Etihad: Journal of Islamic Banking and Finance
P-ISSN 2807-730X, E-ISSN 2807-6915
Volume 5 Issue 2, July - Desember 2025
https://jurnal.iainponorogo.ac.id/index.php/etihad

A World on Fire, Markets in Turmoil: Uncovering the Resilience of Islamic Stocks Amid Global Conflict

Fuad Hasyim[1*], Budi Sukardi[2], Yuni Astuti[3]
[1,2,3] UIN Raden Mas Said, Surakarta, Indonesia
E-mail: fuad.hasyim@staff.uinsaid.ac.id, budi.sukardi@staff.uinsaid.ac.id, yuni.astuti@staff.uinsaid.ac.id

Article Info

Article history:
Received September 06, 2025
Revised October 27, 2025
Accepted December 02, 2025

*Corresponding author email : fuad.hasyim@staff.uinsaid.ac.id

Keywords:
Geopolitical risk, EGARCH, Market volatility, Financial resilience

Abstract

Introduction: Geopolitical conflicts that have occurred since 2023, especially between Israel and Palestine, and Israel and Iran, have created significant pressure on global financial market stability. This study evaluates and compares the response and volatility of Islamic stock indices (the Dow Jones Islamic Market) and conventional stock indices (the MSCI World) to those of two major geopolitical events. **Research Methods:** Using the event-based EGARCH(1,1) model and daily data for the period from January 2023 to June 2025, this study also included macroeconomic control variables such as VIX, USDX, gold prices, and oil prices in the analysis. **Results:** The results show that DJIM tends to be more responsive to global risk indicators (such as VIX and USDX), but relatively stable to the direct impact of conflict, while the MSCI World shows greater sensitivity to oil price fluctuations. Both indices show persistent and asymmetric volatilities. However, DJIM exhibits a stronger stability in the face of external uncertainty. **Conclusion:** This study makes an important contribution to the understanding of the resilience of the Sharia market and offers a new methodological approach for examining the dynamics of global conflict. These findings are relevant for investors, regulators, and policymakers to build more resilient and ethical investment strategies.

DOI: 10.21154/etihad.v5i2.11942
Page: 118 - 129

INTRODUCTION

Since the beginning of 2023, the global financial system has experienced significant shocks triggered by two major geopolitical conflicts: the escalation between Israel and Palestine on October 7, 2023, and the outbreak of military conflict between Israel and Iran on June 13, 2024. Both crises deepened market uncertainty, causing the flow of funds out of risky assets to traditional safe havens, such as gold, the U.S. dollar, and government bonds. Sharp spikes in global volatility indices, such as the VIX and OVX, reflect investors' increasing sensitivity to conflict-based risks, accompanied by increased demand for hedging instruments (Alsadan et al., 2025; Khan, 2025; Tronzano, 2020). At the macroeconomic level, both conflicts coincide with declining investments and rising private savings, reflecting a widespread and cautious response to geopolitical uncertainty (Ji, 2025; Yu & Wang, 2023).

Although various academic studies have documented the impact of geopolitical crises on stock market volatility, such as 9/11, Brexit, and Russia–Ukraine conflicts, most are still fragmentary (Alsadan et al., 2025; Biswas et al., 2024; Khan, 2025). It generally focuses on only one conflict in a single region and is limited to conventional stock indices, such as the S&P 500 or MSCI World. Meanwhile, global Sharia indices such as the Dow Jones Islamic Market (DJIM), which has a financial structure based on Islamic principles such as the prohibition of usury, avoidance of unethical sectors, and debt restrictions, are still rarely used as the main object of study (Sakinç, 2021; Shamsuddin, 2014). In fact, these features theoretically offer structural stability that can protect against systemic shocks.

Some early studies have partially supported the Sharia market resilience hypothesis. For example, Sharia stocks in Indonesia showed relative resilience during the Israeli-Palestinian conflict (Hasyim, Qomar, et al., 2024), and investors' reactions to geopolitical sentiment in Sharia indices were more moderate (Setianingsih et al., 2024). However, in some fragile regions, markets remain heavily affected by global tensions even though the market structure is based on Islamic norms (Naeem et al., 2024). These inconsistencies highlight the need for a more comprehensive and data-driven analysis of the world.

Methodologically, the Exponential GARCH (EGARCH) model has proven effective in measuring asymmetrical volatility dynamics, allowing for differentiation between the market's responses to negative and positive shocks (Okpara & Henry, 2025; Tabash et al., 2024). This model has been applied in various contexts such as commodity prices, equity futures contracts, and renewable energy in uncertain policy situations (Appiah-Otoo, 2021; Dinku & Gardachw, 2022; Wu et al., 2022). However, EGARCH is still rarely used systematically to study Islamic stock indices, especially in the context of geopolitical events, although this approach is particularly relevant for understanding the market dynamics against conflict escalation.

