

THE PROPRIETARY FOUNDATIONS OF CORPORATE LAW

ESRC Centre for Business Research, University of Cambridge
Working Paper No. 299

by

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March 2005

This Working Paper forms part of the CBR Research Programme on Corporate Governance.

Abstract

Recent work in both the theory of the firm and of corporate law has called into question the appropriateness of analysing corporate law as ‘merely’ a set of standard form contracts. This article develops these ideas by focusing on *property law*’s role in underpinning corporate enterprise. Rights to control assets are a significant mechanism of governance in the firm. Practical circumstances dictate that such rights must be shared. Property law protects the rights of *co-owners* against each other’s opportunistic attempts to grant entitlements to third parties. At the same time, it uses a range of strategies to minimise the costs such protection imposes on third parties. The choice of strategy significantly affects co-owners’ freedom to customise their control-sharing arrangements. This theory is applied to give an account of the ‘proprietary foundations’ of corporate law, which has significant implications for the way in which the subject’s functions are understood and evaluated.

Keywords: theory of corporate law, shared ownership, property rights

JEL codes: D23, G34, K11, K22

Acknowledgements

This paper is dedicated to the memory of Michael Whincop. Earlier drafts were circulated under the title ‘The Proprietary Structure of Corporate Law’. On behalf of Michael and myself, I thank Neil Campbell, Bruce Chapman, Brian Cheffins, Dan Cole, Matthew Conaglen, Simon Deakin, Alan Dignam, Luca Enriques, Nick Georgakopolous, Henry Hansmann, Henrik Lando, Amir Licht, Joe McCahery, Riz Mokal, Richard Nolan, James Penner, Larry Ribstein, Chris Riley, Erik Vermeulen and Adrian Walters for helpful comments and discussions on earlier drafts. I similarly thank participants at staff seminars at Griffith and Nottingham Universities, the 18th EALE Conference at Vienna University and the W.G. Hart Workshop on Property and Corporate Law. The usual disclaimers apply.

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1 Introduction

For more than twenty years, corporate law scholarship has been dominated—whether as first step or point of departure—by an economic model that views firms as complex sets of contracts.¹ For those who subscribe to it, a widely perceived implication is that corporate law, being the body of rules which governs these complex contracts, is essentially a specialist branch of contract law. Consequently, the ‘contractarian’ theory of corporate law adopted key ideas from the law and economics of contracts.²

This contractarian view of corporate law has had many critics.³ A large number have been from perspectives external to the economic analysis of law. Some found the theory’s dismissal of the significance of corporate personality to be unconvincing.⁴ Others objected to the normative emphasis given to economic efficiency by those deploying the theory,⁵ and arguments based upon it for the significance of ‘shareholder value’.⁶

Clearly, the economic theory of the firm does not provide a complete ontology of the corporation, whether the inquiry limits itself to legal discourse or is posed at a more general social level. Yet the economic theory of the firm has never sought to be anything other than instrumental. It attempts only to predict patterns of organisation and finance as responses to particular states of the world, and if successful, offers a way of understanding *when* and *why* firms come into existence. For corporate lawyers applying this theory, the goal is to understand how particular patterns of corporate law may affect these processes, so as to inform debate about how best it might achieve regulatory or facilitative goals.

For scholars seeking to understand the *functions* performed by corporate law, the contractarian theory has proved a useful workhorse.⁷ However, even within this tradition, the limits of the ‘contractarian’ approach are now coming to be realised. Viewing corporate law merely as a set of ‘standard forms’ for business organisation yields the counter-intuitive implication that its significance for business may be trivial.⁸ Commercial actors are perfectly capable of producing standard forms themselves and there seems no clear reason for thinking that, apart from in relation to the smallest firms, the state has a clear comparative advantage in supplying such terms. Yet comparative studies appear to demonstrate empirically the significance of corporate law for the functioning of capital markets.⁹ Something appears to be missing.

Moreover, economic theory has moved on from viewing firms simply as contracts to understanding them as combinations of contracts and productive assets, emphasising the significance of the allocation of property rights to those assets for the governance of the enterprise.¹⁰ More recently, a few scholars—most notably Hansmann and Kraakmann—have claimed that corporate law performs functions that go beyond simply supplying standard terms, suggesting that its more significant role is to partition property rights to assets used in productive enterprise.¹¹ However, to date there has been no attempt to link the new economic theory of the firm to the theory of corporate law. This article is a first step towards filling that gap.

We demonstrate the significance of property law's role in structuring arrangements whereby parties *share* ownership of productive assets. Property law protects the entitlements of co-owners against opportunistic attempts by one of them to grant entitlements to third parties that undermine the other co-owners' claims. It does so by making their entitlements to the assets generally enforceable. Hence it affects an open-ended set of potential third parties who might deal with the firm. Hansmann and Kraakman's insight, with which we concur, is that this role could not be replicated by private contract.¹² However, their account of the ways in which property law assists corporate law is limited solely to what they term 'affirmative asset partitioning'.¹³ We contend that the scope of property law's contribution to corporate law is more general, involving aspects of agency, trusts, secured credit, fraudulent conveyance and corporate insolvency law. We also show that property law must necessarily perform two functions—not simply protecting the entitlements of co-owners, but also minimising the costs imposed on third parties by this protection. In so doing, it employs three basic strategies, the mixture of which we describe and evaluate in relation to corporate law. The analysis yields important implications both for our understanding of what corporate law does, and for our thinking about how it should be structured.

The rest of the paper is structured as follows. We begin with an overview of the contractarian view of corporate law scholarship and its limitations. Next, we explain how the theory of the firm has moved beyond this to emphasise the importance of property rights. This in turn leads to a general discussion of the way in which property law facilitates the *sharing* of ownership, and the strategies it employs to minimise the total costs involved. To make the analysis more concrete, we apply it to the corpus of corporate law. The final section concludes by explaining the implications of the analysis.

2 The Contractarian Theory of Corporate Law and its Limitations

As corporate law facilitates and regulates business firms, an account of its *functions* must be premised upon a theory that explains *what* a firm is and *why* it exists. These questions, first posed by Ronald Coase in 1937,¹⁴ form the research agenda of the economic theory of the firm. Thus the theory of the firm is the starting point for functional accounts of corporate law.

Coase's answers focused on the costs of contracting. Parties involved in a firm interact with one another over long periods of time. The costs of producing many iterated spot contracts, or of one long-term contract covering all relevant contingencies, would be very high. Instead, it might be cheaper to grant authority to one party to make decisions about what should be done. For Coase, then, a 'firm' was characterised by an *authority* relation.

The Contractarian Theory of the Firm

In 1972, Alchian and Demsetz argued that Coase's notion of authority was misplaced.¹⁵ In their view, firms were no more than contracts.¹⁶ Whilst there were costs to writing the contracts which constituted the firm, these were only quantitatively, rather than qualitatively, different from those involved in writing long-term contracts between firms. The firm, then, was a special case of long-term contract. The second question shifted from 'why firms?' to 'why this *type* of contract?'

This shift in emphasis had been accompanied by developments in the economic theory of 'contracts' (intertemporal exchange). The new theory focused on the effects of 'asymmetric information' between contracting parties: both about their respective attributes before they entered into the relation, and about the quality of their performance (or the reasons for their non-performance) once the relation had been established. Under these circumstances, it would of course be very costly to 'police' performance, and hence parties would have an incentive to appropriate to themselves some of the gains from trade or to underinvest effort. Thus the theory of 'agency' contracts investigated how payments based on observable variables could be structured so as to give the party with the superior information an incentive not to shirk. Alchian and Demsetz put these problems at the core of their analysis of the firm.¹⁷ Shortly afterwards, Jensen and Meckling offered a positive theory of corporate finance based on the same premises.¹⁸ Together, these accounts offered a plausible answer to the question, 'why this *type* of contract?'

Contractarian Corporate law

In what must have seemed a natural step, a generation of legal scholars applied this *contractarian* theory of the firm to corporate law: if firms were (complex) contracts, then corporate law was a (complex) branch of contract law.

In the late 1970s and early 1980s, law and economics scholars understood the role of contract law as filling ‘gaps’, which parties left in contracts because of the costs of negotiation and drafting, by supplying ‘default’ or ‘boilerplate’ terms. Drawing an analogy with standard form contracts, it was argued that such ‘default rules’ should be chosen according to what a majority of contracting parties ‘would have wanted’—had they been able to specify their terms at zero cost.¹⁹ In effect, this viewed the default rules set out by the law as a form of public good.²⁰ A related claim was that ‘mandatory rules’—those which parties were unable to disapply by contract—were justifiable only by the presence of market failures.²¹ Easterbrook and Fischel’s famous series of articles on corporate law coupled these ideas drawn from the early law and economics analysis of contract law with the insights of the agency costs theory of the firm, arguing that the principal function of corporate law was to supply default rules into the ‘corporate contract’.²²

The Limitations of Contractarian Corporate law

In recent years, a number of internal weaknesses have become apparent in the ‘contractarian’ theory of corporate law.²³ Subsequent developments in contract economics suggest that the function of legal ‘default rules’ may be much more limited than the contractarians imagined.²⁴

First, it is now understood that the costs of drafting are not the only reason why parties might leave ‘gaps’ in their contracts.²⁵ Another is the cost of enforcement.²⁶ Where relevant information about performance is costly to ‘verify’ to a court, parties may prefer to rely on non-legal governance mechanisms to resolve the problem.²⁷ For a court to ‘fill gaps’ in such circumstances would be counter-productive.

Secondly, even if it is possible to identify ‘gaps’ generated solely by *drafting* costs, there is pessimism about whether legal ‘default rules’ really offer significant savings, save for the smallest enterprises. The potential economies of scale seem limited, given the wide variation in users’ requirements,²⁸ and even where they exist, it is plausible that they could equally be captured by ‘standard forms’ developed by professionals working in a particular field.²⁹ There is no reason to think that almost all corporate terms could not be supplied in this fashion. The history of the development of the joint stock partnership in England prior to the Joint Stock Companies Act of 1844 is a case in point,³⁰ another

being the standard documentation used in modern bond issues.³¹ These weaknesses leave the contractarian theory offering at best a limited explanation of corporate law's function.

3 Property and the Firm

The Property Rights Theory of the Firm

It is ironic that while corporate lawyers were applying the contractarian theory, economists were already moving on. Williamson and others influenced by organisational theory developed a more 'Coasean' account of the firm, emphasising *qualitative* differences from market exchange.³² They saw firms as a response to the 'hold-up' costs arising from squabbles over the distribution of productive surplus,³³ giving rise to transaction costs of productive activity over and above the ubiquitous costs of asymmetric information.³⁴

Of course, such hold-up problems may be ameliorated by contracts. However, a contractual solution will be 'incomplete' in the presence of uncertainty and asymmetric information. A promise to pay a fixed amount will mean the promisor must bear the risk that the production process fails, for whatever reason, to produce the expected surplus. A contingent promise will mean the promisee must be able to observe and verify to a court that failure to make the promised payments does not fall within the contractual exclusions.

Williamson argued that where the amounts at stake were large, it would be cheaper for one party simply to buy both assets and organise production itself, thereby avoiding the hold-up problem.³⁵ These insights were formalised by Oliver Hart and his co-authors, giving rise to what has become known as the 'property rights' theory of the firm.³⁶ A key result is the ability to explain the boundaries of the firm: that is, when an asset will be owned as part of a co-specialised collection (within the firm), and when held separately with the governance of the relation between the two parties determined by contract (outside the firm).

The theory also seeks to explain various patterns of corporate finance, most notably the use of debt.³⁷ The intuition here is that an entrepreneur seeking debt finance enters into a deal with the financing creditor that gives the creditor the power to take over the ownership of the assets should the entrepreneur default on the repayments. Thus, provided that the assets are worth more to the entrepreneur than the value of the outstanding repayments, this allocation of property rights elicits repayment without a court needing to determine anything other than whether or not default occurred. As such, it is an 'end-game' mechanism: a step that is only taken if the relationship between creditor and

debtor is on the verge of breaking down. Its existence in the background, however, makes the debtor want to continue to keep the relationship on foot.³⁸

In the ‘property rights’ framework, the firm is therefore characterised as a collection of people and assets, with ownership of the latter carefully allocated amongst the former. The implications of this account for the theory of corporate law have not yet been fully developed.³⁹ At first blush, it seems to imply a simple recharacterisation of the contractarian theory: instead of being a simply nexus of contracts, the firm is now a nexus of contracts *about assets*.⁴⁰ Whilst it can be argued that the terms of such contracts might differ from the ‘pure’ contractarian account,⁴¹ this does not escape from the objections to the contractarian account. However, such a recharacterisation entirely overlooks an important function of *property law* where ownership is shared. To see this, it is necessary to examine more closely what is understood by ‘property’.

