

## INFLUENCE OF INVESTOR AWARENESS ON PERFORMANCE OF REAL ESTATE INVESTMENT TRUSTS IN KENYA

DOI: 10.17261/Pressacademia.2022.1632

JBEF- V.11-ISS.3-2022(2)-p.122-129

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Date Received: June 22, 2022

Date Accepted: September 10, 2022



### To cite this document

Ndung'u, D. T., Kung'u, J.N., (2022). Influence of investor awareness on performance of real estate investment trusts in Kenya. Journal of Business, Economics and Finance (JBEF), 11(3), 122-129.

Permanent link to this document: <http://doi.org/10.17261/Pressacademia.2022.1632>

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### ABSTRACT

**Purpose-** The performance of the listed REITs has not been as expected and efforts by REIT managers to issue more real estate securities have been slow. This posed the concern of whether the unexpected performance of REITs in Kenya was due to external factors, such as investor awareness, which is not under the control of the investment market. Thus the study sought to examine how investor awareness influences performance of REITs in Kenya.

**Methodology-** Predictive correlational research design was employed while target population comprised of Fund Managers, Stock Brokers and Investment Banks and Property Developers. Structural Equation Modelling was used to test the hypothesized relationships at 5% significance level.

**Findings-** The results indicate that investor awareness have no significant influence on performance of REITs in Kenya. Majority of the respondents agreed that they were knowledgeable about Kenya's real estate market, and their membership in the REITs Association of Kenya has provided insightful market research and databases. Such investors can access with ease reports of the REITs issuing firm. Further, although investors usually follow and update themselves on the REITs markets through the online platform, such awareness does not influence the level of performance of REITs in Kenya.

**Conclusions-** It can be concluded that although efforts have been put in place to ensure investors' awareness of real estate securities, such efforts have not boosted the uptake of REITs among investors. Investor awareness efforts employed by Capital Markets Authority in conjunction with the REITs Association of Kenya are not likely to enhance the performance of REITs in Kenya. The results indicate that REITs uptake has not attained a critical mass necessary to create liquidity in the capital market. Based on the findings, there is minimal publicity campaigns carried on by the Capital Markets Authority to sensitize potential investors on REITs.

**Keywords:** Investor awareness, performance of REITs, property market.

**JEL Codes** G40, R30, C12, C51, L21

### 1. INTRODUCTION

Since the 2000s, the property market has grown to be the second-largest investment alternative after fixed-income instruments, but larger than the money market and stocks, according to Pham (2013). Real estate investment funds, property firms, and property securities funds make up the three most popular subcategories of listed property securities (Jakpar, 2018). One of the listed real estate assets, real estate investment trusts (REITs), have emerged as the top investment option for both retail and institutional investors. As a result, the focus of this study is on REITs because they have emerged as a substantial asset class of investment options for investors who may be looking for alternative investments. A REIT is a company whose shares are traded publicly like any other stock and that owns and manages real estate assets that generate income (Oreagbe, 2010). A REIT is eligible for a special tax position that taxes income at the investor level rather than the corporate level, according to the European Public Real Estate Association (2012). REITs sell and invest directly in real estate via mortgage or property, similar to stocks on securities exchange. The current study's focus is on REITs since they give investors a chance to own a proportion in either existing properties

or ones that are currently being constructed (Ndung'u & Onyuma, 2020). In order to give investors exposure to real estate without having to acquire and sell actual properties, REITs trade like stocks. Through the capital market, real estate developers can offer investors units or shares in a building that is either commercial or residential. Individual investors can also own the real estate assets through REITs (Africa Business Communities, 2015). Additionally, REIT income in the form of dividends is predictable because the majority of occupant rent is set before a lease agreement. Income REITs offer investors the chance to invest in a variety of properties, including hostels, office buildings, warehouses, and shopping centers. For the risks they take on, REITs also provide investors with competitive returns. The process by which investors improve their understanding of financial products and the risks associated with investing in such products is referred to as investors' awareness (Prabakaran, 2018). Investors can be divided into two groups: aware investors and uninformed investors. Investors who are aware about risky stocks and who are familiar with the probability distribution of stock returns are said to be aware investors. According to Guiso and Jappelli (2005), investors' extent of exposure and knowledge of the investment industry influences uptake of financial securities. Investor awareness can be attributed to low subscription rates and consequent poor performance of REITs especially in Kenya. This posed the concern of whether the unexpected performance of REITs in Kenya was due to external factors, such as investor awareness, that are not under the control of the investment market. Thus, the main objective of this study was to evaluate the influence of investor awareness on the performance of Real Estate Investment Trusts in Kenya. Section 2 of this paper presents key literature relating to the study. Data and methodology used is discussed in section 3, section 4 contains the findings and discussions while section 5 highlights the conclusions.