Furthermore, the DJIM index has proven to be sensitive to global volatility indicators such as VIX, commodity prices, and long-term premiums (Ozcelebi & Pérez-Montiel, 2023; Sakinç, 2021). The use of the Geopolitical Risk index (GPR) as a real-time sentiment gauge is also growing. Nevertheless, no study has explicitly applied the event-based EGARCH model to compare the return and volatility responses between the DJIM and MSCI World to two real

and sequential geopolitical conflicts, an important gap in the current literature, given the increasing relevance of Islamic financial markets.

This study positions itself amid this need, by asking the research question, how do the returns and volatility of Islamic stock indices (DJIM) and conventional indices (MSCI World) respond to the two global geopolitical shocks (Israel–Palestine 2023, and Israel–Iran 2024)? To answer this, the study used daily data from January 2023 to June 2025, applied an event-based EGARCH(1,1) model, and integrated various macroeconomic control variables, such as oil and gold prices, VIX, and USDX.

The main contribution of this study lies in a cross-index approach that combines the normative framework of Islamic finance with quantitative analysis in real geopolitical situations. This study introduces the event-based EGARCH model as an innovative approach to analyze the volatility of Sharia indices globally, as well as offering a new framework for assessing the structural resilience of Sharia markets. In addition, the results of this study provide an important empirical basis for institutional investors, ESG portfolio managers, and financial market regulators in designing risk-mitigation strategies that respond to the dynamics of modern geopolitical crises.

RESEARCH METHOD

This study adopts a quantitative approach based on the Exponential GARCH (EGARCH) model of Nelson (1991) to evaluate and compare the sensitivity of market volatility between the two main global indices, the MSCI World Index as a representative of the conventional market and the Dow Jones Islamic Market (DJIM) as a representation of the Islamic market. The focus of the analysis is directed at the response of the two indices to the two major geopolitical escalations, namely the Israeli-Palestinian (IP) conflict that broke out on October 7, 2023, and the Israeli-Iran conflict (II), which began on June 13, 2024. These two events were chosen because of the cross-sectoral and cross-regional impacts they generate as well as their characteristics that can trigger flight-to-safety globally.

The data used include the daily closing prices of the MSCI World and DJIM for the period January 2, 2023, to June 30, 2025, with data sources coming from Bloomberg and Refinitiv Eikon to ensure accuracy. The daily return was calculated as the log return of each index. As a control variable, this study included the four most relevant macroeconomic variables in the geopolitical context: Oil Return (Crude Oil WTI Futures), Gold Return (Gold Spot US Dollar), VIX (CBOE Volatility Index), and USDX (U.S. Dollar Index Futures). These four variables are widely known as the main triggers of global market volatility during periods of crisis (Hapau, 2023; Ozcelebi & Pérez-Montiel, 2023; Peng et al., 2019; Sahadudheen & Kumar, 2023). In addition, two dummy variables are arranged to mark the period of each conflict, $Conflict_{IP,t}$ and $Conflict_{IP,t}$, which is worth one since the beginning of the escalation of the conflict and zero otherwise.

The return model (mean equation) was used to measure the simultaneous influence of macro variables and conflicts on index returns. The mean equation is as follows:

$$r_t^{MSCI} = \mu + \delta_1.OilReturn_t + \delta_2.GoldReturn_t + \delta_3 VIX_t + \delta_4.USDIndex_t + \delta_5.Conflict_{IP,t} + \delta_6.Conflict_{II,t} + \varepsilon_t^{MSCI}$$

$$r_t^{DJIM} = \mu + \delta_1.OilReturn_t + \delta_2.GoldReturn_t + \delta_3.VIX_t + \delta_4.USDIndex_t + \delta_5.Conflict_{IP,t} + \delta_6.Conflict_{II,t} + \varepsilon_t^{DJIM}$$

The EGARCH(1,1) model is used to measure return volatility dynamically because of its ability to capture asymmetric volatility, where the impact of negative shocks tends to be greater than that of positive shocks and it efficiently handles volatility persistence (Okpara & Henry, 2025; Wu et al., 2022). The variance equation was formulated as follows:

$$ln\,(h_t^{MSCI}) = \omega + \beta.ln(h_{t-1}^{MSCI}) + \alpha\left|\frac{\varepsilon_{t-1}^{MSCI}}{h_{t-1}^{MSCI}}\right| + \gamma\,\frac{\varepsilon_{t-1}^{MSCI}}{h_{t-1}^{MSCI}} + \theta_1 Conflict_{IP,t} + \theta_2 Conflict_{II,t}$$

$$ln\,(h_t^{DJIM}) = \phi + \psi.ln\left(h_{t-1}^{DJIM}\right) + \pi\left|\frac{\varepsilon_{t-1}^{DJIM}}{h_{t-1}^{DJIM}}\right| + \eta\,\frac{\varepsilon_{t-1}^{DJIM}}{h_{t-1}^{DJIM}} + \zeta_1 Conflict_{IP,t} + \zeta_2 Conflict_{II,t}$$

