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ANU COLLEGE OF ASIA & THE PACIFIC
CRAWFORD SCHOOL OF ECONOMICS AND GOVERNMENT

SHOULD AUSTRALIA ENCOURAGE DEVELOPING COUNTRIES TO ADOPT COMPETITION LAWS?

Henry Ergas



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Should Australia Encourage Developing Countries to Adopt Competition Laws? *

Requiring developing countries to adopt competition laws has become a standard element in Free Trade Agreements between those countries and developed countries, and in the 'check list' of measures sought by the World Bank and other multilateral institutions. However, there is little reason to think competition policy will increase welfare in those countries, especially as its proper implementation requires institutional capabilities that most developing countries lack. Despite this, the ASEAN countries, along with many other developing countries, have adopted competition policies that mirror all the prohibitions typically found in developed countries. It is suggested that it would be preferable were those prohibitions dropped, and competition policy refocussed on to a narrower set of instruments and objectives.

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Introduction

This paper examines some economic and institutional aspects of competition law and policy, with a particular focus on the implications for developing countries and specifically for the countries of ASEAN. While 'competition policy' is capable of many definitions (including some in which it is coextensive with microeconomic or structural reform), I concentrate on competition policy in its trade practices or anti-trust sense, noting that it is competition policy in that sense which has come into increasingly widespread application in developing countries in recent years.

The impetus for this article comes from the tendency of the major developed economies (including the United States, the European Union and Australia) to require adoption of domestic competition policy as a condition for entering into bilateral free trade agreements with developing countries. Moreover, introducing competition policy legislation has become an integral part of the 'checklist' of requirements associated with receiving assistance from the multilateral development institutions. However, how clear is it that introducing these laws will indeed make developing countries better off?

The view I have reached is that competition law may do more harm than good. Even if it offered potential gains — and even that is debated and debatable — its proper implementation greatly exceeds the institutional capability of many developing economies. To make matters even worse, by expanding the scope of discretionary intervention in the

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economy, it creates additional opportunities for corruption in countries where endemic corruption already stifles and distorts economic growth. In these countries, it seems far more prudent to adopt the conclusion reached about regulation generally by Edward Glaeser and Andrei Shleifer — namely that:

The first, and arguably most important, message of the model is that [there are situations in which] the optimal government policy is to do nothing. When the administrative capacity of the government is severely limited, and both its judges and regulators are vulnerable to pressure and corruption, it might be better to accept the existing market failures and externalities than to deal with them through either the administrative or the judicial process. For if a country does attempt to correct market failures, justice will be subverted, and resources will be wasted on subversion without successfully controlling market failures.²

The structure of this article is as follows. I start by considering the analytical bases of, and experience with, competition policy in the advanced economies, then turn to examine the particular challenges associated with implementing competition law and policy in developing countries. The article concludes with a review and discussion of the situation in ASEAN.

Competition and Competition Policy

Competition policy is one of the United States' most successful — though more recent — export products. After many years as an American eccentricity, anti-trust law entered into a phase of rapid diffusion in the closing years of the twentieth century, both in the advanced economies and, perhaps even more startlingly, in the rest of the world. Since 2000, nearly 70 developing and transition economies have adopted some form of competition law.

That this would occur was hardly obvious. While official reverence for the antitrust statutes has long been a feature of the American civil religion, it was a feature more tolerated than vaunted. Indeed, in his celebrated analysis of the US polity in the late 1950s, Richard Hofstadter saw anti-trust law as a spent force — one that, by 'ceasing to be an ideology and becoming largely a technique', had declined into one of 'a great many elements in our society that have become differentiated, specialised and bureaucratised'. As a result of that process, 'the business of studying, attacking, defending and evaluating oligopolistic behaviour' was merely 'one of our lively small industries, which gives employment to many gifted professional men'. That, he suggested, was why it survived, for 'it is not our way to liquidate an industry in which so many have a stake'.³

How this 'lively small industry' became a thriving global endeavour is an intriguing question on which many PhD theses in political science are doubtless being written. But what makes the question even more intriguing is the fact that there is hardly a consensus among economists on the substantive merits of competition policy. Even regarding competition itself, it has rightly been noted that:

While competition features prominently in the history of economic thought, it is fair to say that economists still have a limited, and sometimes contradictory, understanding of its economic effects, and in particular, of the relationship between competition and growth. What we have accumulated so far are only bits and pieces: on the one hand, theoretical arguments that make predictions of either a positive or negative relationship; on the other hand, contrasting pieces of historical or empirical evidence.⁴

As for competition *policy*, the state of the science is even more unsettled. This is for two closely related reasons. To begin with, changes in 'competition', however defined, are never free.⁵ Making an industry 'more competitive' (again, however defined) invariably involves a complex of changes — for instance, the addition of productive capacity — which impose costs. Left to their own volition, market forces will take account of these costs in determining market structure; *a priori*, it is not possible to say as a matter of economics that welfare would be improved by somehow engineering more 'competi-

tion' than those market forces themselves generate. While it is, of course, conceivable that market forces will result in less competition than would be socially optimal, it has also been known for many years that even a free-entry equilibrium may be characterised by 'too much' competition, either in the 'empty core' sense classically demonstrated by Telser, or in the sense of the 'excess entry' model of Mankiw and Whinston.

Second, identifying the specific instances in which 'more competition' is preferable to 'less competition' is difficult, if not impossible. This means that implementing a competition policy — that is, overriding the market structure and conduct decisions that result from market forces (and the Coasian bargains that arise from those market forces) — invariably involves decisions that have a substantial element of subjectivity, and a consequent high vulnerability to error.

This is true even of those aspects of competition policy that seem most widely accepted. For example, although economists have long been critical of cartels, a recent authoritative survey notes that: 'It is in some sense paradoxical that the least controversial area of anti-trust [the prohibition on price fixing] is perhaps the one in which the basis of policy in economic theory is weakest.'9 As for the evidence on the effects of price fixing, it too is far from conclusive, with findings that range from collusive agreements reducing prices (for example, Sproul, who finds that prices tend to rise following indictments for collusion), ¹⁰ to no or modest price increases (see Stigler and Kindahl; Sultan; and Porter and Zona), ¹¹ through to substantial price rises (Connor, noting that Connor's estimates were evidence for the plaintiffs in anti-trust proceedings). 12 The evidence on whether collusion is harmful in the other dimensions of efficiency is extremely scant, but here too it is at best inconclusive (for example, see d'Aspremont, Encauoua and Ponssard). 13 Indeed, in the 'empty core' case, collusion will both lower expected prices and improve productive efficiency. ¹⁴ The assumption that price-fixing harms welfare, and does so both generally and materially, is therefore not solidly founded. The risk that measures aimed at preventing price-fixing will reduce welfare is then magnified by the scope for error in detecting whether it has occurred and in setting penalties.

Issues with respect both to the sign and extent of impacts, as well as about the risk of error in assessment, are even greater for the other types of conduct sanctioned by the competition laws.