## **2. LITERATURE REVIEW**

### **2.1 Global Perspective of the REITs Market**

The creation of Real Estate Investment Trusts by the American Congress in the 1960s, with the goal of facilitating access to inexpensive investments in commercial real estate facilities, marked the beginning of the growth of REITs markets (Oranlee, 2014). REITs were created to assist potential investors who lacked the substantial funds needed to buy real estate property but were nonetheless ready and able to purchase REIT shares (Naidoo, 2014). Prior to the US REIT regime's implementation, institutional investors and high-net-worth individuals dominated the commercial real estate sector. The top 10 REITs in the world by 2019 were all headquartered in the United States, according to Statista (2019). The largest REIT in the world as of the end of 2019 had a market value of US\$19.11 billion and was located in Boston (Macro trends, 2020). Japan, Hong Kong, Australia, Singapore, as well as smaller economies like Taiwan, Malaysia, and Thailand, are the major players in the Asia-Pacific REITs market. Asia Pacific's REIT market grew as a result of the 2001 introduction of REITs in Japan. Asian REITs became the most popular among investors despite the shaky global economy. Japan is the largest REIT market in Asia Pacific with 63 reported REITs and a market worth of 147.2 billion dollars (Savills Research, 2019). Dubai was the first country in the Gulf to permit the entry of REITs. The law allowing REITs to manage and control real estate property portfolios took effect in the year 2006. From the year 2015, Bahrain, Saudi Arabia, Oman, Abu Dhabi, and Saudi Arabia all introduced REITs markets. Only 3% of the value of the listed real estate companies is found in the United Arab Emirates, which has a REIT market capitalization of more than \$800 million overall (Global Ethical Banking, 2019). By 2019, there were over 250 Asia-Pacific (APAC) REITs, and their combined market value had risen to more than 330 billion US dollars (Vreeker, 2020). Following the approval of legislation in Thailand, the Philippines, and India, new REIT markets were also anticipated to spur more growth; however, China is still in the planning stages. In addition to the customary office building and shopping mall-themed REIT products, PWC (2019) noted that the eventualization of REITs in China would be quite unique in having a strong presence of residential REIT products. China started a REIT trial to fund capital-intensive infrastructure projects in late April 2020. Bloomberg (2020) asserts that due to the program's success, individual investors were introduced to a market that may one day be worth \$3 trillion. Such achievements offer beneficial lessons for other economies, like Kenya's.

### **2.2. Development of REITs Market in Africa**

The African REIT market has grown in recent years. South Africa, Ghana, Nigeria, Kenya, and Tanzania are among the nations that have adapted to global REIT systems. In May 2013, South Africa's REIT law came into effect. The SA-REITs are governed by the requirements and regulations for the Johannesburg Stock Exchange listings in accordance with international standards. Rental income must make up at least 75% of their REITs' yearly earnings, while shareholders must receive at least 75% of their non-taxable taxable income. In comparison to other African nations, the real estate market in South Africa is seen as being mature (EPRA, 2013). In South Africa, there are roughly 23 active REITs with a combined market value of about 26.1 billion US dollars (Cytonn Investments, 2019). The REITs laws were enacted by the Nigerian Securities Exchange Commission in 2007. Asset-backed securities called Nigerian REITs can be organized as closed-end or open-end trusts. N-REITs must have at least 100 unit holders in

order to be eligible for tax-exempt status (Nigerian Stock Exchange, 2014). Real estate asset groupings must make up 70% of open-end REITs. Contrarily, the real estate assets of closed-end REITs must represent at least 75% of the total asset value. Both are limited to owning asset categories related to domestic real estate. Mortgage rent and property sales must account for at least 75% of the total yearly revenue. Only three REITs, with a combined market value of around 151 million US dollars, are listed in Nigeria (Press Reader, 2019). In 1994, the Ghanaian Stock Exchange Commission passed the REIT law. Housing Finance Company Bank was the first business to use the REIT system in 1995. Ghana's REIT industry has remained largely undeveloped ever since (Bunten, 2015). The oldest REIT market in the area, Ghana, has one listed REIT with a market value of approximately 11 million US dollars, according to the Oxford Business Group (2019).