Before estimating, all data series are tested for stationarity using the Augmented Dickey–Fuller (ADF) test. Post-estimation diagnostics include ARCH–LM assays for heteroscedasticity and the Durbin Watson test for autocorrelation. The Akaike (AIC) and Bayesian (BIC) information criteria were used to select the best model. This method is designed not only to measure the impact of conflict directly on returns and volatility but also to test whether DJIM exhibits structurally different characteristics of resilience than the MSCI World during periods of extreme global uncertainty.

RESULT AND DISCUSSION

Result

Based on the results of the Augmented Dickey-Fuller (ADF) test in Table 1, all variables at level show a probability value (p-value) > 0.05, except for VIX, which has a p-value of 0.0000, indicating that only VIX is stationary at level. For other variables, such as DJIM, MSCI, Oil Return, Gold Return, and USDX, the p-value at the level is well above the 5% threshold, so the zero (non-stationary) hypothesis cannot be ruled out. However, after the first difference, all variables show a negative t-statistic and p-value = 0.0000, which means that all series become stationary after the first differential transformation. Thus, all variables are used in the form of first differentiation to ensure the validity of the estimates in the EGARCH model and to avoid spurious regression results.

Table 1. Augmented Dickey-Fuller test statistic

	Level		1st Difference	
	t-Statistic	Prob.*	t-Statistic	Prob.*
DJIM	-1.3871	0.5896	-22.7981	0.0000
MSCI	-0.9576	0.7695	-22.3558	0.0000
Oil_Return	-2.7302	0.0695	-24.4143	0.0000
Gold_Return	0.4714	0.9857	-26.5021	0.0000
VIX	-5.2369	0.0000	-28.0597	0.0000

USDX	-1.4582	0.5544	-25.4627	0.0000

The results of the heteroscedasticity test using the ARCH-LM test in both models (DJIM and MSCI) showed no significant residual heteroscedasticity problems. For the DJIM model, the value of Prob. F(1.647) was 0.2748 and Prob. The Chi-Square of 0.2741 is well above the significance threshold of 0.05, so the zero hypothesis that there is no ARCH effect cannot be rejected. The same is true for the MSCI model, where the value of Prob. F(1.647) reached 0.8113 and Prob. The Chi-Square is 0.8109, which also indicates that the residual variance is quite stable and does not show a pattern of heteroscedasticity that has not been captured by the model. Thus, it can be concluded that the implemented EGARCH(1,1) model effectively accommodates the data volatility structure, and the results can be considered statistically robust.

Table 2. Heteroskedasticity Test: ARCH

Model 1 (DJIM)		Model 2 (MSCI)	
F-statistic	1.1945	F-statistic	0.0571
Obs*R-squared	1.1960	Obs*R-squared	0.0572
Prob. F(1,647)	0.2748	Prob. F(1,647)	0.8113
Prob. Chi-Square(1)	0.2741	Prob. Chi-Square(1)	0.8109

The results of the EGARCH model's estimation (1,1) in Table 3 of the daily returns of the Dow Jones Islamic Market (DJIM) and the MSCI World Index reveal an important difference in the sensitivity of the two indices to external macroeconomic and geopolitical factors. For DJIM, the variables that proved to have the most significant effect on returns were the global volatility index (VIX) with a coefficient of –2.3794 ($p = 0.000$), gold return of 0.2737 ($p = 0.0001$), and the US dollar index (USDX) of -1.8348 ($p = 0.0121$). All three show that the Sharia market has a high sensitivity to global uncertainty and a tendency for investors to seek safe haven assets. In contrast, the dummies for geopolitical conflicts, such as the Israeli–Palestinian (IP) and Israeli–Iran (II) conflicts, were insignificant ($p > 0.85$), indicating that DJIM responded more to systemic risk signals than to direct conflict events. The oil price variable (Oil Return) showed marginal significance ($p = 0.0956$), indicating that its influence on DJIM was relatively weak.

Meanwhile, the MSCI World model reflects a similar sensitivity to VIX (-1.1017; $p = 0.000$), gold (0.1490; $p = 0.000$), and USDX (-0.8516; $p = 0.0072$) but has a significant additional response to oil prices with a coefficient of 1.2339 ($p = 0.0174$), suggesting that conventional markets are more affected by global energy dynamics. Both models exhibit high volatility persistence characteristics, with a GARCH coefficient close to 1 (DJIM = 0.9828; MSCI = 0.9855) as well as a significant asymmetric effect in capturing the negative impact of previous shocks. The Akaike Information Criterion (AIC) values are at 10.59 (DJIM) and 9.10 (MSCI), respectively, while the Durbin–Watson value of close to 2 indicates the absence of a serious autocorrelation. These findings confirm that although the Sharia market shows stability to

direct geopolitical shocks, its sensitivity to global risk proxies remains significant and that MSCI tends to be more reactive to energy market fluctuations.