Vertical restraints, vertical integration and the risk of foreclosure, which were once a major focus of the competition laws, ¹⁵ are a case in point. A recent survey of these by Lafontaine and Slade, is based upon citation of nearly 200 sources, 80 or so of which are empirical. ¹⁶ The authors' overall conclusion is that:

[W]e did not have a particular conclusion in mind when we began to collect the evidence, and we have tried to be fair in presenting the empirical regularities. We are therefore somewhat surprised at what the weight of evidence is telling us. It says that, under most circumstances, profit-maximising vertical integration decisions are efficient, not just from the firms' but also from the consumers' point of view. Although there are isolated studies that contradict this claim, the vast majority support it. Moreover, even in industries which are highly concentrated so that horizontal considerations assume substantial importance, the net effect of vertical integration appears to be positive in many instances. We therefore conclude that, faced with a vertical arrangement, the burden of evidence should be placed on competition authorities to demonstrate that the arrangement is harmful before the practice is attacked.¹⁷

It is, of course, possible to devise models in which vertical restraints (be it through contract or integration) soften competition, create entry barriers or both — indeed, devising such models has been a substantial growth industry since the pioneering study on equilibrium foreclosure by Ordover, Saloner and Salop. 18 However, as with other gametheoretic analyses of anti-competitive exclusion and foreclosure, these models are invariably highly sensitive to the assumptions on which they are based, including importantly the essentially untestable assumptions about expectations regarding behaviour off the equilibrium path. ¹⁹ Moreover, it is generally possible to devise more than one such model to 'explain' any given course of conduct where the implications of the various models for welfare differ dramatically. Additionally, it is not usually possible to devise an empirical test that will discriminate effectively between these models in a particular fact-situation, both because some of the underlying assumptions are not capable of being tested (such as the nature of expectations of off-the-equilibrium-path behaviour), while for others there are typically too many variables and too few observations.²⁰ As a result, the models are best viewed as 'stories' — or, to use Frank Fisher's term, as 'games economists play', 21 which tell us that some things are possible but say little about likelihoods, and which can well be dangerous when used as a basis for administrative or judicial decision-making.²²

Exactly the same cautions apply to mergers. Although there is a vast body of theory that examines the impact of horizontal and vertical mergers under alternative assumptions, there is little evidence that these models do a good job of predicting outcomes in general, much less in particular cases. Indeed, one of the best-known studies of the predictive ability of merger simulation models finds errors that are substantial, and that go in both directions.²³ Moreover, even at a theoretical level, the effects of particular features of the industry context on merger outcomes are poorly understood and usually ambiguous — for example, low entry barriers may reduce or increase the harm associated with a price-increasing merger;²⁴ equally, consumer switching costs may increase or

reduce the price-elevation effect of a horizontal merger. And it hardly needs to be said that little is known that is conclusive about the effect of mergers on innovation, other than the fact that no general conclusions can be drawn either from the theory or from empirical studies. All of these uncertainties are then compounded by the difficulties involved in gauging in advance of a merger the extent of the efficiencies it will yield, the response of suppliers, competitors and consumers to those efficiencies, and the ultimate consequences for the various aspects of welfare.

In short, even quite basic concepts such as 'market power', 'conduct that lessens competition' and 'competition on the merits' are difficult to pin down and even more difficult to properly apply. ²⁶ The most generous interpretation is that, to use W. D. Gallie's famous classification, these are concepts that are 'essentially contested'. ²⁷ Such 'essentially contested' concepts are not incapable of being the subject of notions of evidence, cogency and rational persuasion, related to 'the rationality of a given individual's continued use (or change of use) of the concept', but it is quite impossible to find a general principle, of overarching and enduring validity, for 'deciding which of two contestant uses of an essentially contested concept really "uses it best'". ²⁸

Implications for institutional design

This relatively unsettled state of our understanding of competitive processes has important implications for the design and functioning of competition policy institutions.²⁹ These implications can be seen from the standpoints of both classical jurisprudence and the economics of principal–agent relations.

Thus, internally complex, inherently appraisive and essentially contested concepts have long been seen as posing a particular challenge to the integrity of administrative and legal decision-making. Max Weber, for example, believed that such concepts were inimical to predictable, substantively rational decision-making by administrative and judicial entities, and that allowing them as a basis for legal claims invited a descent into 'kadi justice' that undermined the ability of economic actors to plan, contract and efficiently arrange their affairs.³⁰ Indeed, for Weber the development of a judicial system capable of supporting a capitalist economy required the shedding of such concepts from the armoury of formal adjudication, though he recognised that the very development of a modern economy gave rise to incessant pressures for the reintroduction into law of concepts that are 'amorphous', for they ultimately do no more than 'express substantive ethical claims'.³¹

A similar concern underpins Lon Fuller's concept of 'polycentric' claims in adjudication — that is, claims that involve many interacting causal factors and where outcomes are

shaped by those causes working through a broad number of actors, only a few of whom are parties to the proceedings.³² Fuller hypothesised that attempts to deal with these situations through the legal system were likely to fail, both because of the inherent complexity of the situation and of our ignorance about cause–effect relationships. Additionally, citing industry regulation as a case in point, he argued that the relevant decisions had so great an element of subjectivity that the integrity of the decision-making process would be undermined, for the decision-maker would become a 'czar', ignoring 'the peculiarly urgent demand of rationality' characteristic of legal-bureaucratic processes. Inevitably, that 'czar' would 'gradually drift into a kind of charismatic leadership, the peculiar magic of which is valid only within a limited context. Even within that context, the business of 'playing God' can be very dangerous, as experience has often demonstrated.'³³

Seen from a more economic perspective, these concerns reflect an underlying doubt about the efficiency of the principal–agent structure inherent in the implementation of competition policy.

Thus, implementing competition policy requires highly specialised expertise and the ability to gather and evaluate complex information; as a result, it is a task that is naturally delegated to an agent who either has, or is well placed to acquire and implement, that expertise. However, the nature of that task, and the consequent asymmetry in information between the agent and the principal, makes it difficult — if not impossible — to evaluate the quality of the agent's actions. The fact that competition policy involves a large number of relatively small, heterogenous, decisions — some dealing with approvals, others with prohibitions and many with the question of whether or not to act at all — makes performance monitoring and evaluation all the more difficult. The risk therefore arises that the agent will act in its own interests, rather than in the interests of the principal. This is the essence of 'regulatory capture', in which the agent extracts an information rent from its specialised knowledge, by using its discretion to advance its own preferences (for instance, for reappointment) and/or to collude with (some of) those it is intended to regulate. The more difficult it is for third parties, including the principal, to monitor and evaluate the agent's conduct, the greater the resulting risks and also the likely welfare costs.

The greater the agent's substantive independence, the more these risks and costs are increased, since that independence makes it more difficult and costly for the principal to monitor the agent's decision-making processes. However, such independence may be particularly desirable if it allows the principal to resolve otherwise costly commitment problems. The credibility of commitments becomes especially important when it is desirable for economic agents to make investments that have an element of irreversibility in reliance on actual or implied policy promises, and which hence are vulnerable to loss should those promises not be kept. Time inconsistency is the canonical form of this com-

mitment problem in economics, with the term referring to situations in which conduct by a policy-maker that is rational *ex ante* is not (and is known not to be) rational *ex post*, so that rational actors will discount the probability of a commitment to that conduct being maintained.

The problem of time inconsistency is readily illustrated in the context in which the term was initially developed: monetary policy. Consider a central bank facing a trade-off between inflation and unemployment, in which current inflation depends also on expectations of inflation in the future.³⁵ The credible announcement of a future policy tightening, in excess of that needed to curb current inflationary pressures, lowers inflationary expectations, thereby easing today's trade-off. Given that, it is optimal for policy to seek to exhaust the marginal benefits of this announcement effect. However, once the recession that this tightening implies arrives, the optimal policy is to reverse course, renege on the announcement and avoid the recession. But for the original intention to have the desired effect, it must be believed to be credible — in other words, for the sacrifice ratio (the cumulative increase in unemployment that is due to the disinflation effort divided by the total decrease in inflation) to be improved, investors, wage-setters and other pricemaking actors must believe that the central bank will not deviate from the policy it has announced, regardless of the consequences. The lower the probability attached to the central bank staying the course, the less effect the announcement will have on the costs of disinflation.