Tanzania passed laws governing REITs and collective investment plans in 2011. The Collective Investment Schemes provide that the CMA may only approve close-ended structured funds. Real estate investments made by REITs must exceed the value of the entire assets in accordance with Rule 51 of the Tanzania Collective Investment Schemes (CMSA, 2011). The only residential REIT in Tanzania is Watumishi Housing Company (WHC-REIT), which was founded in 2014. (Watumishi Housing Company, 2019). The industrial worth of WHC-REIT, according to Oxford Business Group (2019), was about 40 million US dollars. Moreover, despite the Republic of Rwanda introducing regulations for REITs, no REIT has yet been registered there. In a similar vein, REIT regulations were established in Uganda in 2017, but no REIT has been registered as of yet (NAREIT, 2019). Due to the lack of housing for the poorest sectors of the economy, financing costs for Kenya's real estate industry expansion have remained high. The fulfilment of this goal has proven to be incredibly challenging due to the high expenses associated with the construction or financing of dwelling units for the lower end of the market. In addition to raising funds to finance affordable housing projects, REITs can improve market liquidity (Ndung'u & Onyuma, 2020). The Nairobi Securities Exchange developed cutting-edge solutions to increase the number of listed securities and its market capitalisation. One of the unique products is a listing segment for SMEs called the Growth Enterprise Market Segment (GEMS). Ibuka, a program for incubating and accelerating businesses with growth potential, has also been developed. Additionally, REITs and derivatives- financial instruments that derive value from underlying assets have been developed. One of the attempts to expand NSE listings was the introduction of REITs. The REITs regulations were developed in 2013 by the Capital Markets Authority. Through a public offering in 2015, Stanlib Fahari Income-REIT (FAHR) became the first real estate security to be listed on the Nairobi Securities Exchange. The launch of REIT structures was intended to increase capital market financial inclusion. The platform was created to give potential investors the possibility to participate in real estate without needing a lot of money. Investors would get distributable income or dividends in exchange from the issuing company. Stanlib's market capitalization in 2019 was roughly 0.015 billion US dollars (Cytonn Investments, 2019).

### **2.3. Performance of REITs in Kenya**

Since Stanlib Fahari Income REIT was issued, its performance following registration was significantly below expectations, with only 3.6 billion Kenyan shillings (29 percent) taken in as compared to the expected range of 2.6 to 12.5 billion. Since being listed, the I-REIT has lost over 50% of its value, but the share price has maintained between Ksh 9 and Sh14 (Rich, 2019). A property developer named Fusion Capital attempted to market a Ksh 2.3 billion Development REIT in 2016, however the offering was unsuccessful. In contrast to the criteria of seven investors, Fusion Capital only received a 38 percent subscription from its four investors (Crested Capital, 2016). Fusion Capital decided to raise the funds privately and quit the D-REIT. A blatant sign of the poor performance and low uptake of REITs is the failure of the Fusion Capital D-REIT and the Stanlib I-REIT to achieve the minimum subscription and investor requirements. This was one of the main areas that the current study focused on. Further, Acorn Holdings, a developer of dorms for students, also planned to raise Ksh 7.5 billion through REITs in February 2021. The real estate investor was only able to raise Ksh 2.1 billion (Khusoko, 2020; Acorn Holdings, 2021). Acorn Holdings REIT is the most recent undersubscribed REIT in Kenya, which is significant for the current study because it demonstrates investors' lack of interest in new investment vehicles.