Table 3. EGARCH (1,1)

	Model 1 (DJIM)				Model 2 (MSCI)			
Variable	Coeff	Std. Error	z-Stat	Prob.	Coeff	Std. Error	z-Stat	Prob.
C	230.22	75.6411	3.0436	0.0023	105.75	33.0032	3.2043	0.0014
D(OIL)	1.7789	1.0675	1.6664	0.0956	1.2339	0.5186	2.3791	0.0174
D(GOLD)	0.2737	0.0691	3.9636	0.0001	0.1490	0.0321	4.6416	0.0000
VIX	-2.3794	0.3904	-6.0952	0.0000	-1.1017	0.1815	-6.0707	0.0000
USDX	-1.8348	0.7311	-2.5096	0.0121	-0.8516	0.3169	-2.6874	0.0072
IP	0.5887	3.3003	0.1784	0.8584	1.3361	1.3740	0.9724	0.3308
II	0.6899	10.7449	0.0642	0.9488	1.0681	4.8574	0.2199	0.8260
Variance Equation					Variance Equation			
C(8)	0.0331	0.0554	0.5973	0.5503	-0.0102	0.0468	-0.2188	0.8268
C(9)	0.1347	0.0341	3.9499	0.0001	0.1379	0.0360	3.8343	0.0001
C(10)	-0.1090	0.0158	-6.9154	0.0000	-0.1381	0.0189	-7.2908	0.0000
C(11)	0.9828	0.0079	123.65	0.0000	0.9855	0.0082	120.70	0.0000
DW	1.8098				DW	1.7801		
AIC	10.593				AIC	9.0990		

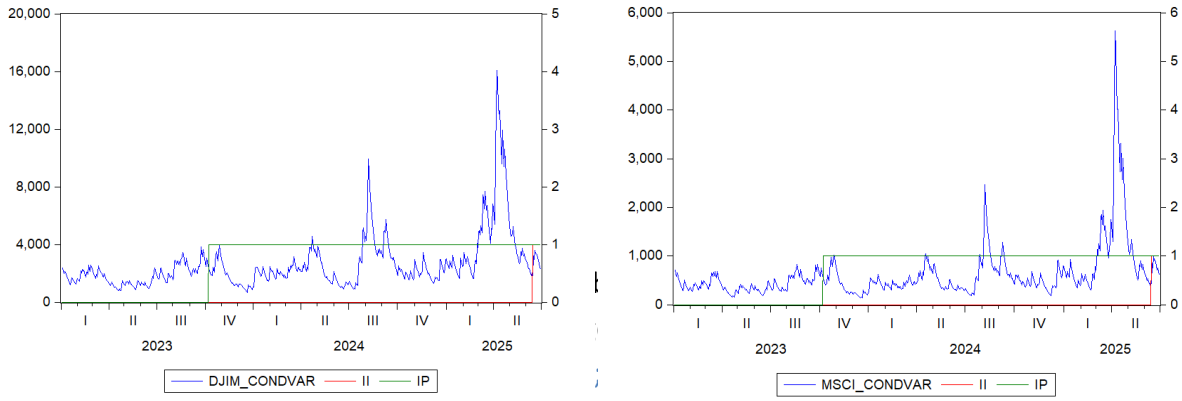
Discussion

Key Findings

The results of the analysis based on EGARCH(1,1), which compares the volatility response between the Islamic stock market (represented by DJIM) and the conventional stock market (represented by the MSCI World) to global geopolitical shocks, show significantly and profoundly different dynamics. Islamic stocks show high sensitivity to global systemic risk indicators such as the VIX (CBOE Volatility Index), gold returns, and the US dollar index (USDX) (Hapau, 2023; Peng et al., 2019; Sahadudheen & Kumar, 2023). This is in line with the findings Naeem et al. (2024) and Aziz et al. (2020) which states that the Islamic market could face substantial volatility pressures amid high exposure. Nonetheless, the results show that direct conflicts, such as the 2023 Israeli–Palestinian escalation and the 2024 Israeli–Iran escalation, do not significantly affect the response of the Sharia market.

Visualization of the conditional variance (Figure 1) obtained from EGARCH(1,1) for both indices reinforces these findings. The chart shows that the volatility of DJIM and MSCI will increase sharply in early 2025, reflecting a surge in systemic uncertainty. However, no specific spike coincides directly with the start of the Israeli–Palestinian (October 2023) and Israeli-Iranian (June 2024) conflicts, which are marked in the graph by green and red vertical lines. This means that both DJIM and MSCI respond more to the accumulation of global pressure than to the occurrence of individual conflicts. Although DJIM nominally recorded higher variance values, the pattern was more restrained and tended to be consistent, indicating a more stable market structure in the face of complex global tensions.

