

## On the Determinants of SME Cash Holdings: Evidence from Spain

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### Abstract

**Abstract:** This work analyses the factors that might explain the level of cash holdings in a sample of 860 small and medium-sized firms from Spain during the period 1996–2001. The empirical results show that firms have a target cash level to which they attempt to converge. The level of this target is higher for firms with more growth opportunities and larger cash flows. In contrast, the target level for cash holdings falls when the use of bank debt and the presence of substitutes for cash increase. Moreover, when the interest rates in the economy increase firms reduce their cash holding.

### REFERENCES

Almeida, H., M. Campello and M. S. Weisbach (2004), 'The Cash Flow Sensitivity of Cash', *Journal of Finance*, Vol. 54, pp. 1777–804.

 | [Google Scholar](#) |

Altman, E. (1968), 'Financial Ratios, Discriminant Analysis and the Prediction of the Corporate Bankruptcy', *Journal of Finance*, Vol. 23, pp. 589–609.

 | [Web of Science®](#) | [Google Scholar](#) |

Anderson, T. W. and C. Hsiao (1982), 'Formulation and Estimation of Dynamic Models Using Panel Data', *Journal of Econometrics*, Vol. 18, pp. 47–82.

 | [Web of Science®](#) | [Google Scholar](#) |

Arellano, M. and S. Bond (1991), 'Some Tests of Specification for Panel Data: Monte Carlo Evidence and an Application to Employment Equations', *Review of Economics Studies*, Vol. 58, pp. 277–97.

Arellano, M. and O. Bover (1990), 'La Econometría de Datos de Panel', *Investigaciones Económicas*, Vol. 14, pp. 3-45.

[Google Scholar](#)

---

Baltagi, B.H. (2001), *Econometric Analysis of Panel Data* (John Wiley & Sons, Chichester ).

[Google Scholar](#)

---

Baskin, J. (1987), 'Corporate Liquidity in Games of Monopoly Power', *Review of Economics and Statistics*, Vol. 69, pp. 312-19.

[Web of Science®](#) | [Google Scholar](#)

---

Baumol, W. J. (1952), 'The Transactions Demand for Cash: An Inventory Theoretic Approach', *Quarterly Journal of Economics*, Vol. 65, pp. 545-56.

[Web of Science®](#) | [Google Scholar](#)

---

Begley, J., T. Ming and S. Watts (1996), 'Bankruptcy Classification Errors in the 1980s: Empirical Analysis of Altman's and Ohlsons Models', *Accounting Studies*, Vol. 1, pp. 267-84.

[Google Scholar](#)

---

Berger A. N. and G. F. Udell (1998), 'The Economics of Small Business Finance: The Roles of Private Equity and Debt Markets in the Financial Growth Cycle', *Journal of Banking and Finance*, Vol. 22, pp. 613-73.

[Web of Science®](#) | [Google Scholar](#)

---

Berger A. N. and G. F. Udell (2003), 'Small Business and Debt Finance', in, Z. J. Acs and D. B. Audretsch (eds.), *Handbook of Entrepreneurship* (Kluwer Academic Publishing).

[Google Scholar](#)

---

Berger, A., F. Klapper and G. Udell (2001), 'The Ability of Banks to Lend to Informationally Opaque Small Businesses', *Journal of Banking and Finance*, Vol. 25, pp. 2127-67.

[Web of Science®](#) | [Google Scholar](#)

---

Boyd, J. and E. C. Prescott (1986), 'Financial Intermediary-Coalitions', *Journal of Economic Theory*, Vol. 38, pp. 211-32.

[Web of Science®](#) | [Google Scholar](#)

Cole, R. (1998), 'The Importance of Relationships to the Availability of Credit', *Journal of Banking and Finance*, Vol. 22, pp. 959–77.

[Web of Science®](#) | [Google Scholar](#)

---

De Bodt, E, F. Lobez and J. Statnik (2001), 'Credit Rationing, Customer Relationship and the Number of Banks: An Empirical Analysis', Working Paper (SSRN Electronic Library).

[Google Scholar](#)

---

Diamond, D. (1984), 'Financial Intermediation and Delegated Monitoring', *Review of Economic Studies*, Vol. 51, pp. 393–414.

[Web of Science®](#) | [Google Scholar](#)

---

Dittmar, A., J. Mahrt-Smith and H. Servaes (2003), 'International Corporate Governance and Corporate Cash Holdings', *Journal of Financial and Quantitative Analysis*, Vol. 38, pp. 111–33.

