

**UNIVERSITY OF THE WITWATERSRAND
JOHANNESBURG**



School of Mechanical, Industrial and Aeronautical Engineering

Dissertation Title:

A Comparison of Non-Competitive Tender Prices in the South African Public
Procurement Sector to Identify Pricing Deviations

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Abstract

The South African Public Procurement system is riddled with corruption issues, including above-market price inflations of goods and services acquired. The reviewed literature revealed there are inadequate tools/indices readily available to flag such procurements individually. As such, the study aimed to remedy this shortfall by creating a cost comparison model through benchmarking municipal procurement prices to identify specific cases of pricing deviations.

This was achieved by using multiple linear regression to create a municipal market-value price prediction model for low valued, non-competitive *fencing supply and installation* procurements. It was assumed clean audited municipalities had a true market value for the topic contract to which the model training data was collected from seventeen clean audited municipalities in the Republic of South Africa.

The developed model was used to assess how contracts from five Gauteng non-clean audited municipalities would have been priced should they have been issued through a clean audited municipality and by what margin, if any, was the pricing deviation. Participation in the study was voluntary for the approached governmental entities, and all samples were collected based on the *quota sampling method*.

The cost comparison model was developed successfully and contrary to the expected outcomes had depicted that non-clean audited municipalities procured the topic contract at a lower price than clean audited municipalities. No correlation was found between the clean audit status of a municipality and the pricing of their non-competitive contracts. Furthermore, the model revealed it is possible to individually compare public procurements from different governmental organisations to identify pricing deviations.

Keywords: *Multiple Linear Regression, Pricing Deviations, Price Inflations, Public Procurement, Benchmarking*