Figure 1. Conditional Variance



2023; Rakhmanov et al., 2024). Consequently, Islamic stocks are more sensitive to macro and systemic conditions than to temporary or local conflict shocks, as these risk elements have been internalized through global market signals (Ebrahimi Salari et al., 2025; Sakinç, 2021; Shamsuddin, 2014; Widarjono et al., 2021).

In contrast, the conventional stock market, in addition to showing sensitivity to the VIX, gold, and USDX, is also significantly affected by oil price movements. This reflects the large exposure of conventional indices to the energy sector and poverty-based industries, which are directly affected by global oil price volatility. Within this framework, geopolitical conflicts, particularly in oil-producing regions, have the potential to create supply shocks that affect production costs, cash flows, and profit expectations of companies that are members of conventional indices (Hapau, 2023; Peng et al., 2019; Sahadudheen & Kumar, 2023). Therefore, the significant reaction of conventional stocks to oil prices reflects the close linkage between the real sector and conventional capital markets and natural-resource-based geopolitical risks.

Both models show high volatility persistence and an asymmetric effect, with negative shocks having a greater impact than positive shocks. An EGARCH coefficient close to one indicates that the memory of volatility is very strong and long-lasting, while the asymmetric effect indicates that the market is very responsive to bad news, especially in crisis conditions. However, Islamic stocks show a more moderate response rate than conventional stocks, suggesting that the structure of the Islamic market tends to be more stable and not easily swayed by short-term sentiment (Okpara & Henry, 2025; Setianingsih et al., 2024; Tabash et al., 2024).

Islamic stocks tend to show higher resilience than conventional stocks in the face of geopolitical shocks, because they focus on global systemic risks and not solely on individual conflict events. This resilience does not mean total immunity but reflects an investment structure that is more adaptive to macroeconomic dynamics and global volatility (Abdelkaoui & Sidaoui, 2025; Al-Qahtani & Darussalam, 2025; Setianingsih et al., 2024).

These findings expand the academic contributions in three main dimensions. First, it proves that the event-based EGARCH model can reveal the dynamic response of Islamic stocks in contemporary conflicts. Second, comparing the structural resilience between stock indices provides a deeper understanding of the fundamental strengths of value-based financial

approaches. Third, these results provide an empirical basis for regulators and investors, particularly in formulating investment strategies that consider the dominant types of risk (systemic versus specific) in an increasingly uncertain global geopolitical landscape.

Future Research Direction and Limitations

This study offers an initial contribution to the comparison of the volatility responses of Islamic and conventional stocks to global geopolitical conflicts using an event-based EGARCH model. However, methodological and conceptual limitations must be observed to become a foothold for further research. One of the main limitations of this study was the dummy event approach used to capture geopolitical conflicts. While effective in isolating temporal impacts, this approach simplifies geopolitical complexities that are multidimensional and take place gradually. Therefore, future research may integrate text- or media-based geopolitical risk indices (such as GPR indices or media-based conflict indices) to capture subtle and real-time dynamics of conflict escalation (Caldara & Lacoviello, 2022).

The second limitation is the choice of the macroeconomic control variables. This research focuses on VIX, USDX, gold and oil returns, and conflict dummy. However, stock market dynamics are also influenced by fundamental factors that have not been included, such as real interest rates, unemployment rates, inflation expectations, and market liquidity conditions. Future research could expand the model by using more comprehensive macro fundamental variables, including ESG components, to explore how ethical sentiment interacts with geopolitical risk in Islamic stocks.

In addition, the limited time coverage of two major conflict events (Israel–Palestine 2023 and Israel–Iran 2024) provides an opportunity for the expansion of cross-conflict and cross-decade studies to determine whether the resilience response of sharia stocks is consistent or contextual. Multicountry panel analysis, high-frequency data integration, and machine learning approaches to volatility prediction have great potential for future exploration.

Geographically, although the DJIM and MSCI World are global, the study did not differentiate responses between regions (e.g., Asia, Europe, and the Middle East). With increasing market linkages and regional dominance of certain sectors (e.g., energy in the Middle East, technology in the US), future studies may utilize a geographic or network-based volatility spillover approach to detect risk transmission between Sharia and conventional markets across regions. By opening this space, it is hoped that future research directions will strengthen the understanding of the role of Islamic finance in the architecture of global market stability and bridge the integration between ethical values and efficiency in modern financial theory.