At least analytically, a similar issue of time inconsistency can arise with respect to competition policy. More specifically, consider investments undertaken today in view of obtaining quasi-rents in future periods. Altering the competitive rules of the game could redistribute or in other ways expropriate those quasi-rents. Such an expropriation might, *ex post*, be of benefit to the principal — for example, if it enriches and hence strengthens the coalition on which the principal relies. Given that, investors will be reluctant to invest unless they can be confident that the principal will not engage in time-inconsistent behaviour.

In Stanley Kubrick's 1964 film *Doctor Strangelove*, the time inconsistency problem is solved through a commitment technology — the 'doomsday machine' — that, once put in place, will in the event of a surprise nuclear attack automatically 'destroy all human and animal life on earth', despite the fact that this 'is not a thing a sane man would do'.³⁶ In the economic literature, the institutional equivalent of the 'doomsday machine' is the independent central bank which, vested with the discretion to control inflation, does not succumb to the temptation to seek short term gains in real output at the expense of long-term price stability.

This occurs because the central bank, unlike the executive government, does not

internalise (or internalise to the same extent) the political benefits that short-term output expansion would create. In other words, by delegating the control of inflation to the central bank, the government severs the costs and benefits of the inflation–real output trade-off, assigning the price stability objective to an agent whose benefits depend mainly or solely on the inflation rate. In its simplest form (often referred to as 'Rogoff delegation'),³⁷ this is done by vesting control of the central bank in individuals who are especially 'conservative', in the special sense of having an unusually strong aversion to inflation — that is, having a utility function in which immediate real output gaps have little weight relative to long run price stability.³⁸ Given those preferences, commitments to price stability will be regarded as credible, reducing the costs of disinflation.³⁹

Whether this account of central bank independence is plausible is a matter of intense debate, both regarding the solidity of its theoretical foundations⁴⁰ and its empirical relevance. So too is the question of whether, as a factual matter, central bank independence, however defined, actually reduces the sacrifice ratio, with perhaps the best that can be said being that the case in favour of independence is not proven.⁴¹ But even assuming it were, there is a substantial difference between the position of a competition authority and that of an 'independent' central bank, such as the Reserve Bank of Australia or, even more so, the Reserve Bank of New Zealand.

In effect, the central bank does not have independence with respect to the *out-come* it seeks to achieve — rather, a specific inflation target is set by the government (in the case of the RBA, through the Statement on the Conduct of Monetary Policy).⁴² In that sense, the bank is given a relatively narrow objective to pursue. All that is delegated to the central bank is *instrument* independence, which is typically very limited in scope and which generally involves a relatively small number of readily monitored decisions. Moreover, as the bank's performance in meeting the target is reasonably easily observed, its effective accountability is substantial.

In contrast, the objectives set by a competition agency are vague at best, and open to conflicting interpretation; it has a broad range of instruments it can use to achieve those objectives and significant discretion in respect of priorities; its decisions are many, heterogeneous and very difficult to observe, much less assess; and it is not possible to measure the extent to which its objectives are being met. All of this makes the underlying principal—agent problems especially acute in the case of a competition authority and means that the costs of delegation and of substantive independence may be high. In short, there is nothing that says that, left to its own devices, the agent to whom competition policy powers are delegated would impose lower rent-seeking costs than would arise were the powers left directly with the principal.⁴³

As in other principal-agent problems, there are familiar recipes for reducing the

costs and risks of rent-seeking, but they are not costless and their practical efficacy is in some respects limited. For example, a standard approach in the theory is to pay the agent an efficiency wage — that is, a wage that is marked up above the agent's opportunity costs so as to increase the cost of punishment should shirking or rent-seeking by the agent be detected. However, for low probabilities of detection (as would inevitably be the case when output is highly costly to measure), the efficiency wage would need to be very high, possibly even greater than the economic costs of the rent-seeking, straining economic and political acceptability.⁴⁴

Another solution that usually attenuates principal–agent problems is to multiply the number of agents to whom powers are delegated. In principle, this could be done by allowing agents to compete in the exercise of competition policy responsibilities (hence inducing a form of yardstick competition), as happens to some extent in the United States, 45 possibly reflecting the sheer scale of the US market and hence its greater ability to absorb the relevant fixed costs. An alternative is to form distinct agents into a hierarchy, as occurs in appellate processes; however, the efficacy of that approach depends on the extent to which (and the costs at which) the substantive expertise can be replicated. This is obviously difficult to do when the initial process is inquisitorial, and can draw on a standing and specialised bureaucracy, while the appellate review process is adversarial, and draws on more general expertise. 46 Moreover, appellate processes are inefficient when their outcomes confer substantial externalities and/or have a public good aspect (as occurs when rent-seeking by an agency is curbed for the public benefit), as the parties adversely affected by the rent-seeking will have too few incentives to undertake otherwise socially desirable litigation (since some part of that benefit flows to others). 47

The implementation of competition policy therefore involves substantial issues of institutional design. On the one hand, the desire to bring specialised expertise to bear and to enhance time consistency make delegation to an independent agent attractive; on the other, the performance of such an agent is inherently difficult to monitor and evaluate, creating serious scope for the agent to take rents for itself, including by indulging its own preferences, at a cost to economic efficiency.⁴⁸

Overall Outcomes

As a result, there are two types of dangers inherent in the implementation of competition policy: the risk of error, which arises from the limits of our ability to understand how markets work and to identify correctly and give effect to interventions that increase welfare by enhancing competition; and the risks arising from principal—agent problems, including those of rent-seeking or self-preferment.

Set against the reality of these risks, it is unsurprising that economists' assessments of the record of competition policy are extremely mixed. At the most basic level, it would be rare to find a contemporary economist who would endorse the reasoning and most of the outcomes underpinning the great anti-trust contests of the twentieth century. Thus there are obvious, serious and generally recognised defects in the economic analysis involved in landmark cases such Standard Oil, IBM I, II and III, United Shoe Machinery and the various Alcoa cases — see Bork's still remarkable study, 49 as well as several others. 50 It may well be that more recent case law is better informed economically, but many leading cases (including the Microsoft decisions and the LePage bundling case) remain mired in controversy.⁵¹ Equally, Korah⁵² highlights the many confusions that underpin the leading European decisions from the 1960s to the late 1980s, including the persistent failure to distinguish carefully ex ante from ex post, and the no less persistent failure to distinguish protecting competitors from protecting competition. As regards the more recent EU cases, there too the quality of the economic reasoning has improved, but decisions such as that in the Honeywell/GE merger are at least problematic. A similar assessment would, in my view, await many of the Australian cases were they reviewed as carefully as the ones overseas have been.⁵³

Nor is the overall or macro assessment much less troubled. Although such analyses run into the problems of evaluation stressed above, one recent attempt, by Crandall and Winston, finds no evidence that US anti-trust policy has improved consumer welfare, much less economic efficiency overall. While that assessment has been criticised by Baker, for Crandall and Winston's view is not inconsistent with previous findings such as those of Stigler and Kindhal, for with Fligstein's conclusion that anti-trust policy had distorted the growth of US corporations into inefficient conglomerate mergers. Fequally, the well-known findings of Chandler—that patterns of industrial leadership and market dominance in capitalist economies have overwhelmingly reflected underlying efficiency, including in countries (or at times) where competition laws were not in effect—seem at odds with the view that an active competition policy is needed to ensure economic efficiency. After all, countries such as Sweden, Austria, Switzerland and The Netherlands achieved very high levels of productivity and of per capita incomes in the post-war period while tolerating (and in some instances enforcing) myriad practices that in any other country would be considered serious breaches of the competition laws.

