

The Irrelevance of Organisational Boundaries of Owner-Managed Firms

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ABSTRACT. Empirical researchers and analysts of small or owner-managed businesses generally behave as if the selected organisational form and the consequent legal and accounting boundaries of owner-managed firms are meaningful. This paper discusses selected aspects of this notion, and provides some empirical evidence concerning loan securities, and treatments of debts and assets, which justify rejecting the relevance of the organisational types and implied boundaries in many contexts relating to owner-managed firms. These include analyses employing traditional accounting disclosures and studies that view the firm as defined by some formal organisational structure. Emphasis is on the treatment and effects of private debts and assets.

The absence of positive theoretical support in economics for specifying the boundaries of the firm has been long recognised in the established literature on the nature of the firm; for example Coase (1937), Alchian and Demsetz (1972) and Jensen and Meckling (1976). The latter of these argued that the company structure merely

serves as a nexus for contracting relationships and . . . is also characterised by the existence of divisible claims on the assets and cash flows of the organization which can generally be sold without permission of the other contracting individuals. (Jensen and Meckling, 1976, p. 311).

This suggestion that incorporation is merely a legal nicety is of particular significance for owner-managed firms which by definition have no significant external proprietary equity. While owner-managed firms are not subject to the same range of agency problems as professionally managed firms, numerous agency problems exist nonetheless.

Owner and manager contracting still exists in a limited form in the case of partnerships (due to joint and several liability concepts) and in incorporated firms where any owner-manager is able to dominate any part of any of the decision processes. Where owner-managers have incorporated, agency costs also arise with debt contracting. Typically, the debtholder seeks to avoid the limited liability barrier by contracting around it in the form of personal guarantees. This fairly obvious subjugation of organisational limits may be rendered even more so when the behaviour of the owner-manager in relation to consumption and business decisions is considered.

Essentially, the historical suggestion that the firm is not an individual (e.g., Jensen and Meckling, 1976) may be entirely inappropriate in the context of owner-managed firms. The organisational structures adopted by owner-managers often are likely to be products of taxation planning, rather than some concept of entity separation. For incorporated firms, the attraction of limited liability is also offered as a motive, particularly in practice oriented texts. However, the value of limited liability does not appear to have been tested. While the more sophisticated literature is less likely to explicitly identify limited liability as a reason for the incorporation of owner-managed firms, the use of data and models that implicitly recognise the corporate boundaries as limits of resources and debt are commonplace. Indeed, much of the empirically driven literature has not deviated from the early notions that the adaption of limited liability companies to private business destroyed the connection between the extent and nature of a firm's operations and the personal financial position of the owners (e.g., Penrose, 1959, p. 6).

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aged firms are assumed appropriate in much of the empirical literature. The acceptance of traditional financial statements based on these organisational forms is commonplace. Examples include Cooley and Edwards (1983), DeThomas (1985), and McIntyre and Icerman (1985).¹ Cragg and King (1988) review a large number of studies from 1985–86 largely employing such data. If interest lies with the behaviour of the individual per se, the firm may be largely irrelevant. If interest lies with the behaviour of the 'business', the business and the individual essentially are indivisible. If merely the legal or accounting entities are considered, presumably the most easily separable from the individual and purportedly described by traditional financial statements, the organisational boundaries generally may be inappropriate. While this is easily observed for unincorporated businesses, it is plausible that the typical behaviour and management of the small owner-operated company is much the same as for unincorporated firms.

The key aspect of this lack of separability is non-distinction in *effect* (although distinctions may be formally attributed), of individual and business capital.

Some aspects of boundaries between firms and individuals

The blurring of economic boundaries may cause a partial breakdown in the traditionally attributed distinction between debt and equity. The personal risk aversion of owners typically encourages the contribution of funds for incorporated business through shareholders' loans, rather than share issues and retained earnings. This possibly reduces the owner-manager's direct risk, and certainly retains flexibility in funding not available through typical non-redeemable share structures. Should the business fail, the owner-manager or related parties of an incorporated small firm have a greater chance of recovering loans than share capital.

There are countervailing pressures from external lenders for owner-managers to issue personal guarantees for debt. Investment decisions under such arrangements are also functions of the risk aversion of individuals rather than a firm. Owner-managers may prefer to forgo otherwise desirable

investment opportunities to reduce or limit the risk attached to their aggregate (but especially personally held) wealth.