CONCLUSION

This study reveals that Sharia stock indices (DJIM) and conventional indices (MSCI World) show different dynamics in response to global geopolitical pressures. Although both are sensitive to systemic risk indicators such as the VIX, gold prices, and the US dollar index,

DJIM shows a more stable response to the escalation of direct conflicts, such as the Israeli–Palestinian and Israeli-Iranian cases. In contrast, the MSCI World showed a significant additional response to oil price movements, reflecting close linkages with the global energy sector. These results show that the structure of the Sharia indices based on values, ethics, and prudential principles provides relatively higher resilience in the face of global uncertainty, especially those originating from short-term external shocks.

However, this study had some methodological limitations that need to be considered. The use of dummy variables to mark conflict periods has the disadvantage of capturing the dynamics of gradual and multidimensional escalation. In addition, the focus of the control variables is still limited to key macro indicators, not yet including fundamental variables such as real interest rates, inflation expectations, and liquidity indicators. The time span that only covers two major conflicts also leaves room for further research to examine across decades, across regions, and use textual or big data approaches, such as the GPR Index or media-based conflict signals. Using this approach, further research can capture the nuances of market changes in a real-time and contextual manner.

Conceptually, this study makes an important contribution to the Islamic financial literature and global market risk management. Through the application of the event-based EGARCH model, this study shows that the Islamic financial system is not only based on moral values but also has strong adaptability to systemic pressures. This finding provides strategic implications for regulators, portfolio managers, and institutional investors who want portfolio stability in a dynamic geopolitical landscape. Moreover, the results of this study reinforce the argument that value-based finance does not have to sacrifice efficiency, but can instead be an alternative foundation in designing a more sustainable, resilient, and equitable investment system.

REFERENCES

Abdelkaoui, F., & Sidaoui, A. (2025). Are Islamic Banks Resilient to Crises: New Evidence from the COVID-19 Pandemic Case of North African Countries. *International Journal of Applied Economics, Finance and Accounting*, *22*, 111–119. https://doi.org/10.33094/ijaefa.v22i1.2286

Abduh, M. (2020). Volatility of Malaysian conventional and Islamic indices: does financial crisis matter? *Journal of Islamic Accounting and Business Research*, *11*(1), 1 – 11. https://doi.org/10.1108/JIABR-07-2017-0103

Al-Qahtani, S., & Darussalam, A. Z. (2025). Sustainability of the Syari'ah Economic System in Overcoming the Global Financial Crisis. *Journal of Multidisciplinary Sustainability Asean*, *2*(1), 35–45. https://doi.org/10.70177/ijmsa.v2i5.1943

Alsadan, A., Alalmaee, H., Zehri, C., & Youssef, W. A. Ben. (2025). Geopolitical Shocks and Financial Fragmentation: Impacts on Housing, Bond, and Stock Markets. *Review of Development Finance*, *15*(1), 69 – 97. https://www.scopus.com/inward/record.uri?eid=2-s2.0-105007473143&partnerID=40&md5=5de72ecaaca209f4318ccc12ba685e1f

Andleeb, R., & Hassan, A. (2023). Impact of Investor Sentiment on Contemporaneous and Future Equity Returns in Emerging Markets. *SAGE Open*, *13*(3), 21582440231193570. https://doi.org/10.1177/21582440231193568

Appiah-Otoo, I. (2021). Impact of Economic Policy Uncertainty on Renewable Energy Growth. *Energy RESEARCH LETTERS*, *2*. https://doi.org/10.46557/001c.19444

Arif, M., Naeem, M. A., Hasan, M., M Alawi, S., & Taghizadeh-Hesary, F. (2022). Pandemic crisis versus global financial crisis: Are Islamic stocks a safe-haven for G7 markets? *Economic Research-Ekonomska Istraživanja*, *35*(1), 1707–1733. https://doi.org/10.1080/1331677X.2021.1910532

Aziz, T., Marwat, J., Mustafa, S., & Kumar, V. (2020). Impact of Economic Policy Uncertainty and Macroeconomic Factors on Stock Market Volatility: Evidence from Islamic Indices. *Journal of Asian Finance, Economics and Business*, *7*(12), 683 – 692. https://doi.org/10.13106/JAFEB.2020.VOL7.NO12.683

Baker, S., Bloom, N., & Davis, S. (2016). Measuring Economic Policy Uncertainty. *The Quarterly Journal of Economics*, *131*, qjw024. https://doi.org/10.1093/qje/qjw024

Baur, D., & Lucey, B. (2007). Is Gold a Hedge or a Safe Haven? An Analysis of Stocks, Bonds and Gold. *Financial Review*, *45*. https://doi.org/10.1111/j.1540-6288.2010.00244.x

Biswas, P., Jain, P., & Maitra, D. (2024). Are shocks in the stock markets driven by commodity markets? Evidence from Russia-Ukraine war. *Journal of Commodity Markets*, *34*. https://doi.org/10.1016/j.jcomm.2024.100387