Of course, the OECD and others attempt to use cross-country regressions to analyse the effect of competition policy, usually by adding dummies for competition policy to data sets of economic outcomes. However, for the reasons cogently set out by Bardhan (2005), it is not easy to put much weight on studies of this kind. Typically, causal links are only sparsely identified and tested; there are serious problems with endogeneity and

omitted variable bias; and changing the instruments and the variables has been shown to alter the results materially. Overall, the results would be more convincing if they were consistent with, rather than at odds with, the more micro assessments.

This is not to imply that competition policy is necessarily harmful. Rather, the point is that its design, implementation and outcomes are far from simple or unproblematic, even in countries such as the United States that have long experience in competition analysis, an abundant pool of expert economists and lawyers, ready access to relevant data, and a well-trained and highly professional judiciary.

The Developing Country Context

The challenges for competition policy implementation in developing economies are, however, even greater than this assessment suggests. This is because of both the economic context and the problems of governance.

The economic context

While many issues are involved in successful economic development, a critical problem is that of the credibility of commitments, and in particular of commitments not to exploit trading partners. ⁶⁰ This problem of trust arises most obviously with respect to the state (and is discussed below in that context), but is also an issue between private parties. (Commitment problems between the state and economic agents are usually described as being 'vertical' in character, while those between agents are 'horizontal'.) In contexts where legal remedies are costly, discriminatory and often ineffective, difficulties in securing and retaining trust increase transaction costs and hence erode the gains from trade. At the same time, the absence of effective commitment devices makes it more difficult for parties to coordinate sunk investments that are strategic complements, such as where the marginal return from one party's investment is an increasing function of the investments made by others. As has long been known, the failure to undertake these complementary investments can generate and perpetuate equilibria at low levels of output and of per capita income. ⁶¹

These problems of horizontal commitment are capable of being mitigated by 'self-help' remedies that, viewed superficially, seem anti-competitive. Two such remedies are especially important. The first type constitutes those associated with the creation and protection of investments in reputation. All reputation-based approaches to engendering and enforcing trust involve costs, and those costs are greater the less effective are the mechanisms for detecting and punishing breaches of trust. As has been shown, ⁶² multi-lateral monitoring and punishment devices (where admission is granted and punishment

is enforced by a community) are more efficient than bilateral devices (that is, situations where the cheater is punished only by the cheated). The greater cost to the cheater of the multilateral punishment, and the increased risk of detection, mean that less of a mark-up needs to be paid to potential trading partners over their reservation wages to induce honest trade, so that more mutually advantageous trades can be undertaken.⁶³ However, in countries where state structures are costly or ineffective in protecting bargains, securing those outcomes requires institutional mechanisms (which may be formal, such as guilds, or informal, such as family, clan, caste, ethnic and religious networks) that limit entry, refuse to deal with non-members or outsiders, and impose and enforce group boycotts on cheaters or on high-risk trading partners. Even in countries where open, legal-rational, systems of rule-making have developed, these mechanisms can remain important in underpinning relational contracts;⁶⁴ their role is even greater when such rule-making is limited and/or does not cover the geographical range of mutually advantageous trades (as in the Chinese trading communities studied by Redding).⁶⁵

The second set of mechanisms relates to groupings of economic agents that coordinate durable, specialised and complementary investments. This coordination function can be undertaken within industrial groups (as has historically been important in France⁶⁶, Japan⁶⁷ and Korea⁶⁸) that bring together producers in adjacent, at least partly competitive activities; by financial institutions, that enforce or encourage cooperation through their debt positions and ownership stakes (as in Sweden⁶⁹ and Germany⁷⁰); through direct coordination between separate enterprises, including agreement over prices and quantities, as historically occurred and still occurs in Italian 'industrial districts';⁷¹ and through combinations of all of these. Although these mechanisms have an inherently poor fit to the conventional competitive model, particularly when they bring together suppliers that are closely related and overlapping, few would dispute their role in economic development.

As a result, structures, agreements and practices (such as refusals to deal with entrants) that seem anti-competitive are often an efficient adaptation to the need to impose order and predictability in trading and investment relations. There is therefore even less presumption than there would be in mature industrial economies that outcomes would be enhanced were these practices restricted or prohibited, especially in the absence of effective, state-based alternatives.

The governance and institutional context

This leads naturally to a consideration of the vertical dimension of the commitment problem, that is the credibility of the commitment by the state and its agents not to expropriate traders and investors. The critical form this problem takes is that of corruption, which is the primary form this expropriation typically takes.

There are three key preconditions for corruption:

- the vesting in officials of discretionary powers;
- the presence of economic rents, that may either be extracted by officials, or created by those officials in exchange for some part of those rents; and
- weak institutions, lacking in the accountability mechanisms needed to deter officials from using public office for private gain.⁷²

Given those preconditions, the extent of corruption is greatest when decisions taken by officials are difficult to identify, monitor and assess. One factor that compounds that difficulty is when the payers and receivers of bribes can collude, as in the creation and protection of rents. In that case — which Shleifer and Vishny⁷³ term 'corruption without theft' — the victims have no incentive to assist in the detection and punishment of corruption, though the resulting relationships then become vulnerable to blackmail and extortion, including by other officials. Of course, those difficulties of identification and detection are especially great when the inherent merits of decisions are not readily assessed, and when reasonable pretexts can be provided by officials for deciding as they have.

These conditions are readily met in the case of competition policy. To begin with, the decision by officials to permit, prohibit or ignore conduct can be associated with substantial rents for those directly affected. Incentives for parties to collude with officials in the taking of those decisions, and share the gains, are therefore strong. Moreover, few such decisions are, or can ever be, formulaic; indeed, even attempts at making them so — say, by relying on market share rules — generally fail, as they simply divert the decision-maker's discretion from other judgements to the definition of the relevant market (or other basis for the attempted formula). Further, some of the most important decisions — which are decisions not to act — are not generally reported and may not be observable. And it is very rarely the case that no sensible reason can be given for whatever decision is taken. As a result, it is virtually impossible to identify 'aberrant' decisions and subject them to investigation.

At the same time, the gains from corruption can be high. Inquisitorial powers can be used to identify the quantum of the rents accruing to a party, reducing the information disadvantage that often limits the gains from corruption in other areas. Additionally, it is often obvious which cases are likely to have the greatest ability to pay, avoiding the need to devise complex revelation schemes for willingness to pay, such as those examined by Liu. ⁷⁴ Moreover, the mere fact that a merger is being sought will itself signal the potential for a profit gain, and hence allow officials to share in that gain. Finally, the fact that the corruption can readily be non-pecuniary, as in the imposing of conditions on mergers or

other conduct that advantage groups, clients or constituents linked to the decision-maker, reduces the risk of detection and hence increases the gains in an expected value sense. It is therefore not surprising that Ades and Di Tella⁷⁵ find that corruption is greater in countries that have discretionary forms of industry intervention.

No simple but effective ways of dealing with these issues have yet been identified. Indeed, some of the conventional prescriptions appear to make matters worse or at least, can do so. For example, increasing the number of officials involved in decisions creates multiple veto points, and gives rise to a double marginalisation problem (in which each official takes a 'cut' either so as to make a decision happen, or so as to prevent it), yielding higher overall corruption than would otherwise have occurred. Indeed, in the extreme case, where there are multiple layers of decision-making, each with its own, uncoordinated, claim on the rents, outcomes come to resemble the 'roving bandit' case famously discussed by Mancur Olson⁷⁷ and known to be far more inimical to economic growth than the 'stationary bandit' whose monopoly status allows him to internalise the benefits of economic progress.