Undivided Ownership

The account of ‘property rights’ employed in the theory of the firm is reductionist, in keeping with economists’ quest for analytic parsimony.⁴² ‘Ownership’ is defined as the entitlement to exercise ‘residual rights of control’. ‘Control’ is significant because where contracts are incomplete, the power to direct how an asset is used *ex post* will make a difference to outcomes.⁴³ ‘Residual’ implies that the rights to control cover all states of the world which are *not* specified by law or contract *ex ante*.⁴⁴ Residuary matters because it is still possible to allocate *residual* rights even if specific directions about what should (not) be done in particular circumstances cannot be written or enforced.

The *residuary* essence of property rights is a point well understood by analytic lawyers. The classic explication is that of Honoré, describing the *content* of the package of legal entitlements known as ‘ownership’:

Ownership comprises the right to possess, the right to use, the right to manage, the right to the income of the thing, the right to the capital, the right to security, the rights or incidents of transmissibility and absence of them, the prohibition of harmful use, liability to execution, and the incident of residuary.⁴⁵

Honoré emphasises that subject to restrictions imposed by law or contract, the ‘owner’ is the party who holds all the other rights which a person may enjoy as regards an asset. Thus the owner is at liberty to dictate the use, management, and alienation of the asset, and to use it to bond the performance of his contracts (what Honoré terms the ‘incident of liability to execution’). Where undivided

ownership is enjoyed by one person, the economists' accounts therefore have much in common with lawyers' understandings.

The Demand for Shared Ownership

However, in all but the simplest business firm, it is necessary to *share* the rights of residual control, because of constraints of time, wealth, and administrative costs.

Where the firm's physical assets consist of more than a relatively small portfolio, an entrepreneur will lack the time to make all the control decisions herself.⁴⁶ Hence she will need to *delegate* responsibility for certain 'use decisions' about the assets to an agent. This might involve simply giving the agent power to enter into contracts on behalf of the firm. In this case, she delegates the power to make the firm's assets liable to execution by counterparties to relevant contracts entered into by the agent. A more comprehensive delegation might give the agent power to use, buy and sell assets on the firm's behalf. In each case, the aspects of ownership rights which were not delegated to the agent would remain with the entrepreneur, and she alone would retain the right to make these types of control decisions in respect of the assets. This will require a 'second-order' arrangement *about* the allocation of ownership entitlements, specifying *which* is exercisable by *whom*. Furthermore, the entrepreneur will wish to retain an option to terminate the delegation and retake entire control of the asset should the agent underperform, and may wish to include restrictions on the *manner* in which the agent may exercise the delegated entitlements—namely, for her benefit rather than the agent's own benefit.

Where it is otherwise efficient for an entrepreneur to own an asset, she may be unable to do so because she is wealth-constrained. The obvious answer is to obtain outside finance.⁴⁷ Where contracts are incomplete, financiers will wish to make use of property rights as a mechanism of governance. Hence the parties will again wish to *share* ownership. This could be done in a variety of ways. If the financier is himself an entrepreneur with appropriate expertise, the assets could be owned *jointly*. This too will require a 'second-order' arrangement about the circumstances in which the ownership entitlements may be exercised. A simple mechanism would be to require the unanimous consent of each proprietor to exercise ownership rights. However, as the number of participants increases, the costs of information-gathering, communication and negotiation about what to do (collectively, 'the costs of decision-making') rise exponentially. In many cases, a unanimity rule would be replaced by other decisional rules, such as majority or qualified majority voting.⁴⁸ These too have costs, and it is not difficult to see that beyond a few co-owners, it may make sense to *delegate* the

day-to-day management of the asset to an agent, or one of the co-owners, and to reserve for the co-owners collectively the right to remove (by unanimity, majority vote, or whatever rule is chosen) the agent for unsatisfactory performance.⁴⁹

Alternatively, ownership rights might be shared *sequentially*. In this case, the entrepreneur retains control unless some verifiable contingency occurs — such as failure to repay an instalment — whereupon the financiers take control. This, again, will require a ‘second-order’ arrangement detailing circumstances under which control will change, and any restrictions on the *manner* in which the entrepreneur may exercise her entitlements in states of the world in which she has control.

To summarise, practical constraints dictate that the entitlements of undivided ownership in relation to productive assets must be *shared* between several co-owners. This necessitates some variety of ‘second-order’ arrangement describing the way in which the entitlements are shared, the content of which will respond to the nature of the economic determinants of sharing.

The Costs of Shared Ownership

Sharing the entitlements of ownership, however, gives rise to a particular type of agency cost: namely that one co-owner may exercise control in a manner inconsistent with the ‘second-order’ arrangement, which benefits herself at her colleagues’ expense. This might be termed a joint-owner agency (‘JOA’) problem.⁵⁰ Regarding many of the entitlements of ownership, this is simply a standard agency problem, a solution to which can be incorporated in the ‘second-order’ arrangement. The most effective solution will often rely on the property rights themselves: that is, punishing such opportunism by terminating the opportunist’s shared ownership.⁵¹

However, the JOA problem becomes more acute in relation to those parts of the entitlements of ownership which give the owner power to *transfer* entitlements to third parties. For example, a co-owner may alienate an asset for a consideration that maximises his private utility, but not the utility of the co-owners as a whole. Or he may render the assets liable to execution for the non-performance of a contract that does not benefit the co-owners as a whole, simply to secure some personal benefit.

What is especially pernicious about JOA problems involving alienation and contracting (as opposed simply to ‘use-decisions’) is that they systematically undermine the other co-owner’s ultimate ‘threat’ of terminating the opportunist’s co-ownership. An opportunistic grant of entitlements to a third

party can simultaneously reduce the other co-owners' ability to exercise control rights whilst netting the opportunist a private benefit of greater value than the share he might stand to lose.

The Property Law Solution

Where one co-owner alienates a shared asset to himself in a manner inconsistent with the 'second-order' arrangement about the sharing of ownership entitlements, then enforcement is a straightforward matter. The rights of the other 'owners' can be asserted against the agent simply because he has promised not to do this. However, if the co-owner has general personal creditors, then a contractual remedy solely against him would offer only limited protection. The agent's general personal creditors might become entitled to execute against the asset once the agent had transacted with the firm. If the other owners did not act quickly, they might find that it was too late.

This conflict between claims of the other owners and those of third parties is even starker in situations where the agent has purported to alienate the asset, or to enter into a contract with a third party on the non-performance of which the asset is to be rendered liable to execution. In each case, if the entitlement of the other 'owners' may be displaced by those of third parties, then the JOA problems discussed above make the sharing of ownership—and thereby the organisation of firms—considerably more costly.

However, there is a *legal* route by which this aspect of the JOA problem can be ameliorated. As the rules by which property is transferred are themselves aspects of the legal system, it is open to lawmakers to provide that the terms of co-owners' second-order arrangements about the division of control will be privileged over the putative entitlements granted to third parties. Or, in other words, to extend the enforcement of the second-order arrangement about shared control to third parties.

Shared Ownership

Functionally, therefore, we are comparing 'enforcement against X' and 'enforcement against a general set of third parties'. This invokes a second dimension of the analytic lawyer's conception of 'property rights', that of *scope*. Traditional accounts of this categorisation employ the Roman distinction between rights *in rem* and rights *in personam*: proprietary and personal rights. The former are (depending on the particular conception) said to inhere in an asset, or to be 'good against the world'. The latter, on the other hand, inhere in or are good against only particular persons. Thus, simply to say that the *content* of A's entitlement in relation to an asset is entirely residual does not make A the 'owner' if the entitlement is only valid against B. For A's entitlements to be

capable of being classed as ‘proprietary’, they must be capable of being asserted against an open-ended set of persons.

The distinction between the *content* of legal relations and their *scope* comes out most clearly in the analysis of Wesley Hohfeld. Hohfeld’s account of the legal ‘elements’ — the fundamental building-blocks from which all legal relations may be created — gives a familiar set of analytical tools for examining the *content* of legal relations.⁵² In his terminology, ownership contains a package of *privileges* (liberties), coupled with *rights* to prevent others from interfering with the exercise of these privileges. Correlatively, non-owners have *no-rights* to the particular varieties of enjoyment to which the owner is entitled, and *duties* not to interfere with the owner’s exercise thereof. Honoré’s description of the content of ‘ownership’ can be understood in Hohfeldian terms as the largest ‘bundle of entitlements’ that it is legally possible for one person to enjoy in relation to a particular asset.⁵³

Hohfeld’s commitment to a dyadic conception of legal relations meant that he rejected the idea that rights *in rem* ‘inhere in’ an asset, or even that they comprise a single relation between the right-holder and an indefinite number of persons. Rather, he conceived of them as being multiple bilateral relations running in parallel between one owner and many non-owners. He termed such relations *multital*, and contrasted them with relations existing only between two persons, which he termed *paucital*.⁵⁴ Hohfeld’s analytic technology is superior to the Roman dualism, because it allows for the uncoupling of the *contents* of the packages of entitlements referred to as ‘property rights’ from their *scope*. Many lawyers tend to think of the contents of these packages as fixed by the law—the so-called ‘*numerus clausus*’ of permissible interests.

Hohfeld’s approach allows us to see that there is no *necessary* analytic link between the fact that entitlements are multital—that is, have the general *scope* that is characteristic of property rights—and the particular *content* of those entitlements. As such, it describes more readily the flexibility of Equity’s recognition of proprietary rights, for which the contents of the entitlements may be customised by private agreement between co-owners.⁵⁵ This is a point to which we shall have cause to return in due course. Hohfeld’s terminology has not passed into the general consciousness of lawyers. In the discussion that follows, we therefore for familiarity refer simply to ‘personal’ and ‘proprietary’ rights, drawing upon Hohfeld’s analysis only where it is necessary to do so.⁵⁶

Economic theorists do not explicitly discuss the scope of proprietary entitlements, or how these are to be distinguished from personal entitlements. Instead, they appear simply to assume that the enjoyment of ‘owners’ is protected from interference by non-owners.⁵⁷ This would not matter if there

were only one person who could be classed as ‘owner’ of the firm’s assets: their residuary entitlement-set (as described by Honoré) could be asserted against all non-owners. However, where ownership is shared, property law also has a role to play in protecting owners against *each other*.

Understanding the scope of property rights allows a meaningful distinction to be drawn between *contracts about ownership* and genuinely *shared* ownership. The effect of granting ‘proprietary’ status to a ‘second-order’ arrangement sharing entitlements of ownership between A and P is that P’s monitoring costs are greatly reduced. If P’s entitlements have full proprietary status, then A simply cannot alienate the asset to a third party without P’s consent. The only other way to make the arrangements enforceable against third parties would be for the co-owners to make all potential third parties promise that they would not enter into transactions with any of the co-owners in respect of the co-owned assets that would be injurious to the other co-owners’ entitlements. This would be prohibitively costly. Thus property law rules perform a function in relation to the organisation of business enterprise that is far more significant in practice than that of the ‘default rules’ supplied by law into agreements between participants in these enterprises. Although this function of property law has been overlooked in the economic theory of the firm, it is clearly complementary to the account given by that theory. Indeed, it provides a missing link between that theory’s insights and the theory of corporate law.

Minimising the Total Costs of Shared Ownership: Three Strategies of Property Law

Reducing the monitoring costs of other shared owners does, however, come at the price of imposing costs on third parties. For every ‘unauthorised’ transaction where co-owners succeed in asserting their entitlements to an asset against a third party, that party may suffer a reliance loss of an equivalent or greater amount. If the entitlements of co-owners are completely enforced in every case, then the sum of the costs imposed on third parties may exceed the savings in co-owners’ monitoring costs.

The legal system must therefore make a fundamental trade-off between reducing co-owners’ JOA costs and imposing externalities on third parties. There are also the procedural costs of administering the system.⁵⁸ All other things being equal, it would be desirable for the legal system to seek to minimise the *total* costs of shared ownership—that is, the sum of JOA costs, externalities and the costs of administering the system. Property and organisational law employ a mix of strategies, which are not mutually exclusive, to effect this fundamental trade-off. Each has comparative (dis)advantages in relation to some elements of the total cost function, and therefore the selection of the optimal mix of strategies will depend upon the context.

