

## Development Finance Working Paper Series<sup>1</sup>

# A Cross Sectional Study of the Capital Structures of Firms Listed on the JSE

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<sup>1</sup> **Note:** The findings from this working paper does not in any way reflect the views of the Development Finance Centre (DEFIC). The views are only representative of the authors.

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# A Cross Sectional Study of the Capital Structures of Firms Listed on the JSE

Henry McGregor & Abdul Latif Alhassan

## Abstract

This study examines the capital structure differences across industry classification for 221 firms listed on the Johannesburg Stock Exchange, from 2007 to 2016. A panel multiple regression model which considers the determinants of capital structure was used to identify the effect of firm level characteristics on the capital structure across the industrial sectors. The findings indicate that firms in the health care services, utilities and industrial sectors employ a higher percentage of leverage in the mix of capital, compared to the others. From the panel regression analysis, asset tangibility, profitability and firm size were found to have a significant effect on total debt, with varying effects observed for long-term and short-term debt. On the industrial determinants of capital structure, firms in the basic material industry, total debt ratio is mainly determined by the fixed-asset ratio, indicating that firms in this sector rely on tangibility of assets to secure debt financing. Profitability has a negative relationship with total debt, indicating possibly the presence of the pecking order theory. The consumer goods and consumer service industry firms' leverage ratios are mainly determined by the firms' profitability. The health care industry shows signs of the Trade-off Theory being present as the main determinant, being the effective tax rate, which has an inverse relationship with the total debt ratio. The industrial industry has an inverse relationship with profitability, also indicating a possible pecking order theory at play. The main determinants for the technology industry are asset tangibility, profit and the effective tax rate. The telecommunication industry determinant of total debt was profitability.

**Keywords:** Capital Structure | JSE | South Africa |