These problems are not improved to any material extent through monitoring by aid-granting organisations. As is discussed at length in Easterly, and has been shown more formally by Seabright,⁷⁸ the incentive structures of international aid programs are poorly geared to the monitoring of outcomes, and may indeed undermine that monitoring, for instance by creating joint agency problems.⁷⁹ The natural tendency in such programs is to focus on inputs, or at best on the most readily measured outputs, with a marked inclination to a 'tick the box' approach as far as institutional issues are concerned — that is, a tendency to require that certain institutions be set up and laws passed, with little real scope to monitor their effects. As Easterly well explains, it is that 'tick the box' approach that has led to the proliferation in recipient countries of institutions they are very poorly equipped to operate and that merely create further opportunities for poor governance and corruption.

All of this matters because it is now well known that corruption, both in its more venal forms and also in the form of 'influence peddling' on behalf of client groups, is especially harmful to development. Although bribes are mere transfers (and hence do not necessarily entail the direct resource cost involved in other forms of rent-seeking), the fact that corruption inevitably taxes some activities and firms and not others, and does so at widely varying rates, distorts the allocation of talent, technology and capital away from their socially most productive uses. ⁸⁰ Moreover, the scope for corrupt officials to expropriate future rents (for instance, by threatening to prosecute firms with a strong market position) discourages investment and can particularly penalise activities (such as mergers that require approval) that otherwise would rearrange ownership rights in ways

that maximise wealth. Last but not least, the fact that corruption is invariably illegal leads to investments in concealment, deception and evasion that positively reduce wealth, as when bribes are paid in inefficient ways (for instance, by the imposing of conditions on approvals that advantage the official's clients, but do so by less than would a direct pecuniary transfer).

It is therefore far from reassuring that so many countries with weak governance and apparently high and endemic levels of corruption have adopted competition policy institutions in recent years, often as a condition of receiving international aid. As can be seen from Table 1, of the 103 developed and developing countries that have enacted competition policy laws, there are 52 that are rated as very corrupt by Transparency International (that is, they have a corruption perception score of 3 or less) and twelve that are both highly corrupt and have a 'serious' or worse rating on the George Mason University/ University of Maryland State Fragility Index (noting that the State Fragility Index is only available for a smaller sample of countries). Under these circumstances, there must be a substantial risk that the combination of poor governance, weak human resources and the inherent complexity of competition policy will lead to far worse outcomes than would prevail had the competition powers not been enacted.

Table 1 Number of countries with a competition law in effect in 2008, ranked by level of the State Fragility Index and the Transparency International Corruption Perception Index

	State Fragility Index	Transparency International Corruption Perception Index	
High	5	9 to 10 (low)	8
Serious	11	8 to 8.9	6
Moderate	20	7 to 7.9	7
Low	22	6 to 6.9	7
Little or no	42	5 to 5.9	9
		4 to 4.9	14
		3 to 3.9	23
		2 to 2.9	2
		1 to 1.9 (high)	1

Note: For the Transparency International Corruption Perception Index, lower values of the index imply higher levels of corruption.

Source: Compiled by the author.

The Situation in ASEAN

Turning now to the situation in ASEAN, the main features of the competition law arrangements are summarised in Table 2, which is organised using a scheme set out by Neven,⁸¹ who examines features of European competition law according to five criteria, which are:

- the *scope of the statute*, that is, the substantive conduct covered by the statutory provisions;
- the *nature of proof taking*, that is, the balance between inquisitorial and adversarial forms of collecting and testing evidence;
- the *standard of proof*, in the sense of the evidentiary threshold that must be met;
- the *set of sufficient facts*, which refers to the presence of indicia that constitute prima facie proof the matter, that is, they are deemed to suffice to make out the contravention; and
- the standard of review, that is, the scope for appeal against administrative decisions.

Of the five countries that have a competition law, as such, in place — Indonesia, Laos (draft legislation only), Singapore, Thailand and Vietnam — all with the exception of Singapore have included prohibitions on all forms of potentially anti-competitive conduct, including horizontal agreements, vertical agreements, unilateral abuse, and potentially anticompetitive mergers. Singapore has no prohibitions in place on vertical agreements. Additionally, all have some form of deeming provisions which proscribes, on a *per se* basis, so collusion, as well as for Indonesia price discrimination and for Singapore (which echoes the EU formulation) conditions unrelated to the substance of the agreement. As regards the standard of proof, which is most relevant where these *per se* provisions do not apply (or when it is contested whether the conditions under which they apply are met), it is invariably the balance of probabilities. With the exception of Laos, there are provisions for appeals on the merits, though those appeals appear to be primarily in the ordinary courts.

Overall, these countries therefore have far-ranging prohibitions — typically with the same reach as those in the OECD countries, though Singapore lacks a prohibition on vertical agreements — largely administered, and seemingly often determined, by the inquisitorial body charged with responsibility for competition policy. Moreover, the threshold for liability is in some instances very low — for instance, in Vietnam, a 30 per cent market share is sufficient to bring a firm within the ambit of the prohibition on unilateral abuse⁸⁴ (a lower threshold than the Australian High Court found in its Boral decision, and far lower than the required level of market power for a monopolisation claim to be heard in the United States). Additionally, in at least some cases, that body has far-reaching powers — for example, in Thailand to search for and seize information⁸⁵ and in Vietnam

to impose custodial sentences.86

With the exception of Singapore, which has a relatively high level of disclosure, ⁸⁷ relatively little information is available with respect to enforcement, ⁸⁸ though it is known that a number of investigations have been undertaken in the other jurisdictions. It appears that the ratio of investigations to identified contraventions is high, with investigations generally resulting in a decision not to proceed. ⁸⁹ For reasons discussed at length above, it is difficult to interpret this outcome, as it could be consistent either with undesirable influence-activities leading to meritorious cases not being pursued, or with a genuinely reaching finding that a contravention was unlikely to be found were the investigation to proceed.

As regards the ASEAN countries which do not have a competition law in place, the Philippines has a number of provisions, including constitutional prohibitions on monopoly, which are implemented through a range of legislative instruments. Thus, Article XII, section 19 of the 1987 Constitution states that the state shall regulate or prohibit monopolies when the public interest so requires. Further, no combinations in restraint of trade or unfair competition shall be allowed. However, the Philippines currently does not have a comprehensive competition law regime. Instead, competition policy and law is implemented at the sectoral level, with at least eight separate pieces of legislation that contain elements of the competition framework, including the *Penal Code* (RA 3815), the Intellectual Property Code of the Philippines (RA 8293), the Price Act (RA 7581) and the Consumer Act of the Philippines (RA 7394). The enforcement and regulation of unfair trade practices and anticompetitive behaviour are vested in numerous agencies such as the Tariff Commission, the Bureau of Trade Regulation and Consumer Protection within the Department of Trade and Industry, the Intellectual Property Office, the National Telecommunication Commission, and the Energy Regulatory Commission. As well as causing administrative complexity, this can make it more difficult to monitor procedural integrity (as it can give rise to the multiple veto point problem) and creates the risk of double marginalisation discussed above.

Finally, Malaysia is expected to issue a draft competition law in the near future, though the scope and content of that law are not known at this point.

Overall, in those countries that do have competition statutes in place, both the scope of the prohibitions and the nature of the implementation arrangements seem ambitious and potentially disproportionate. The possible exception in this respect is Singapore, which has been more measured in the coverage of its prohibitions (notably through the exclusion of vertical restraints), has broadly set and implemented higher thresholds for intervention, and additionally benefits from generally good governance arrangements, excellent access to specialised skills and a highly capable commercial judiciary.