One basic strategy is simply to restrict the types of entitlement-sharing arrangement that may be agreed amongst co-owners to a closed list. This is the so-called ‘*numerus clausus*’ rule of Civilian legal systems.⁵⁹ In its simplest form, the criterion for enforcement of co-owners’ entitlements is whether they fall within the list: provided that they do, they always trump third parties, and *vice versa*. Such a rule seems cheap to administer. However, its effectiveness at reducing JOA costs and externalities depends crucially on the length of the list and the way in which the chosen arrangements are selected. As we have seen, shared ownership is used as a mechanism of governance by participants in firms,⁶⁰ and so co-owners will want as much flexibility as possible in designing structures appropriate for their needs. Third parties will on the other hand prefer a shorter list, so as to minimise their search costs. Commercial actors will rely on a set of customary indicators to help them identify the type of shared ownership (if any) in place.⁶¹ As the list gets longer, the costs of such identification will probably grow exponentially. Thus the system will work best with a small list that is chosen carefully, so as to be of maximum utility to those seeking to share ownership.⁶² Of course, to do this requires effectively, lawmakers designing the list must have access to an enormous amount of information—sufficient to be able to identify the relevant constituents and their cost functions.

Another basic strategy may be termed *selective enforcement*. Simple law-and-economics analysis suggests that the sum of JOA costs and the externalities created by property law would be minimised by a rule which allocated the risk of loss to the party who is able to avoid it most cheaply—namely P or the third party (TP).⁶³ Of course, it is unlikely to be possible to say *a priori* which of these parties is likely to be the ‘least-cost avoider.’ Whilst the costs to P of monitoring A’s actions are likely to depend on the nature and structure of the *business*, the costs to TP of discovering whether or not the transaction is permitted under A’s bargain with P are likely to vary according to the circumstances of the particular *transaction*.⁶⁴ However, if at the time a claim for enforcement is brought (that is, *ex post*), a court can compare co-owners’ monitoring costs with the third parties’ search costs, then the ‘least-cost avoider’ principle can be directly applied by giving effect to co-owners’ entitlements only if they have the higher costs.

The classic examples of legal rules that can be understood as performing a function of this type are the common law doctrine of apparent authority and the *bona fide* purchaser rule in equity.⁶⁵ The former holds a principal liable on an unauthorised contract where it reasonably appeared to the third party that the agent in fact had authority to enter into the transaction on the principal’s behalf.⁶⁶ The latter allows a party with an equitable interest in an asset to have

their claim defeated by a third party who purchases the asset for value from a fiduciary in circumstances under which the third party reasonably believed that the fiduciary was entitled to sell. The rules are functionally equivalent: for the application of either it is necessary to consider the context of the transaction in question, and whether it was of such a nature as to make it unreasonable for the third party so to rely.⁶⁷

A selective enforcement strategy means that there is no need for the attributes of shared ownership arrangements to be fixed by law. Thus co-owners are free to structure the terms on which they will share entitlements as best suits their needs—witness the flexibility, for example, of trusts.⁶⁸ However, this flexibility for co-owners may necessitate greater administration costs than the *numerus clausus* strategy, for courts must engage in fact-intensive enquiries as to parties' relative knowledge. Yet the back-and-forth interplay between commercial practice and legal standards engendered by tests couched in terms of 'reasonableness' means that the administration costs are probably much lower than they at first appear.

A third strategy is to institutionalise some sort of procedure for disseminating information about sharing arrangements used—for example a central register—thereby lowering search costs.⁶⁹ Many interests in property are registered, and registers often keep information not only about the existence of interests, but also about their contours.⁷⁰ This allows a registration system to maintain flexibility for co-owners. The costs of administration and costs for third parties will depend in part on the technology available for dissemination of registered information—the more costly it is to become informed, the greater the externalities.

Property Law and the Theory of the Firm

To recapitulate: recent developments in the theory of the firm, whilst identifying the significance of allocations of control rights, have failed to explain the role played by property law in facilitating the sharing or partitioning of control between different participants in a firm. An understanding of the significance of the *scope* of proprietary rights—their 'in rem' character—points the way to a more complete explanation of the role played by law in supporting business enterprise. In particular, only property law can provide automatic enforcement of the 'second-order' allocations of entitlement to residual control in relation to assets used in productive enterprise. Moreover, the way in which the costs to third parties are minimised will have a significant impact on the degree of flexibility enjoyed by participants in the firm to structure their 'second-order' arrangements so as to respond most appropriately to their particular needs. The claim of this section is therefore that a fuller understanding of the functional

significance of property law can at once enrich the economic theory of the firm and provide the basis for an account of the non-trivial functions of corporate law.⁷¹

There may appear to be an inconsistency between the way in which this account describes the demand for and the supply of property law rules. As regards demand, the theory of the firm shows that allocation of control rights can be a powerful governance mechanism in circumstances where the transaction costs of contracts are very high—in particular, the costs of verifying to a court information relevant to the enforcement of a complex contract. Yet regarding supply, it has been argued that minimising total costs of property law rules will often require courts to become involved in complex, fact-contingent enquiries. Does this mean that the role ascribed for law in protecting shared property is inconsistent with the role ascribed to property rights as a mechanism of governance in the absence of court enforcement?⁷²

This inconsistency is merely apparent. It must be borne in mind that the strong assumptions made about parties' inability to verify information to courts in some of the formal 'property rights' models are exaggerations. Their results are best interpreted as demonstrating simply that in many circumstances it will be *cheaper* for parties to govern the division of quasi-rents within the firm by allocating residual control rights than to do so by a complex contract that relies upon court enforcement. Thus for internal governance matters, the allocation of control rights have significant consequences. Yet this can only be supported by the existence of a body of rules that govern JOA costs, which the 'residual control rights' mechanism is necessarily unable to do. Under these circumstances, external enforcement is the only available mechanism.

4 The Proprietary Foundations of Corporate Law

Shared Ownership and Corporate Assets

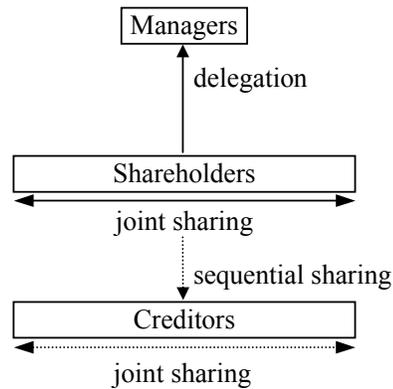
What can the foregoing analysis tell us about the structure and operation of corporate enterprise? As a starting point, it may be helpful to explain how the ownership of assets used in productive enterprise can be thought about as *shared* between individuals associated with a firm. That is to say, how the *contents* of the bundle entitlements that together comprise 'ownership' are parcelled out amongst participants. The way in which this is done in a typical public company involves a combination of various techniques, each used in less complex forms of business organisation. It is useful quickly to describe some of these first, for they form conceptual building blocks. In each case, there is a need for what we earlier termed a 'second order' arrangement between the participants, specifying *which* of the entitlements of ownership are exercisable by *whom* and *when* they are so exercisable.

The simplest business organisation, namely *agency*, involves only *delegation* of ownership entitlements in relation to assets by the principal to his agent. Those entitlements not so delegated of course remain the principal's. Where two principals combine their firms to form a *partnership*, this involves *joint* sharing, between the partners, of the entitlements of ownership in relation to the business assets. Although some entitlements will be exercised jointly—that is, collectively by the partners—most partnerships will combine this with some delegation amongst the partners of responsibility for particular types of control decision. The delegated entitlements will be exercised by the delegate alone, in contrast to those which remain subject to the collective decision-making of the partners.

Now consider debt finance. If an entrepreneur (or a partnership, or indeed a company) borrows money to fund her business, this can be understood as a *sequential* sharing of entitlements between the creditor and the entrepreneur. That is, the entitlements are exercisable by the entrepreneur so long as she continues to make repayments.⁷³ Where there is more than one creditor, there may be *joint* sharing of the (contingent) entitlements between the creditors. That is, should the entrepreneur default on her debts generally, then the entitlements become exercisable by the creditors collectively.⁷⁴

A typical public company can be seen as involving a particularly complex sharing arrangement, combining elements of each of the above. There is sequential sharing between shareholders and creditors, and delegation from shareholders to managers.⁷⁵ There will also be joint sharing between shareholders of the aspects of ownership that are not delegated to managers: namely residual returns and the right to remove the delegates.⁷⁶ This combination of sharing arrangements is portrayed in Figure 1.

Figure 1: Typical Entitlement-Sharing Arrangements in a Public Corporation



What is the law’s role in facilitating such sharing of ownership entitlements in companies? To understand this, it is helpful to return to the distinction between the content and the scope of legal entitlements.⁷⁷ The law performs two basic functions. First, it assists participants in delineating the *contents* of their entitlement-sharing arrangements—that is, the ‘second order’ arrangements about the division of the entitlements of ownership in relation to the business assets. These arrangements are essentially voluntary agreements between the participants, and the law’s role here is that cast for it by the contractarian theory: to supply ‘standard forms’ which participants may employ. Secondly—and more importantly—the law provides mechanisms whereby the *scope* of the parcels of entitlements given to each participant is made, to use Hohfeld’s term, ‘multital’. That is, their entitlements are protected not just against other participants to the voluntary arrangement, but against persons generally. In short, the arrangements are given *proprietary* effect.

A Taxonomy of the Law Relating to Companies

To show how the law performs these two functions, we must engage in an exercise in taxonomy. This briefly maps the structure of corporate law in a way that distinguishes those aspects that perform the second role, which we term the ‘proprietary foundations’, from those that perform the first, which we term the ‘contractarian superstructure’.⁷⁸ The discussion is organised by considering in turn the various dimensions of the asset-sharing arrangements in typical companies, as unbundled in the previous section. As is now well known, functionalist accounts of corporate law suggest that the contractarian rules in each case respond to agency costs—the costs of conflicts of interest—generated between the various categories of participant.⁷⁹ Less celebrated, however, is that for these contractarian arrangements to be made to ‘stick’ with third parties,

each aspect depends upon foundations from property law. Table 2 summarises what follows.

Table 2: The Proprietary Foundations of Corporate Law

Functional problem	Entitlement sharing	Relevant Aspects of Law	
		Contractarian	Proprietary
<i>Shareholder-shareholder conflicts</i>	Joint	Art 70, law of meetings, class rights, s 459, derivative action, shareholder agreements	Ostensible authority, ss 35-35B, <i>bona fide</i> purchaser and notice doctrines; Overreaching, Registration
<i>Director-shareholder conflicts</i>	Delegation	Directors' duties, s 303, shareholder decision rights	
<i>Shareholder-creditor conflicts</i>	Sequential	(Limited liability), share capital, wrongful trading, loan covenants	Security interests, fraudulent conveyance law
<i>Creditor-creditor conflicts</i>	Joint	Subordination agreements	Corporate insolvency law, preference law

(i) *Shareholder-shareholder and director-shareholder conflicts*. If there were no board of directors, then the shareholders would be empowered together to exercise the entitlements of ownership in relation to corporate assets. They would share these entitlements *jointly*—that is, the entitlements could only be exercised through some collective decision-making mechanism. A unanimity rule would be unwieldy because of the costs of making decisions, so instead company law provides a framework within which decisions may be made by majority vote.⁸⁰ Even this, however, may prove too costly for regular use, hence the allocation of jurisdiction to make business decisions to the board of directors.⁸¹ To encourage the directors to exercise these powers for the benefit of the business, as opposed to their own benefit, there is a complex body of law concerning directors' *duties* in the performance of their functions.⁸² Moreover, power to make a number of important decisions, sufficiently significant to be worth incurring the costs of shareholder decision-making, is retained by shareholders. This includes of course the appointment and removal of the board.⁸³ Where the shareholders make decisions, there is potential for majorities to seek to expropriate minority claimants. Company law seeks to protect the interests of minorities through a range of mechanisms, most significantly the imposition of restrictions on the alterations of the constitution,⁸⁴ and the provision of remedies to minority shareholders for particularly serious harm caused by majority misbehaviour.⁸⁵

None of these aspects of the legal framework involves mechanisms of property law. They affect only participants internal to the corporate enterprise and are largely susceptible of modification by these parties.⁸⁶ Had ‘company law’ not existed, such rules could be replicated (or created) by private contracts between participants.⁸⁷ Thus the content of these rules are part of the ‘contractarian superstructure’ of corporate law.

