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AIMS Energy  
Volume 6, Issue 3, 2018, Pages 487-504

## A three-way analysis of the relationship between the USD value and the prices of oil and gold: A wavelet analysis (Article)

Altarturi, B.H.M.<sup>a</sup>, Alshammari, A.A.<sup>a</sup>, Saiti, B.<sup>b</sup>, Erol, T.<sup>b</sup>

<sup>a</sup>Institute of Islamic Banking and Finance, International Islamic University Malaysia, Kuala Lumpur, Malaysia

<sup>b</sup>Istanbul Sabahattin Zaim University, Istanbul, Turkey

### Abstract

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This study examines the relationships among oil prices, gold prices, and the USD real exchange rate. It adopts the wavelet approach as a nonlinear causality technique to decompose the data into various scales over time. Higher-order coherence and partial coherence were used to identify the lead-lag effect and mutual coherence function among the variables. The results show that changes in the USD exchange rate influence the prices of oil and gold negatively in the short- and medium-term. While in the long-term, the oil price has a negative impact on the value of the USD. Oil and gold are significantly linked and correlated because their prices are determined in USD. The findings of this paper have significant implications, particularly for risk management. © 2018 the Author(s).

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### Author keywords

[Gold prices](#) [Oil prices](#) [Partial wavelet coherence](#) [U.S. dollar value](#) [Wavelet](#)

ISSN: 23338326

Source Type: Journal

Original language: English

DOI: 10.3934/energy.2018.3.487

Document Type: Article

Publisher: AIMS Press

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