The risks associated with the potential reach of the prohibitions — prohibitions that, poorly interpreted, have great scope to harm efficiency — are compounded by the nature of the legal system in most ASEAN countries, and indeed in most developing countries. By and large (and again with the clear exception of Singapore, which has inherited the British common law tradition), developing countries rely on systems of civil law, in which courts neither have, nor are used to exercising, broadly defined discretions to 'fill in' gaps in statute law. Yet few areas of law are as dependent on the exercise of that discretion than the competition laws. As the late Professor William F. Baxter, eminent anti-trust scholar and Assistant Attorney General for Anti-trust in the US Department of Justice in the Reagan years, explained, anti-trust law, properly applied, is common law par excellence, for:

An adaptive approach to anti-trust law is necessary both because of the diversity and rapidly changing nature of the business conduct to be scrutinised, and because of the continuing progress of economic theory in explaining why firms pursue certain strategies and the competitive consequences of their behaviour. ⁹⁰

Yet very few countries have judiciaries that have the training, or even the scope under their judicial system, for this kind of ongoing reinterpretation of statutes. Especially in developing economies, where the proper interpretation and implementation of the competition laws encounters all of the problems discussed above, the danger of this resulting in inefficiencies must be great.

Conclusions

Competition policy has, to use the colloquial expression, 'spread like a rash' in recent years, and the ASEAN economies are no exception. A requirement to implement such a policy has become a common element in bilateral Free Trade Agreements with developed countries, as well as being part of the 'tick the box' list of institutional reforms imposed by the major aid donors. However, the intellectual basis upon which competition law and policy rest is far from robust.

Thus, even at the analytical level, the foundations of competition policy are uncertain and contested. As for its implementation, it encounters potentially serious problems of administrative discretion, as well as a high risk of error. Economic assessments of its impacts, even in countries with excellent governance, strong institutions and abundant expertise, are mixed. All of this seems to make it poorly suited to environments where those resources of governance, institutions and expertise are lacking. The vulnerability of competition policy to corruption or influence-peddling only makes these concerns

greater. So does the fact that economic development often requires mechanisms and arrangements that, viewed superficially, seem anti-competitive.

Seen in this light, the competition statutes recently implemented in a number of ASEAN economies seem overly broad in their reach and vest excessive powers in those responsible for their implementation. A substantial narrowing of the scope of the statutory powers and prohibitions would be desirable, as would a refocusing of the activities of the competition agencies towards a concentration on introducing competition into the public sector.

Specifically, with the exception of Singapore (which has broadly set and implemented higher thresholds for intervention, and additionally benefits from generally good governance arrangements, excellent access to specialised skills and a highly capable commercial judiciary), it would be sensible for them to prune back substantially the prohibitions they have in place or (in the case of Laos) are proposing to enact, by:

- restricting the *per se* provisions to price fixing in the supply of goods to public authorities;
- setting a high threshold for prohibitions on other forms of horizontal agreements;
- not imposing prohibitions on vertical agreements or on abuse of dominance, except where that abuse is undertaken by a statutory monopoly; and
- only prohibiting mergers leading to monopoly, or at least to market dominance.

Moreover, the functions of the competition authorities could usefully be reoriented to the competition advocacy role, especially with respect to public sector activity. Specifically, their priority should lie in ensuring that monopolies are not created or perpetuated by the state other than in those instances where the net benefits from statutory controls over entry and conduct exceed the costs. As Schumpeter (who viewed the American devotion to the anti-trust laws as a puzzle 'not without interest for the student of the psychology of political discussion') put it, 'under conditions of intact capitalism', monopoly power '[can] hardly persist for a period long enough to matter ... unless buttressed by public authority'. ⁹¹ While Schumpeter's statement might be too strong, it seems difficult to deny that it is eliminating that 'buttressing by public authority' that would likely bring the greatest gains to developing economies.

Table 2 Main Features of Competition Policy in ASEAN

Horizontal agreements		
Finding of causing 'monopolistic practices and/or unfair business competition', except for collusive output or price fixing agreements		
and price discrimination agreement where finding of the fact suffices. Inquisitorial		
Balance of probabilities		
No, except for collusive output and price fixing agreements and price discrimination agreements,		
Merits		
Finding of preventing, restricting or distorting competition, except for collusive agreements or agreements which impose supplementary obligations with no connection with the subject of agreement where finding of fact suffices. Exemption if finding that agreement contributes to improving production or distribution or promotes economic or technical progress.		
Adversarial		
Balance of probabilities		
No, except for collusive agreements or agreements which impose supplementary obligations with no connection with the subject of agreement.		
Merits		
Finding of fact that particular prohibited agreements have been entered into suffices. Exemption if finding that agreement is beneficial to business promotion and has no serious harm.		
Inquisitorial		
Balance of probabilities		
Per se for identified agreements Merits		
Finding of fact that particular agreements have been entered into Inquisitorial Balance of probabilities Per se for enumerated agreements		

	Vertical expression
Indonesia	Vertical agreements
Scope	Finding that conduct causes unfair business competition and/or damage to the public except for closed contracts for which finding of fact suffices.
Proof taking	Inquisitorial
Standard of proof	Balance of probabilities
Set of sufficient facts	No except for closed contracts
Standard of review	Merits
Singapore	
Scope	n.a.
Proof taking	n.a.
Standard of proof	n.a.
Set of sufficient facts Standard of review	n.a.
	n.a.
Thailand	
Scope	Finding of domination plus engaging in enumerated conduct or finding of conduct amounting to 'monopoly, reduction of competition or restriction of competition'. Particular exemptions specified.
Proof taking	Inquisitorial
Standard of proof	Balance of probabilities
Set of sufficient facts	No
Standard of review	Merits
Vietnam	
Scope	Finding of engaging in enumerated conduct
Proof taking	Inquisitorial
Standard of proof	Balance of probabilities
Set of sufficient facts	Finding of engaging in enumerated conduct
Standard of review	Merits
	Unilateral abuse
Indonesia	
Scope competitive outcomes.	Finding of taking advantage of dominant position to enumerated anti-
compeniese outcomes.	
	Inquisitorial
Proof taking	Inquisitorial Balance of probabilities
	Inquisitorial Balance of probabilities No

Singapore	
Scope Proof taking Standard of proof Set of sufficient facts Standard of review	Finding of abuse of dominant position Adversarial Balance of probabilities No Merits
Thailand	
Scope Proof taking Standard of proof Set of sufficient facts Standard of review	Finding that firm has more than 50 per cent market share and at least 1000 million baht turnover and engages in enumerated conduct Inquisitorial Balance of probabilities More than 50 per cent market share and at least 1000 million baht turnover and engages in enumerated conduct Merits
Vietnam	
Scope Proof taking Standard of proof Set of sufficient facts Standard of review	Finding that firm has 30 per cent or more market share and engages in enumerated conduct. Inquisitorial Balance of probabilities 30 per cent or more market share and enumerated conduct Merits
Indonesia	Mergers
Scope Proof taking Standard of proof Set of sufficient facts Standard of review	Finding that merger might cause 'monopolistic practices and/or unfair business competition' Inquisitorial Balance of probabilities No Merits
Singapore	
Scope Proof taking Standard of proof Set of sufficient facts Standard of review	Finding that merger results in SLC. Exemption if finding that SLC outweighed by economic efficiencies. Adversarial Balance of probabilities No Merits

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Thailand	
Scope	Finding that merger may result in monopoly or unfair competition.
Proof taking	Inquisitorial
Standard of proof	Balance of probabilities
Set of sufficient facts	No
Standard of review	Merits
Vietnam	
Scope	Finding that combined market share is above 50%. Exemption if finding that merger prevents bankruptcy or promotes exports or contributes to socioeconomic development and/or technical and technological progress
Proof taking	Inquisitorial
Standard of proof	Balance of probabilities
Set of sufficient facts	Combined market share above 50%
Standard of review	Merits

Source: Compiled by the author.