Such risk attitudes and taxation planning may 'corrupt' innumerable aspects of reported structures in owner-managed firms. For example, family trusts or partnerships, or related companies, may hold various assets (especially real estate and vehicles) and lease them to the nominated business entity. Such activities escape the consolidation practices which are required for public companies, and so there is likely to be a greater degree of off-balance sheet activity. Also, various resources employed in the business, but which the owner does not wish to attribute to the business entity, simply remain undisclosed. Contrarily, personal-use assets or debts may be included in the balance sheet. Also, as mere residuals of taxation planning and personal consumption decisions, retained profits will not reflect previous profitability and internal financing decisions.

Performance measures

Such events also reduce the meaningfulness of reported periodic income numbers. Many means can be employed to distribute funds, further distorting the profit figure as a measure of the firm's periodic performance. Personal consumption concealed in expenditure, payments above market rates for services from related parties, interest on debt used primarily for personal consumption, and various taxation minimisation contrivances; or with opposite effects, the absence of reported interest (due to loans employed in the business being accounted for individually for taxation reasons), payments below market rates for services from related parties, and so on, distort reported income numbers beyond the confusion traditionally attributed to such numbers.

In whichever direction the confusion tends, it significantly detracts from traditional performance measures that employ assets, equity, or income measures if they are applied in the same manner as for public companies. Therefore, it may be necessary to go beyond the financial statements of the business entity, and view the firm and the individual as one, or at least extend the concept of what is traditionally accepted as an appropriate

description of the firm. However, mere aggregation is unlikely to be appropriate. While this may obviate some aspects of the problem, it is likely to contain many noise variables in relation to resources and activities appropriately associated with the consumption or savings activities of the individual.

Criticisms of traditional accounting measures as performance indicators is not new, although many financial analysis textbooks propose this such use. Fisher and McGowan (1983) is typical of the critical literature concerning use of accounting rates of return for making inferences about relative economic profitability. Defences for the application of accounting rates of return such as those offered by Kay and Mayer (1986) do not hold under the conditions of incomplete or inaccurate disclosure offered here.

Resource base versus collateral base

While there may be opportunity for various theoretical solutions, for example, by defining the firm merely as a collection of productive resources (ignoring the boundaries of organisational form), there remain problems of identification and measurement, and those caused by the ease of transfer of labour resources between consumption activity and investment in the firm. Ignoring labour capital, enduring problems are associated with measures based on employed assets. For example, unemployed assets remain relevant in that they are at risk or represent a disposition of capital.

Rather than a resource base, it may be possible to describe a "collateral" base. This could be as simple as the (net) collection of assets against which the owner-manager can draw (either by reassignment, conversion or borrowing) to increase employed resources or to discharge existing debt. While there is a remaining difficulty in estimating informal borrowing capacity,² this approach removes the need to distinguish the borrowing capacity of the legal entity from that of the personally guarantied entity. Such complications are not limited to owner-managed firms, but are more prevalent.

Collateral concepts may also encounter a problem common to measures based on total assets. That is, the size of the firm as a productive unit can be distorted if it includes placements

(which may be relatively large) when the firm is unable to expand its productive activity fast enough to make full use of its collateral resources. However, this is subject to identification of the firm's function. If production is defined to include temporary placement of resources outside the principal activity of the enterprise, this problem should be avoided. Alternatively, it is redundant if it is desirable to include this 'exspansibility' in performance measures.

These approaches are merely possible solutions to some of the asserted problems. While all of the problems need to be tested, only two areas of possible significance are considered in the following empirical analysis of the organisational forms of owner-managed firms: liability for debts, and the identification of relevant assets.³

Data

Data were obtained for 186 bank⁴ business-loan clients that were subject to loan recovery action during 1986–88. The sample represents all closed loan-recovery files for the period, with the inclusion of open files determined by their availability (i.e., some files were in use by bank officers, and so unavailable during data collection). Some firms represent double counting in that a number were the product of tax planning through the use of trusts and associated companies. Indeed, 28 of the identified entities related to only 12 businesses. Consolidation of multiple agencies reduces the number of owner-managed firms to 170, described in Table I. Consolidated groups that included a trust are categorised as trusts.