Nevertheless, property law does perform an important role in supporting the *enforcement* of these ‘contractual’ arrangements against third parties. This comes into play in situations where one of the parties—a director or shareholder—acts without authority under the constitution or in breach of their duties (where applicable), in a transaction involving a third party. That is, there is an attempted alienation or grant of entitlements in respect of corporate assets that is contrary to the ‘second-order’ arrangement about how these entitlements are to be shared. This would encompass not only attempts to sell the assets, but also attempts to use the assets to bond unauthorised contracts,⁸⁸ or attempts to allow newcomers to participate in the sharing of control of the assets—that is, unauthorised issues or transfers of shares, or appointment of directors. Formerly it also included, by virtue of the doctrine of *ultra vires*, purported transactions that exceeded the company’s objects clause.⁸⁹

In each of the foregoing situations, an unauthorised transaction may be set aside against a third party. To provide for this result by contracts with all potential third parties would be prohibitively costly. The open-ended set of potentially affected parties gives away the *proprietary* nature of the rules in question. In corporate lawyers’ terms, the crucial rules are those of agency and trusts law. Thus unauthorised attempts to alienate corporate assets,⁹⁰ or to create contractual claims against them,⁹¹ or to entitle newcomers to become shareholders⁹² or directors,⁹³ may not bind the corporate assets or the existing parties to the corporate ‘bargain’.⁹⁴ Similarly, transactions in which directors breach their fiduciary duties may give rise to *proprietary* claims against directors and third parties by the company,⁹⁵ the law drawing an analogy with transactions by a trustee in breach of trust.⁹⁶

A second basic function performed by property law that is necessary for shared ownership arrangements to function is that of *overreaching*.⁹⁷ Namely, providing that assets and claims exchanged by agents for assets from the shared pool—or claims against those assets—automatically become subject to the (shared) allocation of ownership entitlements, as opposed to becoming the property of the agent.⁹⁸ This is an equitable principle, the best-known application of which is in the law of trusts. In the corporate context, it is applied slightly differently, because the legal title to the property remains with the

company itself. Yet an overreaching mechanism is nevertheless in play. The default position is that an agent selling goods on behalf of his principal becomes merely a debtor for the price, whereas if the agent is also a *trustee*, then the money received becomes subject to the principal's beneficial ownership.⁹⁹ A director is not strictly speaking a trustee, but is treated *as though he were*, thus funds received by him in return for the sale of corporate assets are treated as corporate property rather than his own.

Hansmann and Kraakman have recently called attention to the significance of certain aspects of these proprietary foundations, which they term 'affirmative asset partitioning'.¹⁰⁰ In essence, their label captures the notion that shareholders are unable to deal with corporate assets in an individual capacity. In particular, shareholders' personal creditors may not execute against corporate assets, but rather are entitled only to the bundle of rights that comprise the *shares* held in the company. Yet this is merely one aspect of a more general function performed by property law, upon which corporate law is founded: namely, the giving of proprietary ('multital') effect to restrictions on unauthorised dealings by those *sharing* the entitlements of ownership of assets.

(ii) *Shareholder-creditor and creditor-creditor conflicts*. The third source of potential conflict between participants in corporate enterprise is that between shareholders (or shareholders and managers together) and creditors. A basic feature of any lending arrangement is the contingent allocation of entitlements to control assets between the borrower and the lender.¹⁰¹ This is true too of corporate borrowing arrangements. Should the company default on its debts, its creditors become entitled to control its assets. The principle of limited liability means, however, that it is *only* corporate assets that are so subject, and not the personal assets of shareholders or directors.¹⁰² This limitation means that shareholders and directors may be tempted, particularly when the company is heading for insolvency, to strip assets, take high-risk gambles, or to increase indebtedness.¹⁰³ Such transactions, where effective, enable the shareholders to expropriate creditors. The law's response to these problems involves a number of rules that restrict transactions that are likely to profit shareholders and/or directors at creditors' expense. Best known of these are the regulation of share capital,¹⁰⁴ the prohibition on 'wrongful trading',¹⁰⁵ and the equation on insolvency of the 'interests of the company', which the directors are duty-bound to further, with the interests of creditors.¹⁰⁶

However, both limited liability itself and the aforementioned restrictions on its abuse are best analysed as part of the 'contractual superstructure'. It would be possible in each case to replicate them by contract.¹⁰⁷ Thus those contracting with outsiders on behalf of the company could insert a standard clause to limit

liability, as appears to have been done by insurance firms formed prior to the Limited Liability Act 1855.¹⁰⁸ Moreover, these contracts could also contain provisions whereby incorporators promise not to engage in activities that will harm creditors, and agree to face personal liability should they do so.¹⁰⁹

The proprietary foundations in relation to creditors are found in the law of secured credit and insolvency.¹¹⁰ Secured credit allows a debtor to promise its creditor, with *proprietary* effect—that is, enforceable against third parties—(i) a certain priority ranking and (ii) that certain assets will not be alienated without its consent. Thus, a security interest prevents the debtor from alienating collateral without the secured creditor’s consent,¹¹¹ and, through the creditor’s priority in insolvency, ensures that subsequent borrowings will not dilute its claim.¹¹² Furthermore, this is done in a way that is ‘self-enforcing’, for it automatically binds outsiders.¹¹³

A more general restriction is supplied by what was formerly known as ‘fraudulent conveyance’ law, now termed ‘transactions at an undervalue’.¹¹⁴ This allows creditors to challenge eve-of-insolvency transactions that harm their interests, setting them aside against third parties generally. Whilst a prohibition on fraudulent conveyances may be understood as a term that any creditor would want written into a contract with their debtor,¹¹⁵ its enforcement against third parties generally is not something that a contractual prohibition would be capable of achieving.¹¹⁶ The law of fraudulent conveyances is therefore best seen as part of the proprietary foundation of corporate law.

Finally, there are costs arising from conflicts *between* creditors. For most companies, these are potential rather than actual costs, because their impact is only felt when the company becomes insolvent. However, where this does happen, very significant costs can arise from the attempts of multiple creditors to exercise their entitlements simultaneously.¹¹⁷ At this point, corporate insolvency law steps in to effect a collective transformation of creditors’ rights.¹¹⁸ Once again, attempts to deal with the assets in ways that are inconsistent with these orderings will bind third parties.¹¹⁹ English law provides for different insolvency procedures to be invoked depending on the entity that is insolvent.¹²⁰

Relevant Property Law Strategies

The foregoing taxonomy allows us to identify the rules of property law that underpin corporate enterprise. These can now be usefully analysed by considering the various strategies they employ for minimising the sum of JOA costs and enforcement externalities. A version of the simplest and most restrictive strategy, *numerus clausus*, can be seen in operation at the level of

organisational form. Only a limited number of forms of business organisation are available, each of which has certain immediately recognisable and distinctive features that relate to the way in which the entitlements of ownership are shared. The registered company (whether limited by shares, guarantee, or unlimited) is just one of these—the others comprising agency, trusts, partnerships, Limited Partnerships and Limited Liability Partnerships.¹²¹ Similarly, the law of security interests is said to employ a *numerus clausus* of property law structures.¹²² The idea is presumably that by limiting the size of the menu, an outer bound may be placed on the costs incurred by third parties in determining the likely allocations of entitlements.¹²³ However, the *numerus clausus* technique is only employed in a very loose sense in relation to organisational form, because participants retain a free hand to customise the terms of the entitlement sharing to organisational assets between themselves.¹²⁴ Moreover, the law also permits parties to customise the terms of non-possessory security interests,¹²⁵ as well as facilitating the use of other devices that function as security even if they are not formally so classified.¹²⁶ This flexibility is facilitated by the complementary use of the two other techniques of property law for resolving the essential trade-off.

The *registration* strategy is used heavily in company law, with varying degrees of success. In particular, the company's constitutional documents, business address, and the names of its members and directors must all be registered.¹²⁷ The memorandum and articles of association specify the outer boundaries of any corporate agent's powers (the company's objects), the division of these powers between different groups of agents and the procedures for decision-making about how these powers are to be exercised. Through registration, these documents are available to be consulted by third parties. A related requirement is that the company's name must end in 'Ltd' or 'plc' and must be used in all correspondence, in order to inform third parties that they are dealing with a company rather than an individual.¹²⁸ Similarly, the register of charges gives details of most non-possessory security interests granted by the company.¹²⁹

The registration strategy is complemented in company law by the use of *selective enforcement*. Where a third party is dealing with an individual agent, the scope of whose power is not set out in the company's constitution, then the counterparty may nevertheless enforce the contract if the agent *reasonably appeared*, depending on the context, to have authority.¹³⁰ Similar rules govern transactions with third parties that are entered into by directors in breach of their fiduciary duties. These may leave the outsider liable either to have an executory contract set aside or to a proprietary claim by the organization for restitution of its property, unless the counterparty is in good faith and gives value.¹³¹ The essence of both tests involves a determination of which party could have

avoided the transaction at lowest cost.¹³² The same strategy can also be seen at work in relation to fraudulent conveyances. Although the current legislation contains no defence of *bona fide* purchaser, it does have a substantive requirement that the transaction be effected at an undervalue.¹³³ This is precisely the sort of circumstance that would put a third party ‘on notice’ under the old law and so in functional terms can be viewed as working in a similar manner.¹³⁴

Particularly interesting is the complex interplay in company law between registration and selective enforcement. Early judicial responses to registration seem to have proceeded on the assumption that the register could be consulted easily. Thus the doctrine of ‘constructive notice’, articulated most clearly by the House of Lords in *Ernest v Nicholls*,¹³⁵ provides that third parties are deemed to be aware of the contents of all public documents available for consultation at Companies House. Similarly, short shrift was shown to unsecured creditors in *Salomon v Salomon*, who because of the use of the ‘Ltd’ suffix, knew that they were dealing with a company rather than an individual.¹³⁶ Unfortunately, it soon became clear that consulting the Register was in most cases prohibitively costly, and so the doctrine of constructive notice could not be employed indiscriminately.¹³⁷

Thus there developed a judicial gloss on the registration strategy. The ‘indoor management rule’ provides that where there is a *procedural* restriction in the constitution—that is a transaction requires some authorisation under the company’s constitution—an outsider, even if they know of the existence of the procedural hurdle, is entitled to assume that all necessary steps have been taken provided that nothing in the register indicates otherwise.¹³⁸ This is a remarkable piece of judicial casuistry. Taken at face value, the outsider is first deemed to know the entire contents of the public register, but then relieved from making enquiries about whether relevant steps have been taken provided that they would in the ordinary course of things have been done. The net result is that the outsider is given incentives to make enquiries to a standard that is remarkably similar to that employed under the ‘pure’ selective enforcement strategy—namely, whether it was reasonable in all the circumstances for him to rely on the appearance of the transaction’s authenticity.¹³⁹

The balance was shifted even further in favour of third parties by the First Company Law Directive,¹⁴⁰ implemented comprehensively by the Companies Act 1989. This abolished the effects of the doctrine of *ultra vires* for third parties, and in relation to agency, created a ‘safe harbour’ for third parties where a transaction is authorised by the board.¹⁴¹ Yet even this is not entirely free of selective enforcement. Section 35A is limited in its protection to third parties ‘in good faith’, although it is for the company to show the absence of this state of

mind, and it requires more than what would suffice to show that a third party is ‘on notice’ at common law.¹⁴² Perhaps more significantly, the question of what constitutes ‘the board’ is left to general company law—with the result that a selective enforcement approach also seems to be in the process of development in relation to this question.¹⁴³

Similarly, in the realm of secured credit, the interplay of registration and selective enforcement has led to a complex body of law. The registration strategy, fully introduced in relation to charges after the courts had had fifty years of experience in relation to companies’ constitutional documents,¹⁴⁴ has always been applied with sensitivity to its impact upon third party search costs. Thus registration of a charge acts as notice of its existence, but not of its contents.¹⁴⁵ Although on one view, the *numerus clausus* principle applies not only to the types of security interest that may be created, but also to their attributes,¹⁴⁶ the better view is that ‘customisation’ of equitable security interests is perfectly possible,¹⁴⁷ and that negative pledges and automatic crystallisation clauses take effect subject to selective enforcement—that is, they are only enforceable against third parties with notice of their existence.¹⁴⁸

Evaluating the Mix of Strategies

As we have seen, the primary contribution of property law to the functioning of corporate law has historically been through the mechanism of selective enforcement. Generally speaking, it is preferable to the *numerus clausus* strategy because of the greater flexibility it provides for insiders in structuring their sharing arrangements. This is borne out by its comprehensive use in corporate law. The effectiveness of the registration strategy depends largely upon the technology employed for disseminating registered particulars to outsiders. Where it is cheap for outsiders to become informed, registration is capable of acting as a superior alternative to selective enforcement. However, where this is not the case, it simply acts as a complement, providing a straightforward mechanism for conveying certain types of information and channelling the ‘due diligence’ questions that third parties are encouraged to make.

Over time, the technology available to insiders seeking to monitor the actions of their delegates has become more effective, with the result that a shift can be discerned in favour of protecting third parties, most noticeably in the realm of corporate contracts. Yet the advent of the Internet means that the costs of consulting the Register have been dramatically reduced for most third parties.¹⁴⁹ It seems likely that the overall costs of the system would perhaps be reduced by a corresponding shift to allocate greater responsibility to third parties.¹⁵⁰

Two Analytic Payoffs

Before turning to normative considerations, it is worth examining two ways in which the foregoing argument has implications for the way in which we analyse corporate law.

(i) *The (Very Limited) Role of Corporate Personality.* A reader who has been following the analysis will have noted that the discussion makes only passing reference to corporate personality. Indeed, the ‘building blocks’ of property law upon which corporate law is based would allow a structure that arranges shared entitlements to physical assets in a way very similar to that which occurs in companies, but without using the corporate form. What difference, then, does corporate personality make? To the functional analysis of control rights, the answer is ‘very little’.