### **2.4. Investor Awareness and Performance of REITs**

Prabakaran (2018) examined the stock market awareness and performance of stocks invested in India. The study used Partial Least Squares Structural Equation Modelling (PLS-SEM) to test the hypothesized relationships. The findings showed there exists a relationship between investor awareness and the performance of stocks invested. The study concluded that without prior knowledge or information, investors can lose heavily. This study focused on equities as opposed to REITs, which this study intended to address. Likewise, the current study employed SEM in examining the hypothesized relationship between investor awareness and REIT performance to make inferences. According to Ricciardi (2008), the information that investors choose to analyse has an impact on how they see the market. He further stressed that investors are not able to absorb all information, thus they become selective as to which information can consciously receive their attention, and thus determine their awareness level. Similarly, Shefrin and Statman (2000) reported that investors' attitudes towards the stock market associated risks depend on the behaviour of the stock market. Their arguments looked at the processing of information among investors in the context of the

behaviour of the stock market while negating the property market. This is a knowledge gap that the current study wanted to address. In the context of investing in mutual funds in India, Saini, Anjum, and Saini (2011) investigated the relationship between investor awareness and risk perceptions. Primary and secondary data were used while Chi-square was used to examine the nature of the association. According to the study's findings, the majority of investors have a positive attitude about investing in mutual funds, and it was noted that it is important to maintain this attitude by giving them current information on various trends in the mutual fund sector. The findings of this study showed that investors perceive less risk as they become more aware about market patterns. Further, Bobade, Nakhate, Malkar and Bhayani (2020) carried out an empirical study on the awareness and acceptability of mutual funds in Pune City using a descriptive research design. The study found that there was a positive association between awareness and the acceptability of mutual funds. These studies looked at mutual funds while the current study focused on REITs. Thus, the current study assessed the investors' awareness level and uptake of REITs which are structured as mutual trusts.

Using a descriptive research design, Malathy and Saranya (2017) conducted a study that looked at the connection between investor awareness and investment choices in Chennai, India. The study found that investor awareness is a significant factor that influences investors' decisions leading to better performance for the stocks they have invested in. The study found that investors' knowledge of policies and economic conditions aids their investment decisions which automatically enhance the performance of stocks. The current study sought to examine the investors' awareness of various aspects and whether there exists any correlation between investors' awareness and performance of REIT stocks, a missing gap in the above study. Further, the current study used a correlational research design in examining the relationship between investor awareness and the performance of REITs. Rana (2019) examined the factors influencing how investors perceive risk and its relationship to investment behavior. According to the study, two factors—"financial knowledge" and "social learning"—are particularly important for investor awareness. The perception of risk among investors in the Nepali stock market is further influenced by two aspects, affection and cognition. This is based on data from 204 individual investors that participated in the Nepali stock market. The study found that investor knowledge and perceived risk attitude variables had a significant predictive power in assessing investor behaviour in Nepal. The key focus of the study was investor awareness and uptake of listed stocks with an inclination towards the risk attitude variable only. Apart from the risk perception of investors, other investor awareness factors such as the ability to access firms' reports, and knowledge of the market are also critical in enhancing uptake of any financial security. This study further assessed whether such factors enhance the performance of REITs. Further, the study focused on individual investors rather than all investors and associated stakeholders, which would have enabled access to an in-depth opinion. The current study sought to address this gap. The reviewed empirical studies did not focus on REITs in terms of investors' level of awareness. The market performance of REITs showed poor results in the past few years. As far as the REITs market in Kenya, because REITs are a relatively new market sector, there is a lack of investor understanding or education about them, which results in low market investment. It was, however, unclear if any relevant stakeholders saw this as an investment in this developing economy. This study, therefore, determined the level of awareness of REITs among relevant stakeholders.