A second sample of bank loan clients was taken from active files at bank branches, with selection

TABLE I
Sample of recovery-action bank clients

	n	o-m = 1 ^a	o-m = 2	o-m > 2
Sole traders	27	27 (100%)	0 (0%)	0 (0%)
Partnerships	51	35 (69%)	16 (31%)	0 (0%)
Companies	73	51 (70%)	16 (22%)	6 (8%)
Trusts	19	15 (79%)	3 (16%)	1 (5%)
Overall	170	128 (75%)	35 (21%)	7 (4%)

^a o-m = owner-manager

determined by availability of the file at the time of data collection. With this qualification, the sample of 175 firms represented the complete small business loan clients of two branches of the bank. The sample is described in Table II. All firms operating through trusts used companies as trustees, and so are frequently combined as 'incorporated firms' in later analyses.

TABLE II
Sample of 'healthy' bank clients

	n	o-m = 1 ^a	o-m = 2	o-m > 2
Sole traders	27	27 (100%)	0 (0%)	0 (0%)
Partnerships	29	16 (56%)	12 (41%)	1 (3%)
Companies	84	53 (63%)	22 (26%)	9 (11%)
Trusts	35	23 (66%)	6 (17%)	6 (17%)
Overall	175	119 (68%)	40 (23%)	16 (9%)

^a o-m = owner-manager

Financial profiles of the sample firms should be largely irrelevant, given the arguments presented in this paper. Nonetheless, some data was obtained for the healthy sample firms to give some indication of the scale of businesses under consideration. In 1988 sales ranged from \$4,500 to \$5 million, with a mean of approximately \$775,000. Total assets ranged from nil to \$7.8 million, with a mean of approximately \$400,000. For the failed sample, such data are misleading, as most firms were in decline over several years, with different failure periods. Therefore, the analysis can not be duplicated for this sample.

The choice of organisational form and number of owner-managers

Bank records for the non-soletraders indicate most (71 percent) had only one effective owner-manager. In such cases, equity holders were either nominal, or silent partners (usually immediate family members). While it is possible for firms claiming to be soletraders to have more than one effective owner-manager, the available data did not indicate any such cases. In each of the 42 effective partnerships, partners tended to be closely related.

The predominance of partnerships, companies

and trusts with only one owner-manager suggests incorporation is not generally motivated by raising equity or managing genuine partnerships. Incorporated firms comprise 64 percent of non-soletraders, and 62 percent of such firms with two or more owner-managers. Generally there are no significant differences in the number of owner-managers and the adopted organisational type. Considering only partnerships and incorporated firms, the choice of structure is significant (at 0.05 level) only where the number of owner-managers exceeds two, suggesting that as the ownership of firms becomes broader, the use of incorporated structures increases. While this may offer intuitive appeal (that is, the propensity to incorporate is size related) the remaining analysis does not support this argument in general. Note that it does not relate to the size of firm in the usual sense. It merely relates to the nominal number of owner-managers, which for these samples had no significant correlation with any of the traditional measures of firm size. This result is not supported by the 'healthy' sample, where all comparisons are insignificant. The implications of this difference are not clear, with competing possible explanations. For example it may relate to owners anticipating greater riskiness of the failed firms. This in itself is an interesting proposition warranting further investigation elsewhere. Alternative explanations may include possible sampling bias and differing behavioural types for owner-managers.

Limited liability and personal guarantees

The argument that incorporation is more likely related to limiting liability than some other purpose can be tested partly by examining how often it succeeds or fails as a liability barrier. To examine the significance of incorporation for limited liability purposes, it is appropriate to consider the number of times incorporated individuals had to sacrifice personal assets. Although there is some evidence that individuals frequently sell off various personal assets in order to preserve their equity in their private residence, data on this activity are incomplete. Therefore, we will focus on the use of personal guarantees to circumvent limited liability barriers, and the instances where the private residence was sold in order to satisfy

the debts of the incorporated firm, relative to other business types. On its own, such a test may be indicative but not conclusive. It should be noted that not all guarantees are secured, and those that are secured are not necessarily secured on a residence or other real estate. Nine cases of personal guarantees of debt were noted for failed incorporated firms where there was no house to lose. There were several instances where directors' guarantees did not refer to any particular security. In some cases, recovery actions were continuing, or information was inadequate for this purpose, requiring the additional groupings in Table III.