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Notes

- See, for example, Article 13.2 of the US–Colombia FTA at: http://www.ustr.gov/assets/Trade_Agreements/Bilateral/Colombia FTA/Final_Text/asset_upload_file552_10187.pdf (accessed 1 December 2008) and equally article 13.2 of the US-Peru FTA, at: http://www.ustr.gov/assets/Trade_Agreements/Bilateral/Peru_TPA/Final_Texts/asset_upload_file729_9536.pdf (accessed 1 December 2008); for Australia, see Section 12, Article 2 of the Australia–Singapore FTA, at http://www.austlii.edu.au/au/other/dfat/treaties/2003/16.html#art12 (accessed 1 December 2008), and Article 1202 of the Thailand–Australia FTA at http://www.dfat.gov.au/trade/negotiations/aust-thai/tafta_toc.html (accessed 1 December 2008). Adoption of a competition policy is a requirement in all FTAs entered into by the European Union. A survey can be found in United Nations Conference on Trade and Development (2005).
- E. Glaeser and A. Shleifer, 'The Rise of the Regulatory State', Journal of Economic Literature, 41(2):401 (2003).
- R. Hofstadter, 'What Happened to the Anti-trust Movement?', in R. Hofstadter, The Paranoid Style in American Politics and Other Essays, (Chicago: University of Chicago Press 1964):235.
- P. Aghion and R. Griffith, Competition and Growth: Reconciling Theory and Evidence (Cambridge, MA: MIT Press, 2005):2.
- 5 J.S. McGee, In Defense of Industrial Concentration (New York: Praeger 1971).
- This is the important point made by H. Demsetz, 'The Cost of Transacting', Quarterly Journal of Economics 82(1):33 (1968), when he writes that 'the existence of positive transacting costs has no direct relevance to economic efficiency', as those costs, like any other form of cost, will be subjected to economising by market forces. It is only when other forms of allocation involve lower costs in total that they will do better.
- 7 L.G. Telser, Competition, Collusion and Game Theory (Chicago: Aldine Atherton 1972).
- 8 N.G. Mankiw and M.D. Whinston, 'Free Entry and Social Inefficiency', RAND Journal of Economics 17:48 (1986).
- 9 M. Whinston, Lectures on Anti-trust Economics (Cambridge, MA: MIT Press 2006):26.
- 10 M.F., 'Anti-trust and Prices', Journal of Political Economy 101:741 (1993).
- G.J. Stigler and J.K. Kindah, The Behaviour of Industrial Prices (New York: Columbia University Press 1970); R.G.M. Sultan, Pricing in the Electrical Oligopoly, Vol. 1 Competition or Collusion? (Cambridge, MA: Harvard University Press 1974); and R.H. Porter and J.D. Zona, 'Ohio School Milk Markets: An Analysis of Bidding', RAND Journal of Economics 30:263 (1999).
- 12 J.M. Connor, "Our Customers are Our Enemies": The Lysine Cartel of 1992–1995', Review of Industrial Organization 18:5 (2001).
- 13 C. d'Aspremont, D. Encauoua and J.P. Ponssard, 'Competition Policy and Game Theory', in G. Norman, J.-F. Thisse and L. Philips (eds), Market Structure and Competition Policy: Game-Theoretic Approaches, (Cambridge, MA: Cambridge University Press 2000) 9–30.
- S.C. Pirrong, 'An Application of Core Theory to the Analysis of Ocean Shipping Markets', Journal of Law and Economics 35(4):89 (1992); and W. Sjostrom, 'Ocean Shipping Cartels: A Survey', Review of Network Economics 3(2):107 (2004).
- These were at the centre of the issues raised by the ACCC in the Loy Yang proceedings ([2003] FCA 1525), and have been given considerable prominence in the ACCC's recent Draft Merger Guidelines.
- 16 F. Lafontaine and M. Slade, 'Vertical Integration and Firm Boundaries: the Evidence', Journal of Economic Literature 54(3):629 (2007).
- 17 Lafontaine and Slade (2007):680.
- J.A. Ordover, G. Saloner and S.C. Salop, 'Equilibrium Vertical Foreclosure', American Economic Review 80:127 (1990).
- 19 D.M. Kreps, Game Theory and Economic Modelling (Oxford: Clarendon Press 1990) Ch. V.

- 20 P. Ghemawat, Games Businesses Play: Cases and Models (Cambridge, MA: MIT Press 1997).
- Frank M. Fisher, 'Games Economists Play: A Noncooperative View', RAND Journal of Economics 20(1):113 (1989).
- See also H. Ergas, 'Reflections on Expert Economic Evidence', Law Society Journal 45(1):2 (2007) for a discussion of the use of these models as evidence.
- 23 C. Peters, 'Evaluating the Performance of Merger Simulation: Evidence from the U.S. Airline Industry', The Journal of Law and Economics 49(2):627 (2006).
- 24 M.D. Whinston, Lectures on Anti-trust Economics (Cambridge, MA: MIT Press 2006) 74.
- 25 M.L. Katz and H.A. Shelanski, 'Mergers and Innovation', Anti-trust Law Journal, 74(1):1 (2007).
- For example, for market power, see the substantially differing approaches of W.M. Landes and R.A. Posner, 'Market Power in Anti-trust Cases', Harvard Law Review 94(5):937 (1981); B. Klein, 'Market Power in Anti-trust: Economic Analysis after Kodak', Supreme Court Economic Review 3:43 (1993); and George A. Hay, 'Market Power in Anti-trust', Anti-trust Law Journal 60:807 (1992). Differences of interpretation are even greater with respect to the concept of 'competition on the merits', and they become further polarised when a particular instance of that concept (say, predatory innovation) is considered.
- Gallie defined the class of concepts that are 'essentially contested' as those that meet seven characteristics: they are appraisive; internally complex; capable of rival possible descriptions, including because of possible differing emphases on the parts; 'of a kind that admits of considerable modification in the light of changing circumstances ... and such modification cannot be prescribed or predicted in advance'; capable of both offensive and defensive use; derive their acceptance from 'an original exemplar whose authority is acknowledged by all the contestant users'; and their plausibility of continued use 'enables the original exemplar's achievement to be sustained': W.B. Gallie, 'Essentially Contested Concepts', in Proceedings of the Aristotelian Society 56:167 (1956) 172–80.
- 28 Ibid, at 188–89.
- 29 For a useful introduction to the theory of institutional design, see N.K. Komesar, Imperfect Alternatives: Choosing Institutions in Law, Economics and Public Policy (Chicago: University of Chicago Press 1997).
- 30 By 'kadi' justice, Weber meant a form of justice which relies on charismatic (rather than legal-bureaucratic) legitimacy and seeks to find the 'justice' in a particular case, rather than relying on the application of general rules that are capable of replication. This he viewed as inconsistent with the need for predictability and calculability essential for the efficient formation of contracts. See R. Swedberg and O. Agevall, The Max Weber Dictionary: Key Words and Central Concepts (Stanford, CA: Stanford University Press 2005) pp. 136ff.
- 31 See F.K. Ringer, Max Weber: An Intellectual Biography (Chicago: University of Chicago Press 2004):199.
- 32 L. Fuller 'The Forms and Limits of Adjudication' in Harvard Law Review 92:353 (1978).
- 33 Ibid, at p. 406.
- 34 E. Dal Bó, 'Regulatory Capture: A Review', Oxford Review of Economic Policy 22(2):203 (2006).
- E. Schaumburg and A. Tambalotti, 'An Investigation of the Gains from Commitment in Monetary Policy', Journal of Monetary Economics 54(2):302 (2007).
- A sane person would desist from destroying the entire planet, since that would clearly be worse than not doing so. However, it is the threat of destroying the planet that deters surprise attack. As a result, for the deterrence to work, the attacker must believe in the credibility of the threat. By delegating implementation of that threat to the machine, whose conduct cannot be altered, the threat is made credible. The underlying principle of seeking to achieve deterrence through credible commitments (for example, to mutual assured destruction) is classically set out in T.C. Schelling, The Strategy of Conflict (Cambridge, MA: Harvard University Press 1980).
- 37 After K. Rogoff, 'The Optimal Degree of Commitment to an Intermediate Monetary Target', The Quarterly Journal of Economics 100(4):1169 (1985).