Start with a simple case. If ABCo Ltd is sole owner of its assets, has no outstanding debt and X (an individual) is the sole owner of the shares in ABCo, then what difference exists between the control that X may exercise over the assets of ABCo, and the control which X would be able to exercise were they his personal assets, and he had no outstanding debt? If attention is directed to a more complex case, where entitlements are shared, then it becomes clear that there are of course differences in the way in which the strategies of property law are applied to different organisational forms—thus, the rules relating to corporate transactions, secured credit and insolvency in particular are different if the corporate form is used. However, it is a *non sequitur* to assert that these differences flow from the fact that a company has legal personality. They flow from nothing more than the fact that the strategies of property law are applied differently to shared ownership organised in companies.¹⁵¹ To emphasise this point, recall that under Scots law, a partnership has legal personality (whereas of course under English law it does not) yet no one suggests that because of this, the relevant property law principles should apply differently north of the border.¹⁵²

To say that corporate personality plays no part in an account of corporate law’s function is not to say that the idea is a meaningless fiction. Rather, the role played by the notion of legal entity is a more subtle one. It affects not how the law *functions*, but how lawyers *think about* the law. Arguably, ‘corporate personality’ provides a convenient shorthand for thinking about the combined effects of many of the foregoing property law mechanisms than would a system lacking such a notion. As such, it may act as a useful heuristic for judges and lawyers fleshing out the application of particular rules.¹⁵³ This is, however, a quite separate issue from how the law functions in relation to business enterprise.

(ii) *The scope of 'corporate law'*. One of the clearest implications of the analysis concerns the scope of what we think about as 'corporate law'. The subject tends to be seen as principally comprised of the rules described in the foregoing discussion as 'contractarian'.¹⁵⁴ This is in part because rules of this type comprise the majority of the Companies legislation,¹⁵⁵ in part because the very size of the subject makes it necessary to draw essentially arbitrary distinctions when writing books or designing courses and in part because knowledge of other relevant areas of law tends to be assumed on the part of students and practitioners of the subject. There is nothing inherently wrong with subject boundaries being drawn for convenience, so long as the reason for so doing is not forgotten. Yet with ever-increasing specialisation in the teaching and practice of law, there is a risk that with such boundaries come barriers to understanding. As the foregoing analysis demonstrates, it is only through the existence of a wide range of rules that are commonly classified under other headings—property law, agency, trusts, secured credit, insolvency—that the 'core' aspects of corporate law are able to do their work. Moreover, understanding and evaluating the way in which the law *functions* to facilitate and regulate the operation of business enterprise requires consideration of this whole range of doctrines. Our analysis suggests that the efficacy of the whole depends disproportionately upon the structure of the proprietary foundations, and in particular upon the way in which the essential strategies of property law are mixed together.

5 Conclusion: Towards a Unified Theory of Corporate Law

Contributions of the Analysis

Economists seeking to explain the nature and scope of firms now attach as much significance to property rights as to contracts. In contrast, the regnant economic theory of corporate law is nevertheless still based upon a purely *contractarian* view of the firm. Taking seriously the importance of property rights requires corporate law theorists to understand the significance of property law's functions—in particular the facilitation of sharing of ownership rights between individuals—in supporting governance arrangements in firms.

A few scholars have already started to appreciate the significance of property law's contribution to the functioning of corporate law. Most notably, Hansmann and Kraakman have identified the importance of the way in which property law partitions assets between co-owners. This article makes three contributions to this emerging programme of research into the 'proprietary foundations' of corporate law. First, a link is established between the theory of the firm and the role of property law. The 'property rights' theory of the firm emphasises how entitlements to control assets can be used as governance mechanisms that complement incomplete contracts. However, it relies upon a simplistic

conception of undivided ownership, which does not account adequately for the need, in all but the smallest business organisations, to have ‘second order’ arrangements that stipulate how the entitlements of ‘ownership’ in relation to assets are to be *shared* between participants. These sharing arrangements can themselves act as mechanisms of governance, and so it is valuable for parties to be able to customise them to suit their particular requirements, as by contract.

Yet the very sharing of ownership itself creates *joint-owner agency* (‘JOA’) *costs*, arising from the possibility that a party with control for the time being might use it to grant entitlements in relation to the asset to a third party which are inconsistent with those of the other co-owners. If such transactions were effective, they (or the possibility thereof) could undermine the use of shared ownership as a governance mechanism. *Property law* solves this problem by making the sharing arrangements enforceable not only as between the co-owners (‘insiders’ to the firm) but as against third parties generally. It is this function that forms the link between property law and the theory of the firm.

Property law’s protection of co-owners against each other’s opportunism can, however, generate externalities—costs for unwitting third parties who incur losses in reliance on putative transactions. The second contribution of the analysis is to show that property law’s function in relation to corporate enterprise is not simply to minimise JOA costs, but to minimise the sum of JOA costs, enforcement externalities, and the costs of administering the system. Three strategies are employed to effect this ‘essential trade-off’: (i) the use of a *numerus clausus*: that is, a fixed list of possible sharing arrangements; (ii) selective enforcement—only against third parties who are ‘least-cost avoiders’; and (iii) mandatory registration of the existence or terms of such arrangements. A *numerus clausus* strategy severely limits the ability of co-owners to customise their arrangements, thus limiting their ability to reduce JOA costs. Both the selective enforcement and registration strategies are significant advances over this, for they allow co-owners to have contract-like flexibility over the terms of their sharing arrangements, whilst nevertheless giving these proprietary effect. The choice between registration and selective enforcement will depend primarily on the technology available for disseminating registered information to third parties.

Thirdly, to make the theory concrete, the article identifies the rules of English law that form the ‘proprietary foundations’ of corporate law. These are, in brief, the rules of agency and trusts law that support the *delegation* of ownership entitlements and the overreaching of property entitlements; and the laws of secured credit, fraudulent conveyances and corporate insolvency that permit the *sequential* sharing of ownership entitlements between equity and debt claimants.

The range of rules thereby included is, we consider, significantly broader than the notion of ‘affirmative asset partitioning’ developed by Hansmann and Kraakman. The basic strategies employed by these aspects of property law are a combination of a *numerus clausus* principle (for organisational forms and insolvency law) and selective enforcement (for agency transactions, equitable property rights, and fraudulent conveyances). Superimposed upon these in the context of corporate law is a set of registration requirements, and much of the complexity in this area of law has arisen from the way in which courts have sought to work out the appropriate interplay between these and the strategies already immanent in the law. Absent a technology for disseminating registered information at low cost to third parties generally, registration complements, rather than substitutes for, the other strategies of property law.

Implications of the Analysis

Seeing corporate law in light of our theory generates a taxonomy that divides it into ‘proprietary foundations’ and a ‘contractarian superstructure’. Seeing the law in this way has several significant implications. As a matter of positive analysis, it points the way to overcoming some of the limitations of the purely contractarian theory of corporate law. The functions performed by the proprietary foundations of the subject could not be replicated by parties writing ‘standard form’ contracts, thereby responding to the objection of triviality. To be sure, our account does not deny that much of corporate law—the aspects we term the ‘contractarian superstructure’—may usefully be analysed in contractarian terms. Nevertheless, it makes the positive claim that the successful operation of these rules depends upon the ability of property law to support the co-ownership arrangements that effect much of the internal governance of firms. On one level, our analysis can be seen as an attempt to re-emphasise the ‘law’ in corporate ‘law and economics’ scholarship.¹⁵⁶ That said, we do not advocate any reification of the notion of the corporate ‘entity’.

This positive claim yields empirically testable hypotheses. If we are correct, then the development of the ‘proprietary foundation’ of corporate law should be a much more significant determinant of capital accumulation than the rules comprised in the ‘contractarian superstructure’. This could be tested both historically within a single jurisdiction and cross-sectionally over multiple jurisdictions. In particular, we would expect that (i) the efficacy of registration mechanisms; (ii) the availability of a general *bona fide* purchaser defence; and (iii) the effectiveness of insolvency law would be crucial for the development of corporate finance—more so than the introduction of the corporate entity principle itself.

Our account also has important normative implications. For those engaged in the reform of company law, the paper's analysis should assist in identifying which areas of law will yield the greatest return on the investment of reform effort. Resources should be concentrated on the law's proprietary foundation, since its impact is of disproportionate importance. Three specific implications are worth noting: (i) that reform of 'company law' should not be conducted in isolation from other areas of law that are important parts of the proprietary foundations of the subject, in particular secured credit and insolvency; (ii) that greater consistency could be achieved in the way in which the 'fundamental trade-off' is effected in relation to different aspects of corporate shared ownership; and (iii) the significance of information technology to the viability of the registration strategy.

More generally, the analysis has implications for debates about the functions that company law should be understood as serving. Given that what we have termed the 'proprietary foundations' of corporate law cannot be replicated by private contract, it follows that no normative privilege should be accorded to private ordering in respect of this part of the subject.¹⁵⁷ This is so, even for accounts internal to law and economics scholarship: the optimality of the law's existing solutions cannot be presumed simply from their persistence. It is quite possible that alterations in the way in which the proprietary foundations of corporate law effect the 'essential trade-off' could enhance efficiency. For example, it might be that introducing greater contractibility into aspects of the proprietary foundation that are currently governed by a *numerus clausus* strategy—such as insolvency law—might be a beneficial step.¹⁵⁸ It is also conceivable that the facilitation of the grant of proprietary rights to other, non-creditor, stakeholder groups might also be welfare enhancing.¹⁵⁹ These are difficult questions, answers to which are beyond the scope of this article. Our current point is simply that it cannot be presumed because such solutions do not currently exist, that they are not efficient.

Notes

¹ The classic account is F.H. Easterbrook and D.R. Fischel, *The Economic Structure of Corporate Law* (Cambridge, MA: Harvard University Press, 1991). For application to English law, see B.R. Cheffins, *Company Law: Theory, Structure and Operation* (Oxford: Oxford University Press, 1997) and M.J. Whincop, *An Economic and Jurisprudential Genealogy of Corporate Law* (Aldershot: Ashgate, 2001).

² That is, mandatory rules serve to counteract market failures and elsewhere corporate law's function is to provide 'default rules', assisting parties by saving

them the costs of specifying the terms of their bargains. See generally the articles in the symposium entitled ‘Contractual Freedom and Corporate Law’ (1989) 89 Colum LR 1395-1774.

³ The classic critique is W.M. Bratton, ‘The “Nexus-of Contracts” Corporation: A Critical Appraisal’ (1989) 74 Cornell LR 407.

⁴ See eg, S. Worthington, ‘Shares and Shareholders: Property, Power and Entitlement: Part 1’ (2001) 22 Co Law 258, 264.

⁵ See eg, D. Millon, ‘Theories of the Corporation’ [1990] Duke LJ 201; L.E. Mitchell, ‘The Cult of Efficiency’ (1992) 71 Tex LR 217; J. Dine, ‘Fiduciary Duties as Default Rules, European Influences and the Need for Caution in the Use of Economic Analysis’ (1999) 20 Co Law 190.

⁶ See eg, M.A. O’Connor, ‘Restructuring the Corporation’s Nexus of Contracts: Recognizing A Fiduciary Duty to Protect Displaced Workers’ (1991) 69 N Carolina LR 1189; G. Kelly and J. Parkinson, ‘The Conceptual Foundations of the Company: A Pluralist Approach’ (1998) CFILR 174.

⁷ There are too many works written in this genre to cite exhaustively. For an overview, see sources cited above, n 1. See also R. Kraakman *et al*, *The Anatomy of Corporate Law* (Oxford: Oxford University Press, 2004), much of the analysis in which builds upon contractarian scholarship.

⁸ B.S. Black, ‘Is Corporate Law Trivial?: A Political and Economic Analysis’ (1990) 84 NW ULR 542.

⁹ See R. La Porta *et al.*, ‘Legal Determinants of External Finance’ (1997) 52 J Fin 1131. *Cf.* B.R. Cheffins, ‘Law, Economics and History: Lessons from the UK’s System of Corporate Governance’, (2001) 1 JCLS 71; M. Roe, *Political Determinants of Corporate Governance* (2003).

¹⁰ See generally O. Hart, *Firms, Contracts, and Financial Structure* (Oxford: Clarendon Press, 1995). See also R. Rajan and L. Zingales, ‘Power in a Theory of the Firm’ (1998) 113 QJ Econ 387. ‘Governance’ refers here to the set of constraints on how parties divide up the economic surplus generated within the firm: see L. Zingales, ‘Corporate Governance’ in P. Newman (ed.), *The Palgrave Dictionary of Economics and the Law*, Vol 1 (London: Macmillan, 1998), 497.