[Web of Science®](#) | [Google Scholar](#)

---

Faulkender, M. (2004), 'Cash Holding Among Small Businesses', Working Paper (SSRN Electronic Library).

[Google Scholar](#)

---

Fazzari, S. M. and B. Petersen (1993), 'Working Capital and Fixed Investment: New Evidence on Financing Constraints', *Rand Journal of Economics*, Vol. 24, pp. 328–42.

[Web of Science®](#) | [Google Scholar](#)

---

Ferreira, M. A. and A. Vilela (2004), 'Why do Firms Hold Cash? Evidence from EMU Countries', *European Finance Management*, Vol. 10, pp. 295–319.

[Google Scholar](#)

---

Flannery, M. J. (1986), 'Asymmetric Information and Risky Debt Maturity Choice', *Journal of Finance*, Vol. 41, pp. 19–37.

[Web of Science®](#) | [Google Scholar](#)

---

Guedes, J. and T. Opler (1996), 'The Determinant of the Maturity of Corporate Debt Issues', *Journal of Finance*, Vol. 51, pp. 1809–33.

[Web of Science®](#) | [Google Scholar](#)

---

Guney, Y., A. Ozkan and N. Ozkan (2003), 'Additional International Evidence on Corporate Cash Holding', Working Paper (SSRN Electronic Library).

[Google Scholar](#)

---

Harhoff, D. and T. Körting (1998), 'Lending Relationships in Germany – Empirical Evidence from Survey Data', *Journal of Banking and Finance*, Vol. 22, pp. 1317–53.

[Web of Science®](#) | [Google Scholar](#)

---

Harris, M. and A. Raviv (1990), 'Capital Structure and the Informational Role of Debt', *Journal of Finance*, Vol. 45, pp. 321–49.

[Web of Science®](#) | [Google Scholar](#)

---

Hsiao, C. (1985), 'Benefits and Limitations of Panel Data', *Econometrics Review*, Vol. 4, pp. 121–74.

[Web of Science®](#) | [Google Scholar](#)

---

Jensen, M. C. (1986), 'Agency Costs of Free Cash Flow, Corporate Finance and Takeovers', *American Economic Review*, Vol. 76, pp. 323–39.

[Web of Science®](#) | [Google Scholar](#)

---

John, T. C. (1993), 'Accounting Measures of Corporate Liquidity, Leverage and Costs of Financial Distress', *Financial Management*, Vol. 22, pp. 91–100.

[Web of Science®](#) | [Google Scholar](#)

---

Jordan, J., J. Lowe and P. Taylor (1998), 'Strategy and Financial Policy in UK Small Firms', *Journal of Business, Finance & Accounting*, Vol. 25, pp. 1–27.

[Google Scholar](#)

---

Kale, J. R. and T. H. Noe (1990), 'Risk Debt Maturity Choice in a Sequential Game Equilibrium', *Journal of Financial Research*, Vol. 13, pp. 155–65.

[Web of Science®](#) | [Google Scholar](#)

---

Kim, C. S., D. Mauer and A. E. Sherman (1998), 'The Determinants of Corporate Liquidity: Theory and Evidence', *Journal of Financial and Quantitative Analysis*, Vol. 33, pp. 335–59.

[Web of Science®](#) | [Google Scholar](#)

---

Kremp, E., E. Stöss and D. Gerdesmeier (1999), 'Estimation of a Debt Function: Evidence from French and German Firm Panel Data: en Sauv ', in A. Y M. Scheuer (eds.), *Corporate Finance in Germany and France: A Joint Research Project of the Deutsche Bundesbank and the Banque de France* (Deutsche Bundesbank and Banque de France ), pp. 139–94.

[Google Scholar](#)

---

La Porta, R., F. Lopez de Silanes, A. Shleifer and R. Vishny (1997), 'Legal Determinants of External Finance', *Journal of Finance*, Vol. 52, pp. 1131-50.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Leland, H. and D. Pyle (1977), 'Informational Asymmetries, Financial Structure, and Financial Intermediation', *Journal of Finance*, Vol. 32, pp. 371-87.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Meltzer, A. H. (1993), 'The Demand for Money: A Cross-Section Study for Business Firms', *Quarterly Journal of Economics*, Vol. 77, pp. 405-22.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Miller, M. H. and D. Orr (1966), 'A Model of the Demand for Money by Firms', *Quarterly Journal of Economics*, Vol. 80, pp. 413-35.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Mulligan, C. B. (1997), 'Scale Economies, the Value of Time, and the Demand for Money: Longitudinal Evidence for Firms', *Journal of Political Economy*, Vol. 105, pp. 1061-79.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Myers, S. C. (1977), 'Determinants of Corporate Borrowing', *Journal of Financial Economics*, Vol. 5, pp. 147-75.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Myers, S. C. and N. S. Majluf (1984), 'Corporate Financing and Investment Decisions when Firms Have Information that Investors Do Not Have', *Journal of Financial Economics*, Vol. 20, pp. 293-315.