For known outcomes where there was a house to lose, there is no significance in differences for associated 'lost house' between incorporated and unincorporated firms, suggesting incorporation does not provide a reduction in the risk to personal assets under bank finance. For the 92 failed incorporated firms, the bank was observed to hold personal guarantees for at least 67 (73 percent) of them. There were only five observed cases where the bank did not hold guarantees. Three were attributed to procedural errors by bank employees, and the others were unexplained, although subsequently criticised by case-review officers. For the remaining 20 cases, data is incomplete.

To test whether sampling bias could induce the above result (such as if the failed trusts/companies were appraised as higher risk in the loan process,

thus inducing personal guarantees with different treatment being accorded trust/companies perceived as less risky) an examination of the non-failed incorporated bank clients for the nature of the security held by the bank, yielded the results for each of the two branches described in Table IV. These represent some disparity in the quality of data obtainable from the different branches, with Branch 1 data being substantially incomplete for loan security details for 43 percent of cases. Based on Branch 2 only, we find that personal guarantees were required in at least 80 percent of cases. Overall, the results suggest there is no bias in the prevalence of personal guarantees on trust or company debt for failed firms relative to healthy firms.

There are several important qualifications attaching to these results. First, losses sustained by unsecured creditors in the above cases of failed firms are not known. Second, as noted for some cases, the existence of a directors' guarantee does not necessarily mean that the owner-manager has any significant personal assets to risk. Third, all guarantees have limits; that is, the guarantee is for a specified maximum amount, and debts exceeding that limit are not covered (of course, lenders seeking such security logically seek to eliminate any exposure). The first and third of these riders may substantially qualify the results, as the value of limited liability cannot be completely dis-

TABLE III
Incidence of failed owner-managers losing private residence

	sole trader		partnership		total unincorp		trusts & companies		overall	
	n	%	n	%	n	%	n	%	n	%
<i>Known outcome:</i>										
Lost house	7	64	26	79	33	75	28	62	61	69
Retained house	4	36	7	21	11	25	17	38	28	31
	11	100	33	100	44	100	45	100	89	100
No house to lose	8		7		15		9		24	
	19		40		59		54		113	
<i>Unknown outcome:</i>										
Insufficient data	4		4		8		19		27	
Case continuing	4		7		11		19		30	
	27		51		78		92		170	

TABLE IV
Incidence of personal guarantees for 'healthy' incorporated firms

	Branch 1 n	%	Branch 2 n	%	Total n	%
Personal guarantees included in security	36	55	43	80	79	66
No guarantees held	1	2	6	11	7	6
Data incomplete for securities	28	43	5	9	37	31
	65	100	54	100	119	100

counted. The likely value to the owner-manager may be in relation to unsecured creditors. However, to test this is beyond the scope of this paper, due to current data restrictions.

Disclosure of assets and debts in the owner-managed firm

In addition to this apparent failure of the limited liability notion as support for the relevance of organisational boundaries, we are concerned with whether or not accounting disclosures for owner-managed firms pay 'appropriate' heed to the entity boundaries. This is examined by looking for evidence of the use of 'personal' assets or debts in the business, without attributing them to the firm, and attributing assets or liabilities to the firm that pertain to personal consumption.

Attributing/disclosing assets

An obvious instance where assets may not be attributed to the firm is where the owner-manager does not associate them with the firm's operations. For example, when the owner-manager of a company provides a substantial personal guarantee for company debt supported by some security. While the collateral is not employed operationally in the business, it is at risk as a result of the firm's activities. In such cases, neither the security arrangement, nor the asset providing the security for the firm's debt, is disclosed in the company's accounts. This also applies to unincorporated firms; in such cases, however, the situation is more apparent as the owner-manager isn't merely guaranteeing the debt, but is the formal borrower. Thus, all assets of the owner-manager of an unincorporated firm are potentially at risk. The

risk to an aggregate asset base at any one time is, of course, dependent on the level of debt. This does not mean that the dollar value of debt can be interpreted as a measure of the value of risked assets. If the intention in performance evaluation is to relate the investment base, risk and return, inappropriate representations of investment bases may be derived if the level of assets risked by the enterprise is not known. The extent of personal guarantees provided for company debt discussed above indicates that this issue is unlikely to be trivial.