¹¹ H. Hansmann and R. Kraakman, ‘The Essential Role of Organizational Law’ (2000) 110 Yale LJ 387. See also P.G. Mahoney, ‘Contract or Concession? An Essay on the History of Corporate Law’ (2000) 34 Ga LR 873; P. Ireland, ‘Property and Contract in Contemporary Corporate Theory’ (2003) 23 LS 453.

¹² Hansmann and Kraakman, above, n 11, 407-408.

¹³ That is, preventing shareholders' personal creditors from executing against corporate assets: *ibid* 394-395.

¹⁴ R.H. Coase, 'The Nature of the Firm' (1937) 4 *Economica* 386.

¹⁵ A.A. Alchian and H. Demsetz, 'Production, Information Costs and Economic Organization' (1972) 62 *Am Econ Rev* 777.

¹⁶ Susceptible either to the 'repeated spot contract', or the 'single long term' analysis. The 'authority' to which Coase referred was non-existent: employers were no more able to 'force' employees to do something against their will than anyone else. Rather, the employment relation was purely voluntary.

¹⁷ They saw the distinguishing feature of a firm as *team production*: each individual is necessary for production to occur, but that it is not observable from the joint output how much effort each individual has been applying.

¹⁸ M.C. Jensen and W.H. Meckling, 'Theory of the Firm: Managerial Behavior, Agency Costs, and Ownership Structure' (1976) 3 *J Fin Econ* 305.

¹⁹ R.A. Posner and A.M. Rosenfeld, 'Impossibility and Related Doctrines in Contract Law: An Economic Analysis' (1977) 6 *J Leg Stud* 83; C. Goetz and R.E. Scott, 'The Limits of Expanded Choice: An Analysis of the Interactions Between Express and Implied Contract Terms' (1985) 75 *Calif LR* 261, 262-263.

²⁰ In order for such gap-filling to be efficient, the cost of supplying the term by the state must be less than the cost at which the parties can supply it themselves. It does not necessarily require that the state have a cost advantage over any given set of parties, but rather that a one-off supply of terms by the state be cheaper than the sum of the costs which parties would incur in order to supply such terms.

²¹ See the discussion in Cheffins, above n 1, 231-32. The general scepticism about mandatory rules in the law and economics literature on contract law has endured: see A. Schwartz and R.E. Scott, 'Contract Theory and the Limits of Contract Law' (2003) 113 *Yale LJ* 541, 609-18; *cf* I. Ayres, 'Valuing Modern Contract Scholarship' (2003) 113 *Yale LJ* 881, 886-890.

²² The corpus of their scholarship is synthesised in their book: Easterbrook and Fischel, above n 1. See also the 1989 symposium issue of the *Columbia Law Review*, above n 2.

²³ See eg, D. Charny, 'Hypothetical Bargains: The Normative Structure of Contract Interpretation' (1991) 89 *Michigan LR* 1815; I. Ayres, 'Making a Difference: The Contractual Contributions of Easterbrook and Fischel' (1992) 59 *U Chic LR* 1391; A. Schwartz, 'Incomplete Contracts' in Newman, above n

10, Vol 2, 277. For reasons of space, this article does not consider critiques based on viewpoints external to the economic analysis of law.

²⁴ See Schwartz and Scott, above n 21, 592-608; E.A. Posner, 'Economic Analysis of Contract Law After Three Decades: Success or Failure?' (2003) 113 Yale LJ 829; *cf* Ayres, above n 21, 890-892.

²⁵ A. Schwartz, 'Relational Contracts in the Courts: An Analysis of Incomplete Agreements and Judicial Strategies' (1992) 21 J Leg Stud 271, 278-281.

²⁶ A third is that one party prefers to keep information relevant to performance to themselves, so as to secure a lower price (I. Ayres and R. Gertner, 'Filling Gaps in Incomplete Contracts: A Theory of Default Rules' (1989) 99 Yale LJ 87). Whilst in theory courts may be able to overcome such 'strategic contractual incompleteness' with appropriately-designed 'penalty default rules', the appropriate choice of rule is such a complex and context-sensitive exercise that the chances of successfully operationalising the theory seem to be virtually nil. See I. Ayres and R. Gertner, 'Strategic Contractual Inefficiency and the Optimal Choice of Legal Rules' (1992) 101 Yale LJ 729, 765.

²⁷ For example, the desire to maintain an ongoing business relation that is valuable for both parties. See K. Eggleston, E.A. Posner and R. Zeckhauser, 'The Design and Interpretation of Contracts: Why Complexity Matters' (2000) 95 NW ULR 91, 107-126.

²⁸ Black, above n 8, 557-558; Schwartz, above n 23, 282.

²⁹ Easterbrook and Fischel themselves acknowledged this limitation in their argument: F.H. Easterbrook and D.R. Fischel, 'The Corporate Contract' (1989) 89 Colum LR 1416, 1444-1446.

³⁰ See P.L. Davies, *Gower's Principles of Modern Company Law* (London: Sweet & Maxwell, 6th ed, 1997), Ch 2; R. Harris, *Industrializing English Law* (Cambridge: Cambridge University Press, 2000), Ch 6; Mahoney, above n 11. For empirical evidence as to the importance of practitioners' precedent manuals as 'standard forms', see M.J. Whincop, 'An Empirical Analysis of the Standardisation of Corporate Charter Terms: Opting out of the Duty of Care' (2003) 23 Int'l Rev L & Econ 285.

³¹ C.W. Smith and J.B. Warner, 'On Financial Contracting: An Analysis of Bond Covenants', (1979) 7 J Fin Econ 117; M. Kahan and M. Klausner, 'Standardization and Innovation in Corporate Contracting (Or "The Economics of Boilerplate")' (1997) 83 Va LR 713.

³² B. Klein, R. Crawford and A.A. Alchian, 'Vertical Integration, Appropriable Rents, and the Competitive Contracting Process', (1978) 21 JL & Econ 297;

O.E. Williamson, *The Economic Institutions of Capitalism* (New York: Free Press, 1985); Hart, above n 10.

³³ Klein et al, *ibid*.

³⁴ The relevant productive surplus is referred to by economists as ‘quasi-rents’—namely, the supracompetitive profit generated by a processes that combines assets in a unique manner. Often such processes will require the assets to be *customised*, lowering their value in other uses. However, once assets have been customised, the owner may be vulnerable to ‘hold-up’ by other parties whose co-operation or assets are required for the productive process. If other party refuses to share as much of the productive surplus as initially promised, the owner will be forced to accept this if the asset is—because of customisation—even less valuable elsewhere.

³⁵ Williamson, above n 32, 68-84. The allocation of ownership is of course not the only way in which parties can influence the shape of *ex post* bargaining over surplus. Important *non*-legal mechanisms include ‘corporate culture’ and social norms (see M.A. Eisenberg, ‘Corporate Law and Social Norms’ (1999) 99 Colum LR 1253; E.B. Rock and M.L. Wachter, ‘Islands of Conscious Power: Law, Norms and the Self-Governing Corporation’ (2001) 149 U Pa LR 1619). The current article is concerned with law’s role in structuring control rights, so these issues will be left for consideration elsewhere.

³⁶ S. Grossman and O. Hart, ‘The Costs and Benefits of Ownership: A Theory of Vertical and Lateral Integration’ (1986) 94 J Pol Econ 691; O. Hart and J. Moore, ‘Property Rights and the Nature of the Firm’ (1990) 98 J Pol Econ 1119. Most of the results are synthesised in Hart, above n 10.

³⁷ O. Hart and J. Moore, ‘Default and Renegotiation: A Dynamic Model of Debt’ (1998) 113 QJ Econ 1.

³⁸ Similar logic can explain the relationship between managers and a (majority) outside shareholder. See Z. Fluck, ‘Optimal Financial Contracting: Debt versus Outside Equity’ (1998) 11 *Review of Financial Studies* 383.

³⁹ Thus Pettet, after a careful review of the theory of the firm, concludes: ‘It remains to be seen whether the difficult insights of [the property rights] theory will become as influential as those provided by the earlier ... analyses.’ (B. Pettet, *Company Law* (Harlow: Pearson, 2001), 78).

⁴⁰ O. Hart, ‘An Economist’s Perspective on the Theory of the Firm’ (1989) 89 Colum LR 1757, 1771.

⁴¹ See eg, M.M. Blair and L.A. Stout, ‘A Team Production Theory of Corporate Law’ (1999) 85 Va LR 247.

⁴² ‘Occam’s razor’ is a principle well-known to economists, for simpler theory is capable of more general application. See eg, F. Machlup, *Methodology of Economics and Other Social Sciences* (New York: Academic Press, 1978), 88-89, 401.

⁴³ This marks an important break from earlier economic theories, in which ‘ownership’ was equated with rights to ‘residual income’. If complete contracts cannot be written, then party entitled to residual income will not necessarily receive this income, unless they also exercise residual control rights (Hart, above n 32, 63-66).

⁴⁴ Hart, above n 32, 30.

⁴⁵ A.M. Honoré, ‘Ownership’ in A.G. Guest (ed), *Oxford Essays in Jurisprudence* (Oxford: Oxford University Press, 1961) 107, 113.

⁴⁶ She may also lack necessary expertise in circumstances where she does not have time to acquire it.

⁴⁷ She may also do this to benefit from the advantages of risk-sharing.

⁴⁸ The goal would be to select a rule that minimises the sum of the costs of decision-making and the costs of the externalities each co-owner has freedom to impose on the others through self-interested choices. See J.M. Buchanan and G. Tullock, *The Calculus of Consent* (Ann Arbor: University of Michigan Press, 1962), 63-116.

⁴⁹ *ibid.*

⁵⁰ ‘Agency’ is used here in the economist’s, rather than the lawyer’s, sense of the term.

⁵¹ This of course creates potential for counter-opportunism. Where contracts are incomplete, trust or norm-based mechanisms will be necessary to ensure that such decisions are taken in the interests of the co-owners as a whole. For accounts of the role of such non-legal standards against a backdrop of ‘endgame’ control rights enforceable in law, see S. Deakin and A. Hughes, ‘Economic Efficiency and the Proceduralisation of Company Law’ [1999] 3 *CFILR* 169 and Rock and Wachter, above n 35.

⁵² W.N. Hohfeld, *Fundamental Legal Conceptions as Applied in Judicial Reasoning* (W.W. Cook ed, New Haven: Yale University Press, 1920), 35-64. Hohfeld argued that all legal relationships could be broken down into their constituent ‘fundamental legal relations’, each conceived in a dyadic sense (*ibid* 36). These are well known, and may be represented by the following double matrix, showing jural *correlatives* in columns and jural *opposites* across rows:

Right	No-right
Duty	Privilege (liberty)

Power	Disability
Liability	Immunity

A *right* denotes an entitlement to require another (not) to do something, that other being under a correlative *duty* (not) to do so at the behest of the right-holder. The holder of a *privilege* (or *liberty*) in respect of a certain action, by contrast, is merely free from any duty (not) to act at another's behest, that other having *no right* to require such (in)action. A *power* enables its grantee the capacity to perform acts or make determinations that affect the legal status or entitlements of another person—who is subject to a correlative *liability*. Conversely, a person subject to a *disability* cannot affect the status of another person in a particular respect, that person thereby being said to enjoy an *immunity*.

⁵³ Penner has cogently argued that property rights in law cannot be understood without reference to their *object*. In his view, property rights are always thought of in terms of an *asset* to which the entitled enjoyment relates: J.E. Penner, 'The "Bundle of Rights" Picture of Property' (1996) 43 UCLA LR 711. This view is consistent with the account given in the text, but its acceptance is not a necessary step in the reasoning.

⁵⁴ Hohfeld, above n 52, 72.

⁵⁵ R. Nolan, 'Property in a Fund' (2004) 120 LQR 108, 132-133.

⁵⁶ The account in the text of course skims over many of the subtle issues debated in the analytic legal literature. However, no attempt is made to offer a complete description of 'property rights'. Rather, that term is used only heuristically, to denote a category of rules for which there are important *functional* differences from rules of contract law.

⁵⁷ See eg, G.D. Libecap, *Contracting for Property Rights* (Cambridge: Cambridge University Press, 1989), 1-28; Hart, above n 32, 30; Y. Barzel, *Economic Analysis of Property Rights*, 2nd ed. (Cambridge: Cambridge University Press, 1997), 55-64 (accounts of determinants of contracts about shared ownership, not mentioning distinction between scope of personal and proprietary rights).

⁵⁸ Furthermore, there may be dynamic inefficiencies arising from fragmentation of property interests. It is easier to divide property rights (the owners' prerogative) than to reunify them (requiring the consent of all co-owners), and these reunification costs may hamper change when a division that was at once

functional has over time ceased to be so: see F. Parisi, 'Entropy in Property' (2002) 50 Am J Comp L 595.