### **3. DATA AND METHODOLOGY**

To ascertain whether there were any predictive correlations between the factors, the study used a correlational research design. Predictive correlational designs, according to Gall, Gall, and Borg (2007), are suited for investigations that aim to use two quantitative variables in the prediction of associations. Seventy-nine property developers, twenty-seven fund managers, twenty-five stock brokers and investment banks, four corporate members of the REITs Association of Kenya, and one listed REIT at the Nairobi Securities Exchange made up the target population. Applying stratified random sampling, a sample size that was representative was determined. Since the target population, consisted of key players in the REITs sector, they were segmented into sub-groups based on their homogeneity, stratified random sampling was the most suitable method for this study. Structured questionnaire was utilized to obtain the primary data. Through pretesting, Cronbach alpha, and factor analysis, the data instrument reliability and validity was confirmed. Further, Exploratory Factor Analysis (EFA) was used to check if the constructs were converging and how independent they were in their contribution to the study. Additionally, Confirmatory Factor Analysis (CFA) was employed to see if the hypothesized association between the observable and underlying latent variables was true. Using path analysis diagrams, CFA was employed to confirm the hypothesis while also denoting variables and components (Pallant, 2011). It was also employed as a method for evaluating or testing whether the measurement items accurately measured the specified constructs, with indicators that contributed successfully to the study being retained for further Structural Equation Modelling.

#### **3.1. Exploratory Factor Analysis**

Factor analysis is a technique for identifying factors among observable variables to extract a small number of factors from a large number of variables that can explain the variance observed in the larger number of variables (Hair, Black, Babin, Anderson & Tatham, 2006). Principal component analysis was employed to see if items extracted through EFA were related.

The matrix in Table 1 contains the coefficients or loadings that were used to express the item in terms of the components. The range of the pattern matrix loading indices is 0 to 1.0, where 0 denotes the absence of any relationship between the variables and 1.0 denotes the perfect relationship between the variables and a factor pattern. The average factor loading should be greater than 0.7, according to Byrne (2006). The factor loadings, according to the results, range from 0.867 to 0.908. Only 4 items, per the results, satisfied the loading criteria of 0.7 and were retained for further analysis.

**Table 1: Component Matrix for Investor Awareness**

	<b>Component 1</b>
<b>IA1-</b> I am knowledgeable about Kenya's real estate market	.906
<b>IA2-</b> My membership to REITs Association of Kenya (RAK) has Provided insightful market research and databases that that can be practically used by members	.908
<b>IA3-</b> I am able to access with ease reports of the REITs issuing firm	.867
<b>IA4-</b> I usually follow and update myself on the REITs markets through the online platform which provides information regarding REITs	.875

Extraction Method: Principal Component Analysis  
a. 1 components extracted.

The component matrix factor loadings for Performance of REITs are shown in Table 2 and ranged from 0.728 to 0.817. According to the findings, five items met the 0.7 loading criterion and were kept for further analysis.

**Table 2: Component Matrix for Performance of REITs**

	<b>Component 1</b>
<b>RP1-</b> There is growth in residential projects (students hostels) being funded through REITs	.728
<b>RP2-</b> Appetite for REITs has grown since the value of real estate properties keeps on appreciating thus minimizing the risks of capital loss	.798
<b>RP3-</b> There has been increased competitive price discovery for residential properties (apartments) occasioned by REITs backed real estate projects	.746
<b>RP4-</b> There has been increased competitive price discovery for commercial properties (warehouses, offices, malls, shops) occasioned by REITs backed real estate projects	.817
<b>RP5-</b> REITs returns have decreased due rental defaults and low occupancy rates which have yielded low income	.737

Extraction Method: Principal Component Analysis.

### 3.2. Confirmatory Factor Analysis

The covariance and causal modelling of variables were tested by Confirmatory Factor Analysis utilizing Analysis of Moment Structures (AMOS). The degree to which the indicators represent latent variables is determined through CFA. Indicators that make a significant contribution to the study should be retained for Structural Equation Modelling (Hair, Black, Babin & Anderson, 2010). Factor loadings should be more than 0.5, according to Bayram (2013), which was the case in this study. Furthermore, the Critical value of 1.96 was used to determine whether the models were significant at a significance level of 0.05

## 4. FINDINGS AND DISCUSSION

The contribution of each of the investor awareness indicators to the latent construct (Investor Awareness) was tested using regression weights from Confirmatory Factor Analysis. According to the regression weights, all of the factor loadings by standardized beta estimates were statistically significant ( $p < 0.05$ ). This demonstrates that the indicators grouped effectively to measure the various constructs, confirming the study's findings. Table 3 and Figure 1 present the results.