 | [Google Scholar](#) |

---

Opler, T., L. Pinkowitz, R. Stulz and R. Williamson (1999), 'The Determinants and Implications of Corporate Cash Holdings', *Journal of Financial Economics*, Vol. 52, pp. 3-46.

 | [Web of Science®](#) | [Google Scholar](#) |

---

Opler, T., L. Pinkowitz, R. Stulz and R. Williamson (2001), 'Corporate Cash Holdings', *Journal of Applied Corporate Finance*, Vol. 14, pp. 55-66.

 | [Google Scholar](#) |

Ozkan, A. and N. Ozkan (2004), 'Corporate Cash Holdings: An Empirical Investigation of UK Companies', *Journal of Banking and Finance*, Vol. 28, pp. 2103-34.

[Web of Science®](#) | [Google Scholar](#)

---

Petersen, M. A. and R. G. Rajan (1994), 'The Benefits of Lending Relationships: Evidence from Small Business Data', *Journal of Finance*, Vol. 43, pp. 9-26.

[Google Scholar](#)

---

Petit, R. R. and R. F. Singer (1985), 'Small Business Finance: A Research Agenda', *Financial Management*, Vol. 14, pp. 47-60.

[Web of Science®](#) | [Google Scholar](#)

---

Pinkowitz, L., R. Stulz and R. Williamson (2003), 'Do Firms in Countries with Poor Protection of Investor Rights Hold More Cash?' SSRN Working Paper.

[Google Scholar](#)

---

Rajan, R.G. and L. Zingales (1995), 'What do we Know about Capital Structure? Some Evidence from International Data', *Journal of Finance*, Vol. 50, pp. 1421-60.

[Web of Science®](#) | [Google Scholar](#)

---

Sargan, J. D. (1958), 'The Estimation of Economics Relationships Using Instrumental Variables', *Econometrica*, Vol. 26, pp. 393-415.

[Web of Science®](#) | [Google Scholar](#)

---

Scherr, F. C. and H. M. Hulburt (2001), 'The Debt Maturity Structure of Small Firms', *Financial Management*, Vol. 30, pp. 85-111.

[Web of Science®](#) | [Google Scholar](#)

---

Shleifer, A. and R. W. Vishny (1992), 'Liquidation Values and Debt Capacity: An Equilibrium Approach', *Journal of Finance*, Vol. 47, pp. 1343-66.

[Web of Science®](#) | [Google Scholar](#)

---

Stiglitz, J. (1974), 'On the Irrelevance of Corporate Financial Policy', *American Economic Review*, Vol. 64, pp. 851-66.

[Web of Science®](#) | [Google Scholar](#)

Stohs, M. H. and D. C. Mauer (1996), 'The Determinants of Corporate Debt Maturity Structure', *Journal of Business*, Vol. 69, pp. 279–312.

[Web of Science®](#) | [Google Scholar](#)

Titman, S. and R. Wessels (1988), 'The Determinants of Capital Structure Choice', *Journal of Finance*, Vol. 43, pp. 1–19.

[Web of Science®](#) | [Google Scholar](#)

Warner, J. B. (1977), 'Bankruptcy Costs: Some Evidence', *Journal of Finance*, Vol. 32, pp. 337–47.

[Web of Science®](#) | [Google Scholar](#)

Watson, R. and N. Wilson (2002), 'Small and Medium Size Enterprise Financing: A Note on Some Empirical Implications of a Pecking Order', *Journal of Business, Finance & Accounting*, Vol. 29, pp. 557–78.

[Google Scholar](#)

Whited, T. M. (1992), 'Debt, Liquidity Constraints, and Corporate Investment: Evidence from Panel Data', *Journal of Finance*, Vol. 47, pp. 1425–60.

[Web of Science®](#) | [Google Scholar](#)

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