⁵⁹ U. Mattei, *Basic Principles of Property Law* (Westport, CT: Greenwood Press, 2000), 14.

⁶⁰ Above, text to nn 32-38.

⁶¹ Provided that the contents of this list are widely known, a restriction of this sort can reduce search costs for third parties, as the sorts of questions that they need ask may be standardised.

⁶² B. Rudden, 'Economic Theory v. Property Law: The *Numerus Clausus* Problem', in J. Eekelaar and J. Bell (eds), *Oxford Essays on Jurisprudence*, 3rd ed (Oxford: Oxford University Press, 1987), 239, 254-256; Mattei, above n 59, 39; T.W. Merrill and H.E. Smith, 'Optimal Standardization in the Law of Property: The *Numerus Clausus* Principle', (2000) 110 Yale LJ 1, 38-41.

⁶³ The classic analysis is G. Calabresi, *The Costs of Accidents: A Legal and Economic Analysis* (New Haven: Yale University Press, 1970). For a demonstration of the generality of Calabresi's approach, see R. Cooter, 'Unity in Tort, Contract and Property: The Model of Precaution' (1985) 73 Calif LR 1.

⁶⁴ For example, if A enters into a transaction of modest value that is of a sort typically conducted by agents in his position, but in fact is prohibited under the terms of his agreement with P, it would be very costly for TP to discover this—perhaps even more so than for P to monitor A to prevent this from happening. Yet if A had instead entered into an irregular, high-value transaction, the costs to TP of determining its status would probably be much lower.

⁶⁵ See A. Schwartz and R.E. Scott, *Commercial Transactions: Principles and Policies*, 2nd ed. (Westbury, NY: Foundation Press, 1991), 488-494; M.J. Whincop, 'Nexuses of Contracts, The Authority of Corporate Agents, and Doctrinal Indeterminacy: From Formalism to Law and Economics' (1997) 20 UNSW LJ 274, 284-97; D. Fox, 'Constructive Notice and Knowing Receipt: An Economic Analysis' [1998] 57 CLJ 391; B. Medina, 'Augmenting the Value of Ownership by Protecting it Only Partially: The "Market-Overt" Rule Revisited', College of Management Academic Studies Law School Working Paper (2003).

⁶⁶ Strictly speaking, of course, the doctrine is based upon a 'holding out' by the principal. This can be thought of as an essential precondition for it to be 'reasonable' for the third party to rely.

⁶⁷ As a matter of law this equivalence is not exact, as was recently pointed out by the House of Lords in *Criterion Properties plc v Stratford UK Properties LLC* [2004] UKHL 28 at [28]-[31]. For present purposes the key similarity is

that both depend on the level of knowledge of the third party and the ease with which they could have discovered the defect.

⁶⁸ See J. Langbein, 'The Secret Life of the Trust: The Trust as an Instrument of Commerce' (1997) 107 Yale LJ 165, 183-185; H. Hansmann and U. Mattei, 'The Functions of Trust Law: A Comparative Legal and Economic Analysis' (1998) 73 NYU LR 434, 466-469; Nolan, above n 55, 111-117.

⁶⁹ See D.G. Baird, 'Notice Filing and the Problem of Ostensible Ownership', (1983) 12 J Leg Stud 53; Rudden, above n 62, 246; H. Hansmann and R. Kraakman, 'Property, Contract, and Verification: The *Numerus Clausus* Problem and the Divisibility of Rights' (2002) 31 J Leg Stud S373.

⁷⁰ Typically co-owners are given an incentive to register, by denying enforcement to those who have failed to do so: see eg, Companies Act 1985 (henceforth 'CA 1985') s 395.

⁷¹ An economist may note the structural similarity between the regulatory character of the various strategies that limit the scope of property rights so as to minimise third party costs, and those rules which deny enforceability to contracts that impose externalities—for example, contracts to pollute or to commit a crime. This seems, however, to be only a point of semantics. Regardless of how the relevant body of rules are described, it is nevertheless the case that (i) their existence has so far been overlooked in scholarship on the theory of the firm; and (ii) that they have a role to play that is functionally more significant than the provision of contractual default rules. It so happens that this body of law is termed 'property' by lawyers, so it seems no clarity is lost by employing this term to describe a set of rules not yet fully analysed by economic theory.

⁷² See J.A. McCahery, Review of Whincop, above n 1, (2002) 2 JCLS 186, 188.

⁷³ Of course this is a generalisation, because the transfer of entitlements to the creditor on default is not complete. It is typically only for the purpose of realising the assets to repay the loan, after which entitlements to any residual value are returned to the debtor.

⁷⁴ Alternatively, the entrepreneur may wish to arrange things such that the (contingent) sharing between the creditors is sequential, with a designated order of priority for their respective abilities to exercise entitlements in relation to the assets.

⁷⁵ 'Delegation' is used here (as, more generally is the notion of 'shared ownership') in a functional sense: for the technical position, see below n 81 and text thereto.

⁷⁶ Similarly, if the firm is in default, then shareholders' rights are transferred to creditors, who will exercise them jointly.

⁷⁷ See above, text to nn 52-56.

⁷⁸ The distinguishing criterion is whether the provisions in question could be replicated by private contract. If they could, then (mandatory rules apart) their function is essentially as the 'standard form' described by the contractarian theory. If they could not be replicated by contract because the set of potentially affected parties is indefinitely large, then they are better viewed as *property* law rules.

⁷⁹ The leading functionalist account of corporate law divides these into three basic agency problems or conflicts of interest, namely between (i) shareholders and managers; (ii) shareholders and each other; and (iii) shareholders and creditors (R.R. Kraakman *et al*, *The Anatomy of Corporate Law* (Oxford: Oxford University Press, 2004), 21-22). To these might usefully be added a fourth, between (iv) creditors and each other: see D. Skeel, 'Corporate Anatomy Lessons' (2004) 113 Yale LJ 1519, 1550-1559.

⁸⁰ CA 1985, Part XI, Ch IV (Meetings and Resolutions); Table A, regs 36-63. Of course if unanimous shareholder consent can be obtained, these formalities may be waived: *Re Duomatic Ltd* [1969] 2 Ch 365; *Wright v Atlas Wright (Europe) Ltd* [1999] 2 BCLC 301.

⁸¹ Table A, reg 70. This is understood as an exclusive grant of management power to the board: *Automatic Self-Cleansing Filter Syndicate Co Ltd v Cunniffhame* [1906] 2 Ch 34. However, it is open to modification by the shareholders (see *Cane v Jones* [1980] 1 WLR 1450) and indeed is frequently waived in smaller companies where unanimous shareholder consent is relied upon for decision-making.

⁸² These include duties (i) to obey the constitution; (ii) to exercise powers in good faith for the benefit of the company and not for an improper purpose; (iii) to avoid conflicts between self-interest and duty; and (iv) to take reasonable care in the performance of their tasks. See generally P.L. Davies, *Gower's Principles of Modern Company Law*, 7th ed. (London: Sweet & Maxwell, 2003), Ch 16.

⁸³ CA 1985, s 303; Table A, regs 73-81. It also includes alterations to the constitution (ss 4, 9, 121), authorisation of: certain transactions with directors and their associates (ss 320, 322A), issues of shares (s 80), waiver of pre-emption rights (ss 91, 95), re-purchases of shares (ss 164-166), distributions (Table A, reg 102), reductions of capital (s 135), financial assistance (where permissible: ss 155-158) and decisions to wind up the company (Insolvency Act 1986 ss 84(1), 122(1)(a)).

⁸⁴ Both through ‘default’ rules encompassed in the *Allen v Gold Reefs of West Africa Ltd* [1900] 1 Ch 656 line of case law, and the facility to specify more powerful protection through the use of class rights (see CA 1985 ss 17, 125-129).

⁸⁵ Namely, the derivative action, available for wrongs constituting a ‘fraud on the minority’ (*Prudential Assurance v Newman Industries (No 2)* [1982] Ch 204, 210-225) and the statutory remedy for unfair prejudice to the petitioner’s interests (CA 1985 s 459).

⁸⁶ ‘[T]he manner in which the affairs of the company may be conducted is closely regulated by rules to which the shareholders have agreed.’ (*Per* Lord Hoffmann, *O’Neill v Phillips* [1999] 1 WLR 1092, 1098).

⁸⁷ Whether fiduciary duties are usefully analysed as ‘contractual’ is of course a contentious issue. Regardless, it seems perfectly plausible that such duties and the corresponding liability to account could be created *bilaterally* by contract. It is probable that ‘disgorgement measure’ damages would be granted if the contract expressly so provides (see *A-G v Blake* [2001] 1 AC 268, 287, 291-292). Difficulty in quantifying loss would tend to militate against characterisation such a term as a penalty (see *Dunlop Pneumatic Tyre Co Ltd v New Garage and Motor Co Ltd* [1915] AC 79, 87-88, 96). In any event, the obligation to account could be framed as an alternative primary obligation, rather than a secondary obligation (see *Lombard North Central Finance plc v Butterworth* [1987] 2 WLR 7, 16-17).

⁸⁸ That is, to enter into contracts on the company’s behalf: in this case it is the corporate assets to which the counterparty will look for satisfaction if performance is not forthcoming.

⁸⁹ *Ashbury Railway Carriage and Iron Co Ltd v Riche* (1875) LR 7 HL 653; *Rolled Steel Products (Holdings) Ltd v British Steel Corpn* [1986] Ch 246. The doctrine was abolished as regards third parties by the implementation of the First EC Company Law Directive (68/151/EEC [1968] OJ 65/8; CA 1985 ss 35-35B).

⁹⁰ *Rolled Steel, ibid* 297-298.

⁹¹ *Criterion Properties v Stratford*, above n 67 at [29]-[31].

⁹² *Bank of Hindustan, China and Japan Ltd v Alison* (1871) LR 6 CP 222, 226-227 (issue in excess of authorised capital); *Re A Company (No 005134 of 1986), ex parte Harries* [1989] BCLC 383, 396 (issue in contravention of pre-emption rights); *Re London and New York Investment Corpn* [1895] 2 Ch 860, 869; *EIC Services v European Internet Capital Ltd* [2004] EWCA Civ 1069 at [19]-[41] (issue in excess of directors’ authority); *Tett v Phoenix Property and Investment Co Ltd* [1986] BCLC 149, 162, 167 (unauthorised share transfer).

⁹³ *Boschoek Pty Co Ltd v Fuke* [1906] 1 Ch 148, 163; *Morris v Kanssen* [1946] AC 459, 471-473.

⁹⁴ In many cases, of course, whether this is so will depend on the third party's level of knowledge—reflecting the balancing function performed by property law rules. See below, text to nn 130-134.

⁹⁵ *Russell v Wakefield Waterworks Co* (1875) LR 20 Eq 474, 479; *Belmont Finance Corp v Williams Furniture Ltd (No 2)* [1980] 1 All ER 393, 405 (dispositions); *Lee Panavision Ltd v Lee Lighting Ltd* [1992] BCLC 22, 28-31; *Heinl v Jyske Bank (Gibraltar) Ltd* [1999] Lloyds' Rep Bank 511, 520-521 (contracts); *Howard Smith Ltd v Ampol Petroleum Ltd* [1974] AC 821, 838 (issue of shares). See also CA 1985 ss 322, 322A, 341.

⁹⁶ *Russell v Wakefield Waterworks*, above n 95, 479; *Re Lands Allotment Co* [1894] 1 Ch 616, 631, 638; *Belmont Finance v Williams Furniture (No 2)*, above n 95, 405. See generally L.S. Sealy, 'The Director As Trustee' [1967] CLJ 83.

⁹⁷ See generally, C. Harpum, 'Overreaching, Trustees' Powers and the Reform of the 1925 Legislation' [1990] 49 CLJ 277, 277-282.

⁹⁸ This will happen automatically if the transaction is authorised, and on the election of the other co-owners if unauthorised.

⁹⁹ *Henry v Hammond* [1913] 2 KB 515, 521; *Triffit Nurseries v Salads Etcetera Ltd* [2000] 1 BCLC 761, 768-769.

¹⁰⁰ Above n 11, 394-95. Hansmann and Kraakman argue that 'affirmative asset partitioning' is the *only* essential role played by organisational law. The rules we have just considered clearly perform the function of preventing shareholders from alienating, or issuing claims against, corporate assets. However, they do much more. Hansmann and Kraakman are right that affirmative asset partitioning is important, but incorrect to claim that it is the *only* important function.

¹⁰¹ See above n 73.

¹⁰² CA 1985 ss 1(2)(a); Insolvency Act 1986 (henceforth 'IA 1986') s 74(2)(d).