Also of interest is the prevalence of assets, in addition to those supporting guarantees, being risked by the owner-manager. However, available data does not readily permit identification of such assets. The few cases in which such information was available mostly involved loan defaults that resulted in bankruptcy petitions, allowing some such assets to be identified from the statements of position, and liquidators' reports. Unfortunately, the data was too erratic and incomplete to be particularly informative beyond allowing us to note that there is *some* evidence of assets employed in businesses not appearing in the business balance sheet for at least some failed businesses. Anecdotally, instances of undisclosed assets included:

- A bank file note indicating that a company's negative net asset figure was inappropriate for loan analysis as the business' major asset (a nursing home) was held privately by the two owner-managers (a 'healthy' sample firm).
- A storage facility constructed on the owner-manager's residential property was omitted from the company's balance sheet (from a liquidator's report).

- Two instances in which delivery vehicles used extensively in businesses were not in the balance sheets of the two non-incorporated firms. (One disclosed in a refinancing application, the other in a receiver's report).
- Land apparently held for further commercial development not disclosed in the balance sheet of the non-incorporated firm. (Eventually disclosed in a loan application to finance the development, made necessary by the business' expansion).

Attributing/disclosing liabilities

More apparent than undisclosed assets were undisclosed debts. An aspect of debt was broached in the earlier consideration of limited liability and personal guarantees, pertaining to the treatment of collateral assets under guarantee arrangements not operationally employed in the business. Concern here is with two other aspects of debts. One is where debts are incurred by individuals as a direct result of the business undertaking, but treated as private and so omitted from the financial statements. The other is debts in the financial accounts of a business that are of the nature of personal debt, and do not directly relate to a business' operations.

The most difficult aspect of this situation is identifying causation. For instance, in establishing a business, individuals frequently borrow against their residence. As already observed, this is usually through a personally guaranteed business loan in cases where the business is operated through a company structure, which appropriately attributes the debt to the firm, but not the total collateral. Difficulties may arise in cases where the firm is not incorporated. Such loans may or may not be included in the business accounts. A possible concern, for example, is where the mortgage loan already exists as a housing loan, with either the repayment schedule modified as a result of the business, or where some or all of the paid-down loan is reborrowed under the original instrument to finance the business undertaking, usually to avoid new loan fees, security costs and the like. The interest rate charged in such cases is likely to be dependent on the bank's attitude, but may also provide incentive for this arrangement. For unincorporated firms, the borrowings may be

either undisclosed, channelled through the owners' capital accounts, or appropriately included in the business' accounts (but without the collateral asset) for the reborrowed sum, or for the total debt, including that component considered private. Such situations may also arise with incorporated businesses, with the additional treatment where loan funds are channelled through unsecured shareholders' or directors' loan accounts.

In the previously described data sets, mortgage loans and the related interest on owner-managers' residence are typically treated as private — at least in relation to the financial statements in the bank files. Such treatment of privately derived debt is inevitable for incorporated firms given the legal boundaries, but is largely elective for other organisational forms. The reasons for such elections may be several, but could reasonably include:

- the owner-manager and/or preparer of the accounts believed it inappropriate, due to either accounting practice or perceived economic reality, to include such debts in the firm's accounts; or
- did not *want* the debt attributed to the firm.

In the case of debt established directly to fund the firm, the latter of these possible explanations appears the most likely. There are at least two possible motives for such a choice. It may relate to some aspect of tax planning, such as taking advantage of differing marginal tax rates between individuals, and/or individuals and a company, or it may indicate a desire to minimise disclosed debt.

Alternatively, individuals may endeavour to represent loans effectively borrowed for personal consumption as business loans. The primary incentive for such a scheme is usually to capture tax relief on interest.⁵ Disregard for the organisational boundaries of the firm thus may be incidental to the owner-manager's purpose. Again, the available data permits few generalisations. However, several observed instances of questionable debt attribution by both failed and healthy firms were noted:

- Four instances in which personal loans that had been obtained to purchase assets (mostly motor vehicles), which were later introduced into the (unincorporated) business as assets, but without the associated debt.

- Two cases in which debts, secured by mortgages against residences, although clearly borrowed in earlier businesses since sold by the owner-managers, later appeared in the financial statements of a 'new' (non-incorporated) business.⁶
- Five instances in which funds were borrowed through the business (both incorporated and unincorporated) to refinance existing debts, where the latter included housing loans or previously attributed personal loans.

