ("severe" infraction)
 - Maximum fine of 1000 Tax Units or 12% of annual sales, whichever is lower.
 - Maximum fine is approximately 4-5 million nuevo sol.
- Problems with fining formula is that it is
 - not tied to excess profit
 - not tied to duration
 - too low.
- Creates an essential role for customer damages to
 - link them more closely to the excess profit from collusion.
 - increase the magnitude of penalties

Private Enforcement

Limits of public enforcement

- Private enforcement means higher penalties and **more prosecutions** due to
 - resource constraints faced by the competition authority.
 - case selection by the competition authority.
- Even though the Antitrust Division of the U.S. Dept of Justice (DOJ) is aggressive, private enforcement initiates many cases not pursued by the government.
 - Of 60 recent large private antitrust suits, 40% of them were initiated by the plaintiffs (Lande and Davis, *Georgia Law Review*, 2013).
 - Private litigants are more willing to take on "less explicit" collusion.

Private Enforcement

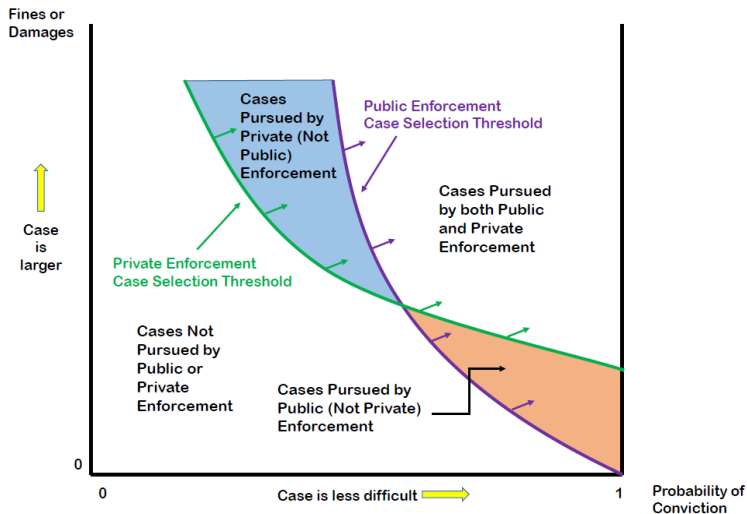
Limits of public enforcement

- Claim: Competition authority is more concerned with winning cases than with penalizing firms and deterring cartels.
 - May not be inclined to invest scarce resources into difficult or risky cases which can weaken deterrence.
 - May be inclined to focus on cases with a leniency applicant.
- Evidence from the U.S.
 - DOJ won 92% of 699 cases filed over 1992-2008 (Lande and Davis, *Brigham Young University Law Review*, 2011)
 - "The DOJ appears much more willing to tolerate a false negative (a failure to prosecute a violation of the antitrust laws) than a false positive (litigating a case when in fact there was no violation)."
 - More than 75% of cases involve the leniency program which suggests a focus on explicit collusion.

Private Enforcement

- Private litigants and plaintiff lawyers are more concerned with *expected profit* than the probability of winning.
 - Willing to take on risky cases if the damages are large.
- Combined public and private enforcement covers more legal ground because
 - public enforcers are more willing to take on small cases with high probability of success.
 - private enforcers are more willing to take on large cases with low probability of success.

Private Enforcement



Concluding Remarks

- Aggressive antitrust, rather than price regulation, is the proper response to highly concentrated industries.
- Aggressive antitrust means actively looking for cartels.
 - Screening market data for collusive markers and for radical changes associated with cartel birth, death, and disruption.
 - Without a tradition of convicting and harshly punishing cartels, Peru is likely to have many cartels.

Concluding Remarks

- Private enforcement has a crucial role to play in conjunction with public enforcement.
 - Indecopi has limited resources and cannot pursue all cases.
 - Indecopi may not want to use scarce resources on difficult cases but, if the damages are high enough, private litigants will pursue them.
 - Government fines are insufficient to deter and need to be augmented with customer damages.
- Private litigation should be encouraged with
 - hospital legal environment: class action, joint and several liability, flexible evidentiary standards
 - support from the competition authority - assistance in follow-up suits, sharing leniency documents.