¹⁰³ Jensen and Meckling, above n 18, 333-343; A. Schwartz, 'A Theory of Loan Priorities,' (1989) 18 J Leg Stud 209, 228-234.

¹⁰⁴ CA 1985 Parts V and VIII, restricting gratuitous transfers of corporate assets to shareholders. See J Armour, 'Share Capital and Creditor Protection: Efficient Rules for a Modern Company Law?' (2000) 63 MLR 355, 363-370.

¹⁰⁵ Insolvency Act 1986 s 214. See R. Mokal, 'An Agency Cost Analysis of the Wrongful Trading Provisions' [2000] 59 CLJ 335.

¹⁰⁶ *Kinsela v Russell Kinsela Pty Ltd* (1986) 4 NSWLR 722, 730; *West Mercia Safetywear Ltd v Dodd* (1989) 4 BCC 30, 33; *Official Receiver v Stern* [2001] EWCA Civ 1787 at [32], [2002] 1 BCLC 119, 129-130. See R. Grantham, ‘The Judicial Extension of Directors’ Duties to Creditors’ [1991] JBL 1.

¹⁰⁷ The only exception is the limited liability of shareholders from tort claims against the enterprise.

¹⁰⁸ See *Hallett v Dowdall* (1852) 21 LJQB 98, 118 ER 1; *Re Merchant Traders’ Ship, Land and Insurance Association* (1852) 5 De G & Sm 386, 393-394, 64 ER 1165, 1168; *Re European Assurance and Insurance Association* (1875) 1 Ch D 307, 322-333 (‘limited liability’ clause inserted into joint stock company’s contracts with creditors effective); cf *Re Sea, Fire & Life Insurance Co* (1854) 3 De G M & G 459, 43 ER 180; *Re Norwich Equitable Fire Assurance Co* (1887) 27 Ch D 515 (clause inserted simply into deed of association ineffective).

¹⁰⁹ In fact, such contracts are frequently written—in the form of loan covenants and personal guarantees.

¹¹⁰ The doctrine of *ultra vires* also served a similar function in an earlier era. By restricting the ability of shareholders and directors to alter the direction of the company’s business, it reassured creditors that the riskiness of their investment would not change. See *Ashbury v Riche*, above n 89, 667; Cheffins, above n 1, 527-528.

¹¹¹ C.W. Smith and J.B. Warner, ‘Bankruptcy, Secured Debt and Optimal Capital Structure: A Comment’ (1979) 34 J Fin 247.

¹¹² Schwartz, above n 103, 228-234.

¹¹³ A. Schwartz, ‘Priority Contracts and Priority in Bankruptcy’ (1997) 82 Cornell LR 1396, 1412-1414.

¹¹⁴ IA 1986 ss 238, 423.

¹¹⁵ D.G. Baird and T.H. Jackson, ‘Fraudulent Conveyance Law and its Proper Domain’ (1985) 38 Vand LR 829, 835-836.

¹¹⁶ Note, ‘Fraudulent Conveyance Law as a Property Right’ (1987) 9 Cardozo LR 843, 847-849; J.B. Heaton, ‘Incomplete Financial Contracts and Non-Contractual Legal Rules: The Case of Debt Capacity and Fraudulent Conveyance Law’ (2000) 9 *Journal of Financial Intermediation* 169.

¹¹⁷ T.H. Jackson, ‘Bankruptcy, Non-Bankruptcy Entitlements, and the Creditors’ Bargain’ (1982) 91 Yale LJ 857, 859-868; M.J. Roe, ‘The Voting Prohibition in Bond Workouts’ (1987) 97 Yale LJ 232, 236-239.

¹¹⁸ IA 1986 ss 128, 130, Sch B1, paras 42-44; *Ayerst v C & K Construction Ltd* [1976] 167, 176-180; *Re Aro Co Ltd* [1980] Ch 196, 204-205; *Bristol Airport plc v Powdrill* [1990] Ch 744, 758; *Wight v Eckhardt Marine GmbH* [2003] UKPC 37 at [27], [2004] 1 AC 147, 155-156.

¹¹⁹ See eg IA 1986 s 127.

¹²⁰ IA 1986, Parts VIII and IX (Individual Voluntary Arrangement and Bankruptcy procedures for sole proprietorships); IA 1986, Parts I-VII and Sch B1 (Company Voluntary Arrangement, Administration, Receivership and Liquidation procedures for companies); Insolvent Partnerships Order 1994, SI 1994/2421 (applying amended provisions of IA 1986 to partnerships and Limited Partnerships); Limited Liability Partnerships Regulations 2001, SI 2001/1090, reg 5 (applying provisions of IA 1986 to Limited Liability Partnerships).

¹²¹ It is, of course, possible that the menu could be longer. For example, a wider range of organisational forms is offered to business participants in many US jurisdictions. See L. Ribstein, 'The New Choice of Entity for Entrepreneurs' (1997) 26 Capital ULR 325.

¹²² R.M. Goode, *Legal Problems of Credit and Security*, 3rd ed (London: Sweet & Maxwell, 2003), 31-38 (forms of consensual security limited to pledge, lien, charge and mortgage).

¹²³ J. Armour and M.J. Whincop, 'An Economic Analysis of Shared Property in Partnership and Close Corporations Law' (2001) 26 J Corp L 983, 999-1000.

¹²⁴ The most important exception is the applicable insolvency procedure (above n 120), which is not capable of being customised. Until recently, companies and lenders could opt, through the grant of a floating charge, to have an insolvency dealt with by administrative receivership. However, this option has been removed by the Enterprise Act 2002 (s 250).

¹²⁵ See Nolan, above n 55, 117-130.

¹²⁶ Namely title retention and *Quistclose* trusts. See M.G. Bridge, 'Form, Substance and Innovation in Personal Property Security Law' [1992] JBL 1; M.G. Bridge, 'The *Quistclose* Trust in a World of Secured Transactions' (1992) 12 OJLS 333.

¹²⁷ CA 1985 ss 10, 18 (memorandum and articles), 28 (changes of name), 128 (class rights not in memorandum or articles), 288 (directors), 352 (members), 380 ('constitutional' decisions).

¹²⁸ CA 1985 ss 25, 348, 349.

¹²⁹ CA 1985 Part XII.

¹³⁰ *Freeman & Lockyer v Buckhurst Park Properties (Mangal) Ltd* [1964] 1 QB 480, 503-506.

¹³¹ *Rolled Steel*, above n 89, 295-298, 307 (dispositions); *Heinl v Jyske Bank*, above n 95, 520-521 (contracts).

¹³² See above, text to nn 65-67. On the purchaser's side, the more unusual the facts — the more they suggest the vendor is seeking to sell more than she is able — the greater the efforts the purchaser must make to establish that this is not the case: Law of Property Act 1925 s 199, esp. ss (1)(ii)(a). If, given the appropriate level of care, the purchaser still is unaware of the co-owner's rights, then she may buy the assets free of them.

¹³³ IA 1986 ss 238, 240.

¹³⁴ J. Armour, 'Transactions at an Undervalue' in J. Armour and H.N. Bennett (eds), *Vulnerable Transactions in Corporate Insolvency* (Oxford: Hart Publishing, 2003), 37, 40, 46-47.

¹³⁵ (1857) 6 HL Cas 401.

¹³⁶ As Lord Macnaghten put it, '[t]he unsecured creditors ... may be entitled to sympathy, but they have only themselves to blame for their misfortunes. They ... had full notice that they were no longer dealing with an individual, and they must be taken to have been cognisant of the memorandum and of the articles of association.' ([1897] AC 22, 53).

¹³⁷ This was most pronounced in relation to the doctrine of *ultra vires*. The judiciary were well aware of the way in which an absolute enforcement of restrictions in the objects clause could impose disproportionate costs on third parties. As Lord Parker explained: 'The narrower the objects expressed in the memorandum the less is the subscribers' risk, but the wider such objects the greater is the security of those who transact business with the company.' (*Cotman v Brougham* [1918] AC 514, 520).

¹³⁸ *Royal British Bank v Turquand* (1856) 6 E&B 327; 119 ER 886.

¹³⁹ Suspicious circumstances relating to a transaction may put a counterparty 'on notice' such that he is unable to rely on the indoor management rule: *AL Underwood Ltd v Bank of Liverpool* [1924] 1 KB 775, 788-789; *B Liggett (Liverpool) Ltd v Barclays Bank Ltd* [1928] 1 KB 48, 56-57; *Morris v Kanssen* [1946] AC 459, 475; *Northside Developments Pty Ltd v Registrar-General* (1990) 170 CLR 146, 155, 192, 207.

¹⁴⁰ Above n 89.

¹⁴¹ CA 1985 ss 35A. A second, less celebrated, 'safe harbour' is for transactions effected by a deed signed by two directors: s 36A(4).

¹⁴² First, good faith is presumed in favour of the third party (s 35A(2)(c)). Secondly, knowledge alone that the transaction exceeds the power of the board will not be sufficient to put the third party in ‘bad faith’ (s 35A(2)(b)).

¹⁴³ *Smith v Henniker Major* [2003] EWCA Civ 762, [2003] Ch 182. It appears that an ‘apparent board’ will suffice (*ibid* at [108], 213).

¹⁴⁴ Companies Act 1900. Section 43 of the Companies Act 1862 had introduced a requirement that companies keep a register of charges at their place of business, but it seems this provision was not really intended to be a means of lowering search costs, for only *existing* creditors or members were entitled to look at the register—*potential* creditors had no such right: see *Wright v Horton* (1887) 12 App Cas 371, 376. Moreover, non-registration did not affect the validity of the charge: *ibid*.

¹⁴⁵ In particular, not of any unusual circumstances under which a floating charge will crystallise, or the existence of negative pledges: *English and Scottish Mercantile Investment Co v Brunton* [1892] 2 QB 700, 707; *Wilson v Kelland* [1910] 2 Ch 306, 313.

¹⁴⁶ In particular, that there are certain ‘essential’ features of a floating charge that may not be customised by contract: see *Evans v Rival Granite Quarries Ltd* [1910] 2 KB 979, 993-996 (events of crystallisation); *Griffiths v Yorkshire Bank plc* [1994] 1 WLR 1497, 1535 (negative pledges). See also *National Westminster Bank plc v Spectrum Plus Ltd* [2004] EWCA Civ 670 at [25]-[31].

¹⁴⁷ *Re Brightlife Ltd* [1987] Ch 200, 214-215; *Fire Nymph Products Ltd v Heating Centre Pty Ltd* (1992) 7 ACSR 365 (events of crystallisation); *Re Portbase Clothing* [1993] Ch 388, 401 (negative pledges).

¹⁴⁸ Goode, above n 122, 81-82, 146-148, 181-182 (distinguishing chargee’s actual and apparent authority to deal).

¹⁴⁹ The list of information available from Companies House over the Internet, with accompanying prices, can be seen at <http://www.companieshouse.gov.uk/toolsToHelp/productPriceList.shtml> .

¹⁵⁰ Arguably such a shift could be precipitated in relation to security interests by the proposed change to a ‘notice-filing’ system, under which filing and searching of the register would be done electronically: see Law Commission Consultation Paper 176, *Company Security Interests* (London: TSO, 2004), 18-20.

¹⁵¹ As the point was more eloquently put by Hohfeld: ‘[w]hen all is said and done, a corporation is just an association of natural persons conducting business under legal forms, methods and procedures that are *sui generis*. The only

conduct of which the state can take notice by its laws *must* spring from natural persons—it cannot be derived from any abstraction called the “corporate entity” (W.N. Hohfeld, ‘Nature of Stockholders’ Individual Liability for Corporation Debts’ (1909) 9 Colum LR 285, 291).

¹⁵² Partnership Act 1890 s 4(2).

¹⁵³ Whincop, above n 1, 46-47.

¹⁵⁴ See eg, Kraakman *et al*, above n 79, 15-17.

¹⁵⁵ Thus, for example, it seems that the scope of ‘core’ company law as considered by the Company Law Review was largely determined by the scope of the existing companies legislation: see DTI, *Modern Company Law for a Competitive Economy* (London: HMSO, 1998), 17-18.

¹⁵⁶ See generally G. Hadfield and M. Richardson (eds), *The Second Wave of Law and Economics* (Leichhardt, NSW: Federation Press, 1999).

¹⁵⁷ Armour and Whincop, above n 123, 1000; T.W. Joo, ‘Contract, Property and the Role of Metaphor in Corporation Law’ (2002) 779, 816-820; Ireland, above n 11, 503-509.

¹⁵⁸ See eg, A. Schwartz, ‘A Contract Theory Approach to Business Bankruptcy’ (1998) 107 Yale LJ 1807.

¹⁵⁹ See J. Armour and S. Deakin, ‘Insolvency, Employment Protection and Corporate Restructuring: the Effects of TUPE’, ESRC Centre for Business Research Working Paper 204 (2001).

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