Caldara, D., & Lacoviello, M. (2022). *Measuring Geopolitical Risk*. https://doi.org/10.17016/IFDP.2022.1222r1

Dinku, T., & Gardachw, W. (2022). Asymmetric GARCH models on price volatility of agricultural commodities. *SN Business & Economics*, *2*. https://doi.org/10.1007/s43546-022-00355-7

Ebrahimi Salari, T., Esmaeilpour Moghadam, H., Maghsoudi, S., Namvar, S., & Sabri, A. R. (2025). Macroeconomic shocks and stock market efficiency: a panel VAR study of Islamic and conventional stocks in Iran. *Middle East Development Journal*, *17*(1), 138–157. https://doi.org/10.1080/17938120.2025.2479408

Fang, Y., & Shao, Z. (2022). The Russia-Ukraine conflict and volatility risk of commodity markets. *Finance Research Letters*, *50*. https://doi.org/10.1016/j.frl.2022.103264

Ghani, M., & Ghani, U. (2023). Economic Policy Uncertainty and Emerging Stock Market Volatility. *Asia-Pacific Financial Markets*, *31*, 165–181. https://doi.org/10.1007/s10690-023-09410-1

Güney, N. (2024). Maqāsid al-Sharīʻa in Islamic Finance: A Critical Analysis of Modern Discourses. *Religions*, *15*(1). https://doi.org/10.3390/rel15010114

Hapau, R. G. (2023). Capital Market Volatility During Crises: Oil Price Insights, VIX Index, and Gold Price Analysis. *Management and Marketing*, *18*(3), 290 – 314. https://doi.org/10.2478/mmcks-2023-0016

Harjito, D. A., Nabila, A. R., & Sanusi, Z. M. (2021). Jakarta Sharia Stock Index and international Sharia leading stock indices: Comparison of Sharia screening processes. *International Journal of Business and Emerging Markets*, *13*(2), 107 – 123. https://doi.org/10.1504/ijbem.2021.114404

Hasyim, F., Qomar, M., & Saleh, H. (2024). Resilience of Islamic and conventional stocks to geopolitical conflict: A GARCH model analysis. *Asian Journal of Islamic Management (AJIM)*, 122–139. https://doi.org/10.20885/AJIM.vol6.iss2.art4

Hasyim, F., Rusgianto, S., Setianingsih, H. E., Fauziah, N., & Ramly, A. (2024). The impact of the Russia-Ukraine conflict on market volatility: stability of Islamic cryptocurrency. *Journal of Islamic Accounting and Finance Research*, *6*(2), 203–238.

Ji, J. (2025). Geopolitical risk and its impact on capital allocation and stock market performance. *Applied Economics Letters*. https://doi.org/10.1080/13504851.2024.2449544

Khan, M. N. (2025). Assessing the Impact of Geopolitical Crises on Global Financial Markets: Insights from the Novel TVP-VAR Model. *Journal of Economic Integration*, *40*(1), 29 – 52. https://doi.org/10.11130/jei.2024037

Labidi, C., Laribi, D., & Ureche-Rangau, L. (2022). Price and volume effects around Islamic index revisions: the case of DJIM-GCC. *Managerial Finance*, *48*(2), 222 – 242. https://doi.org/10.1108/MF-11-2020-0564

Li, Z., Hu, B., Zhang, Y., & Yang, W. (2024). Financial market spillovers and investor attention to the Russia-Ukraine war. *International Review of Economics and Finance*, *96*. https://doi.org/10.1016/j.iref.2024.103521

Liu, W. (2020). Are Gold and Government Bond Safe-Haven Assets? An Extremal Quantile Regression Analysis. *International Review of Finance*, *20*(2), 451–483. https://doi.org/https://doi.org/10.1111/irfi.12232

Muharam, H., Najmudin, N., Mawardi, W., & Arfinto, E. D. (2021). Do instabilities in national macroeconomic factors contribute to channeling volatility spillover from the global to the Islamic equity market? *Comparative Economic Research*, *24*(1), 103 – 121. https://doi.org/10.18778/1508-2008.24.06

Naeem, M. A., Khan, S., & Rehman, M. Z. (2024). Comparing Islamic and conventional stock markets in GCC: a TVP-VAR analysis. *International Journal of Emerging Markets*. https://doi.org/10.1108/IJOEM-08-2023-1327

Nelson, D. B. (1991). Conditional Heteroskedasticity in Asset Returns: A New Approach. *Econometrica*, *59*(2), 347–370. https://doi.org/10.2307/2938260

Okpara, G., & Henry, N. (2025). Forecasting Performance of Asymmetric GARCH in Stock Market Volatility Models: Relative Potency of EGARCH and PGARCH Models. *International Journal of Research and Innovation in Applied Science*, *X*, 663–674. https://doi.org/10.51584/IJRIAS.2025.10020056