**Table 3: Regression Weights and C.R Values for Investor Awareness**

			Estimate	S.E.	C.R.	P
REITs Performance	<---	Investor_Awareness	.030	.058	.520	.603
IA1	<---	Investor_Awareness	1.136	.089	12.722	***
IA2	<---	Investor_Awareness	1.150	.090	12.758	***
IA3	<---	Investor_Awareness	.931	.094	9.897	***
IA4	<---	Investor_Awareness	1.000			

P<0.05\*\*

According to Table 3, there is no significant association between investor awareness and performance of REITs in Kenya. This is because the standard path coefficients on the influence of investor awareness on the performance of REITs were found to be statistically insignificant ( $\beta = 0.030$ , calculated t-value = 0.520,  $P>0.05$ ). The calculated t-value of the coefficient of investor awareness was discovered to be less than 1.9, the usual normal distribution critical ratio. This indicates that one additional unit increase in performance of REITs was linked to 0.40 units increase in investor awareness. Hence, the study concluded that there is no statistically influence of investor sentiments on performance of REITs in Kenya. The findings are inconsistent with those of Prabakaran (2018) who examined the stock market awareness and performance of stocks invested in India and showed that there exists a relationship between investor awareness and performance of stocks invested. The study concluded that without prior knowledge or information, investors can lose heavily. The results are, however, in agreement with those of Ricciardi (2008) who asserted that investors are not able to absorb all information, thus they become selective as to which information can consciously receive their attention, and thus determine their awareness level of regulatory policies held constant. The results are consistent with those of Kaur and Bharucha (2021) who looked into the connection between Indian mutual fund investor behavior and investor awareness. The study found that there was no significant influence of investor awareness on investment behaviour in the mutual funds' industry. Further, the result of CFA hypothesis testing was confirmed using regression analysis to enrich the findings.

**Table 4: Coefficients with Investor Awareness as a Predictor**

Model		Unstandardized Coefficients		Standardized	t	Sig.
		B	Std. Error	Coefficients Beta		
1	(Constant)	3.670	.226		16.202	.000
	Investor Awareness	.040	.055	.056	.715	.476

a. Dependent Variable: performance of REITs

Results from Table 4 further show that as investor awareness rises by one unit, REIT performance in Kenya rises by 0.040 units. As a result, the analysis concluded that, investor awareness has no statistically significant influence on REIT performance in Kenya. The findings are in line with those of Kaur and Bharucha (2021), who looked at the connection between investor awareness and investment behaviour in Indian mutual funds. The study found that there was no significant influence of investor awareness on investment behaviour in the mutual funds' industry. Further, the findings are in agreement with those of Ricciardi (2008) who asserted that investors are not able to absorb all information, thus they become selective as to which information can consciously receive their attention, and thus determine their awareness level of regulatory policies held constant. The following regression model was fitted.

Performance of REITs = 3.670+0.040 Investor awareness

## 5. CONCLUSION

From the findings, investors are knowledgeable about Kenya's real estate market, and their membership in the REITs Association of Kenya has provided insightful market research and databases. Such investors can access with ease reports of the REITs issuing firm. Although investors usually follow and update themselves on the REITs markets through the online platform, such awareness does not influence the level of performance of REITs in Kenya. Further, there are minimal publicity campaigns carried on by the Capital Markets Authority and the Nairobi Securities Exchange to sensitize potential investors on REITs. It can be concluded that although efforts have been put in place to ensure investors' awareness of real estate securities, such efforts have not boosted the uptake of REITs among investors. Investor awareness efforts employed by Capital Markets Authority in conjunction with the REITs Association of Kenya are not likely to enhance the performance of REITs in Kenya. The results indicate that REITs uptake has not attained a critical mass necessary to create liquidity in the capital market. Based on the findings, there is minimal publicity campaigns carried on by the Capital Markets Authority to sensitize potential investors on REITs. It is recommended that the Capital

Markets Authority review the existing market legislation that governs the listing of REITs especially policies on tax for issuance of REITs. In conjunction with the ministry of finance, CMA should consider exempting stamp duty which is charged during the transfer of property into a REIT firm. The Capital Markets Authority should ensure that investors are provided with minimum return guarantees to create confidence in REITs market.

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