- Note, however, that this approach does not really justify independence it merely justifies appointing central bank governors with strong anti-inflation preferences. It may be that independence is required for them to be able to act on those preferences, but that would need to be established.
- 39 The same outcome can be achieved by other means for instance, by assuming the central bank owns a 'reputational capital stock' that would be devalued in the event of time inconsistency, making deviation from an anti-inflation stance costlier for the central bank than for other decision-makers.
- ee notably B.T. McCallum, 'Two Fallacies Concerning Central-Bank Independence', American Economic Review, Papers and Proceedings 85(2):207 (1995); and B.T. McCallum, 'Crucial Issues Concerning Central Bank Independence', Journal of Monetary Economics 39(1):99 (1997). More generally, any credible account of central bank independence that justifies independence on the basis of time consistency must explain why the arrangement is not vulnerable to renegotiation, especially if politicians would, in fact, derive significant benefit (even if only short term) from acting in a time-inconsistent manner. This inevitably goes to issues of political structure, which are discussed in P. Keefer and D. Stasavage, 'The Limits to Delegation: Veto Players, Central Bank Independence, and the Credibility of Monetary Policy', American Political Science Review 97(3):407 (2003); S. Lohmann, 'Why Do Institutions Matter? An Audience-Cost Theory of Institutional Commitment', Governance 16(1):95 (2003); and P. Moser, 'Checks and Balances, and the Supply of Central Bank Independence', European Economic Review 43(8):1569 (1999).
- See, for example, H. Berger, J. de Haan and S.C.W. Eijffinger, 'Central Bank Independence: An Update of Theory and Evidence', Journal of Economic Surveys 15(1):3 (2001), who conclude that independence does not reduce, and may in some conditions actually increase, the sacrifice ratio, and more recently, C. Crowe and E.E. Meade, 'The Evolution of Central Bank Governance Around the World', Journal of Economic Perspectives 21(4):69 (2007), who find that any significant relation between central bank independence and inflation that may have been found in earlier data sets no longer persists.
- The European Central Bank does have independence with respect to its target, as it sets the inflation target for the Euro-zone.
- Indeed, in the United States, important competition policy powers are vested in the Department of Justice, which is an integral part of executive government. Equally, in the EU, the inquisitorial powers reside in the Commission, which is an entity not substantively different from a ministerial department.
- In a different context, but again in a principal–agent model with rent-seeking by the agent (in this case taking the form of corruption), T. Besley and J. McLaren, 'Taxes and Bribery: The Role of Wage Incentives', Economic Journal 103:119 (1993) show that it may be cheaper for the principal (the state) to tolerate the corruption rather than pay the efficiency wage. Additionally, note that the higher wage paid to the agent increases the opportunity cost of corruption, and hence may simply increase the bribes (or favours) extracted. This is especially likely to be the case when agents compete to supply favours to clients, so that they operate in the inelastic segment of the 'demand for favours' curve.
- In the United States, competition policy responsibilities are divided between the Federal Trade Commission and the US Department of Justice. There is further duplication in the United States at the state level, where the relevant powers are typically exercised by the state attorney-general.
- An economic comparison of adversarial and inquisitorial processes can be found in, M. Dewatripont and J. Tirole, 'Advocates', The Journal of Political Economy 107(1):1 (1999) and, with an application to competition policy, in D.J. Neven, 'Competition Economics and Anti-trust in Europe', Economic Policy 21(48):741 (2006). Inquisitorial processes are more likely to result in 'extremism', as the inquisitorial body can more readily suppress, ignore or give little weight to facts and arguments that are inconsistent with its preferred finding. Such a tendency to downplay the merits of facts and arguments that are contrary to the preferred outcome is evident in ACCC decisions, which often read as if all the merit was on the side of the outcome the ACCC had chosen.
- The under-provision problems associated with the public good aspect of litigation curbing rentseeking is to some degree offset by subsidies to the court system. However, in most jurisdictions, the costs borne by appellants are high in absolute terms, as are the risks, suggesting the under-provision problem will remain.
- 48 F.S. McChesney and W.F. Shughart II (eds), The Causes and Consequences of Anti-trust: The

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- The underlying mechanism is similar to an efficiency wage model. To enforce honesty, the party with the incentive to deviate must be made better off by not deviating; with asymmetric information, this requires the payment of an information rent. The higher the likelihood of cheating being detected, and the higher the cost of punishment to the cheater, the lower that rent must be. As a result, more mutually advantageous trades will fall in the range where honesty is self-enforcing (see Klein, Crawford and Alchian, 1978), increasing efficiency.
- Typically, the balance between fixed and marginal costs differs as between these mechanisms and more formal, legal-rational, structures of trust enforcement, with the pattern of costs then determining the pattern of use. For some purposes, group membership mechanisms may have lower

- fixed costs, for instance, when membership is associated with ethnic or religious affiliation and is readily verified; but then the marginal costs of behaviour monitoring and especially enforcement may be high. A useful discussion of the comparative advantage of alternative modes of enforcing trust when the market expands is in Barzel 2002:156 and follows.
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- A per se prohibition is one that prohibits conduct as such, regardless of its purpose, effect or likely effect. One way of giving legal form to such a prohibition is to deem certain conduct as having the proscribed purpose, effect or likely effect, thus avoiding the need for that purpose, effect or likely effect to be made out. In that sense, the standard of proof for a per se provision is reduced to that needed to make out the condition which triggers the provision; for instance, for a deemed prohibition on price fixing, all that needs to be made out is that price fixing has occurred. Of course, if there is dispute as to whether price fixing has occurred, then an evidentiary standard would need to be met before the provision was found to have been contravened.
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- 89 In Indonesia, the KPPU issued its first decision, No. 01/KPPU-L/2000 on tender casing and tubing of PT Caltex Pasific Indonesia. This was a case of unfair bidding where the bidding was nullified and a re-bidding was ordered. Following this, the KPPU recorded a significant increase of reports filed due to better public awareness. However, not all reports filed were violations of Law No. 5/1999 or under the purview of the KPPU. In the year 2007, 244 complaints were reported to the KPPU and of these reports, 75 per cent were allegations about bid rigging, 15 per cent about prohibited activities and 2 per cent about prohibited agreements and abuse of dominant position respectively. The rest of the reports were dismissed either due to the lack of a proper basis for complaint or because the issues raised were not under the jurisdiction of the KPP. In Thailand, from 1999 to December 2007, the Trade Competition Commission dealt with approximately 70 complaints, of which one case went to the public prosecution for determination. Some of the complaints are still undergoing investigation, and the rest have been closed, presumably due to the lack of legitimate grounds. The Department of Industry and Trade informed me that of the majority of complaints, 38 to date involved unfair business practices and there were at least fifteen complaints involving restrictive agreements
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