Ozcelebi, O., & Pérez-Montiel, J. A. (2023). Examination of the impacts of the immediate interest rate of the United States and the VIX on the Dow Jones Islamic Market Index. *Bulletin of Economic Research*, *75*(4), 1157 – 1180. https://doi.org/10.1111/boer.12399

Peng, W., Hu, S., Chen, W., Zeng, Y., & Yang, L. (2019). Modeling the joint dynamic value at risk of the volatility index, oil price, and exchange rate. *International Review of Economics and Finance*, *59*, 137 – 149. https://doi.org/10.1016/j.iref.2018.08.014

Rakhmanov, A., Thommandru, A., & Tillaboev, S. (2024). Historical Trajectories and Modern Dynamics of Islamic Financial Law in Central Asia. *International Journal of Legal Information*, *52*(1), 74 – 87. https://doi.org/10.1017/jli.2024.15

Ringe, W.-G. (2018). The Irrelevance of Brexit for the European Financial Market. *European Business Organization Law Review*, *19*(1), 1 – 34. https://doi.org/10.1007/s40804-018-0106-6

Ringe, W.-G. (2021). Brexit and how it affects capital markets (regulation). In *Brexit: Legal and Economic Aspects of a Political Divorce*. https://doi.org/10.4337/9781800376588

Sahadudheen, I., & Kumar, P. K. S. (2023). Time-Varying Relationship and Volatility Spillovers Among Oil, Gold, Forex and Stock Markets in Indian Context: The Juxtaposition of Global

Economic Crisis and COVID-19 Pandemic. *Indian Economic Journal*, *71*(4), 748 – 767. https://doi.org/10.1177/00194662231166168

Sakinç, İ. (2021). Analysis of the Working Capital Management Efficiency of the Manufacturing Companies in the Islamic Index. *Hitit Theology Journal*, *20*(3), 107 – 128. https://doi.org/10.14395/hid.930402

Setianingsih, H. E., Fauziyah, N., & Hasyim, F. (2024). Investor Sentiment and Stock Return Volatility: Implication of The Israel-Palestine Conflict on Sharia Stocks in Indonesia. *Muslim Business and Economics Review*, *3*(2), 178–199.

Shamsuddin, A. (2014). Are Dow Jones Islamic equity indices exposed to interest rate risk? *Economic Modelling*, *39*, 273 – 281. https://doi.org/10.1016/j.econmod.2014.03.007

Tabash, M. I., Chalissery, N., Nishad, T. M., & Al-Absy, M. S. M. (2024). Market Shocks and Stock Volatility: Evidence from Emerging and Developed Markets. *International Journal of Financial Studies*, *12*(1). https://doi.org/10.3390/ijfs12010002

Tronzano, M. (2020). Safe-Haven Assets, Financial Crises, and Macroeconomic Variables: Evidence from the Last Two Decades (2000–2018). *Journal of Risk and Financial Management*, *13*(3). https://doi.org/10.3390/jrfm13030040

U, T. S.-C., Lin, Y., & Wang, Y. (2024). The impact of the Russia–Ukraine war on volatility spillovers. *International Review of Financial Analysis*, *93*. https://doi.org/10.1016/j.irfa.2024.103194

Wang, W., Su, C., & Duxbury, D. (2022). The conditional impact of investor sentiment in global stock markets: A two-channel examination. *Journal of Banking & Finance*, *138*, 106458. https://doi.org/https://doi.org/10.1016/j.jbankfin.2022.106458

Widarjono, A., Shidiqie, J. S. A., & El Hasanah, L. L. N. (2021). The Sensitivity of the Indonesian Islamic Stock Prices to Macroeconomic Variables: An Asymmetric Approach. *Journal of Asian Finance, Economics and Business*, *8*(3), 181 – 190. https://doi.org/10.13106/jafeb.2021.vol8.no3.0181

Wu, X., Yin, X., & Mei, X. (2022). Forecasting the Volatility of European Union Allowance Futures with Climate Policy Uncertainty Using the EGARCH-MIDAS Model. *Sustainability*, *14*(7). https://doi.org/10.3390/su14074306

Yu, M., & Wang, N. (2023). The Influence of Geopolitical Risk on International Direct Investment and Its Countermeasures. *Sustainability (Switzerland)*, *15*(3). https://doi.org/10.3390/su15032522

Zhao, D., Li, P., Zheng, J., Lian, Y., & Yang, M. (2025). Uncovering the Switching Impact of Economic Policy Uncertainty on the Cross-Correlation Between Stock Markets: An Innovative Hurst-Based Wavelet Coherence Approach. *Computational Economics*. https://doi.org/10.1007/s10614-025-10952-x