Conclusions

The main objective of this paper was to provide some empirical support for doubts concerning the meaningfulness of selected organisational types and implied boundaries for owner-managed firms. Despite the data limitations, it is reasonable to question the relevance of organisational boundaries for owner-managed firms on at least two points.

First, the relevance of limited liability of an incorporated owner-managed business is largely eroded, with the effective subversion of the legal barrier through the use of personal guarantees on company debt. There are two caveats to this conclusion: the extent to which a debt exceeds the agreed amount of any guarantee, and the position of unsecured creditors. Arguments that incorporated structures are generally employed for managing complex associations or as equity raising vehicles seem improbable given the extensive use of such structures in businesses that are essential sole traders.

Second, owner-managers appear to discount or ignore organisational boundaries in their disposition of assets and debts between personal consumption and the business. Data limitations prevent investigation of the extent and significance of this behaviour at this stage. However, this proposition warrants further research.

The extent of possible sampling bias is indeterminate. It is possible but improbable that the bank's clients are not typical of owner-managed firms. Alternatively, the information supplied to the bank by the clients may not typify their behaviour in relation to other parties, such as the Australian Taxation Office, or potential purchasers of the business.

Except for the observed tendency for failed firms to adopt an incorporated form when the number of owner-managers exceeded two, there were no observable differences between failed and non-failed firms, regarding the above findings.

These results may have implications for several areas of owner-managed small business research, including analyses employing traditional accounting disclosures individually or in aggregate (for example, performance and debt analysis, and statistical aggregation employing debt and/or asset measures), and fundamental studies that view the firm to be defined by some formal organisational structure.

Notes

¹ These studies are referenced for exemplification only. They have not been selected for criticism.

² Informal borrowing capacity refers to capacity not yet established with (recognised by) any lender. Established capacity is in the form of unused overdraft limits, approved but undrawn advance accounts, and the like.

³ This restriction of scope is due solely to data limitations.

⁴ Access to the data was on the basis that the bank not be identified. It is, however, a significant Australian bank in both corporate and retail banking. All bank finance was floating rate (overdraft and loans). Loan periods varied across firms, with varying times to expiration. Types of businesses varied considerably, with insufficient numbers of any one type to permit testing for industry differences.

⁵ Interest on personal residential loans does not attract any tax relief in Australia.

⁶ The only implication of this situation concerns consistency in the treatment of the business unit. Certainly the new unit had no association with the cause of the debt, other than having the same owner-manager. Yet the debt, noted as a business debt by the owner-manager, was immediately attributed to the firm, while in unrelated cases where there appeared to be a much stronger causal link between the business and various debts, the debts did not appear in the firms' financial statements.

References

- Alchian, A. A. and H. Demsetz, 1972, 'Production, Information Costs, and Economic Organisation', *American Economic Review* **LXII**(5), 777–795.
- Cragg, P. B. and M. King, 1988, 'Organisational Characteristics and Small Firm's Performance Revisited', *Entrepreneurship Theory and Practice* **13**(2), 49–64.
- Coase, R. H., 1937, 'The Nature of the Firm', *Economica*, New Series IV, 386–405.
- Cooley, P. L. and C. E. Edwards, 1983, 'Financial Objectives of Small Firms', *American Journal of Small Business* **VIII**(1), 27–31.

- DeThomas, A. R., 1985, 'Valuing the Ownership Interest in the Privately-Held Small Firm', *American Journal of Small Business* IX(3), 50—9.
- Fisher, F. M. and J. J. McGowan, 1983, 'On the Misuse of Accounting Rates of Return to Infer Monopoly Profits', *The American Economic Review* 73(1), 82—97.
- Jensen, M. C. and W. H. Meckling, 1976, 'Theory of the Firm: Managerial Behaviour, Agency Costs and Ownership Structure', *Journal of Financial Economics* 3, 305—360.
- Kay, J. A. and C. P. Mayer, 1986, 'On the Application of Accounting Rates of Return', *The Economic Journal* 96, 199—207.
- McIntyre, E. V. and J. D. Icerman, 1985, 'The Accounting Rate of Return — Appropriate for Small Business?', *American Journal of Small Business* IX(3), 41—9.
- Penrose, E. D., 1959, *The Theory of the Growth of the Firm*, Oxford: Basil Blackwell.

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