# The Role Of Financial Risk Tolerance And Financial Advisor Management In Mediating The Relationship Between Financial Attitudes, Financial Knowledge, Financial Anxiety, And Sustainable Financial Retirement Planning

<sup>1</sup>Hamzeh Alhawamdeh , <sup>2</sup>Ghaith N. Al-Eitan , <sup>3</sup>Mohammad Naser Hamdan , <sup>4</sup>Yousef Ali Mahmoud Al-Hayek , <sup>5</sup>Omar Zraqat , <sup>6</sup>Abbas Mohammad Alhawamdeh , <sup>7</sup>Lina Fuad Hussien , <sup>8</sup>\*Bashar Younis Alkhawaldeh

<sup>1</sup>Associate Professor, Department of Administrative Sciences, Faculty of Business, Jerash University, PO. Box 26150

> hamzeh.alhawamdeh@jpu.edu.jo hamzehhawamdeh@hotmail.com https://orcid.org/0000-0002-6515-9333

<sup>2</sup>Department of Finance and Banking, School of Business, Al al-Bayt University, Mafraq 25113, Jordan

ghaith.eitan@aabu.edu.jo
https://orcid.org/0000-0002-2364-1500

<sup>3</sup>Associate Professor, Vice Dean of Business School,
Accounting Department, Al al-Bayt University, Mafraq 25113, Jordan
<a href="mailto:mohd">mohd</a> naser78@aabu.edu.jo

<sup>4</sup>Ministry of Local Administration.

yousefalhayek@yahoo.com

<sup>5</sup>Assistant Professor, Accounting Department, Faculty of Business, Jerash University, PO. Box 26150 omarmfz@hotmail.com

<sup>6</sup>Assistant Professor, Department of Administrative Sciences, Faculty of Business, Jerash University, PO. Box 26150

aalhawa@me.com

https://orcid.org/0009-0005-0097-7078

<sup>7</sup>Associate Professor, Accounting Department, Faculty of Business, Jerash University, PO. Box 26150

lina\_fuad@hotmail.com

Department of Financial and Banking Sciences, Faculty of Business, Jerash University, PO. Box 26150

> basharyounes@yahoo.com b.khawaldeh@jpu.edu.jo https://orcid.org/0000-0002-4921-5702

#### Abstract

ISSN: 2197-5523 (online)

Purpose: The aim of this study is to examine how financial risk tolerance and the engagement of a financial advisor management affect the relationship between financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning. **Design/methodology/approach**: The data were gathered from 384 self-employed people in Jordan's northern area. The data was analysed using partial least square structural equation modelling (PLS-SEM). Findings: The results show that retirement planning is highly impacted by financial attitudes, financial knowledge, and financial anxiety. Additionally, this association is mediated by financial risk tolerance and the presence of a financial advisor management. Research, Practical and Social implications: The findings highlight the need of taking into account people's risk tolerance and seeking advice from a financial advisor management when forming sustainable financial retirement planning. With the help of this study, policymakers, financial experts, and self-employed people in Jordan will have a better grasp of the variables affecting retirement planning, and they will get knowledge on how to improve their own financial readiness for retirement. **Originality/value:** The value of the study uniquely explores financial risk tolerance and advisor management's mediating roles, leveraging PLS-SEM, enhancing sustainable retirement planning strategies.

Keywords: Financial Attitudes, Financial Anxiety, Financial Knowledge, PLS-SEM, Sustainable Financial Retirement Planning.

#### Introduction

The shift from the workforce to a new stage of life is marked by retirement, which is a key turning point in a person's life. Even while some people might choose to stay longer, a number of causes, including age discrimination, forced retirement, falling productivity, health problems, and labour market changes, frequently force people to retire. Several crucial stages must be taken into account in order to achieve a well-planned retirement. First, people should determine their retirement needs while they are still working. It's important to comprehend how much financial assistance is required throughout retirement (Mahmood et al., 2020; Garcia Mata, 2021). Prioritising early savings will help you build up the assets you'll need for post-retirement support. It's crucial to take into account how significant life events may affect a person's financial condition in retirement (Hoffmann & Plotkina, 2020). For people with little savings or assets, unforeseen bills might be difficult to manage. Therefore, preventing such problems requires careful preparation. Retirees should concentrate on doing so with the least amount of debt possible, especially those with modest salaries. Because traditional pension systems are less prevalent in the 21st century and people frequently have to rely on their personal resources, financial retirement planning is even more important (Tan & Singaravelloo, 2020). People who actively plan their finances can efficiently manage their income, match their financial goals with their beliefs, and take the required steps to reach their objectives. For those who are close to retirement, it is highly advised to get competent financial advice. These experts may offer insightful counsel on crucial actions to take before to retiring, assisting people in making knowledgeable choices and navigating the difficulties of financial planning (Alhawamdeh, et al., 2020; Chatterjee, & Fan, 2023).

ISSN: 2197-5523 (online)

According to Jordan's Minimum Retirement Age Act, men must be at least 60 years old to retire, while women must be at least 55 (AlHawamdeh et al., 2016; Alhawarin & Selwaness, 2019; Al-Hawamdeh, 2020). This indicates that once they reach the required age, people of the corresponding genders are qualified to retire and get retirement benefits. The act also specifies the requirements, including a minimum amount of payments, for receiving an old-age pension. Individuals must have made at least 180 contributions, of which 60 must have been actual contributions, in order to be eligible for the pension. Both employers and employees in Jordan contribute to the funding of the pension system. Old-age, disability, and death insurance mandate employers to make an 11% deduction from employee salaries. However, employees are required to pay 6.5% of their salaries as a contribution to these insurances (Alhawamdeh, Alsmairat, 2019; Al Sayyed, & Othman, 2021). Additionally, businesses that hire people for dangerous jobs are required to make a 1% extra contribution to the pension fund (Bogataj et al., 2019). These contributions from companies and employees support the provision of retirement benefits to qualified persons while ensuring the financial viability of the pension system. The government of Jordan is committed to helping its inhabitants during their retirement years (Al Hawamdeh, 2021), as seen by the Minimum Retirement Age Act. The act intends to give pensioners financial stability and ensure that they may maintain a respectable quality of living after leaving the working by establishing a minimum retirement age and contribution requirements (Kawar, Nimeh, & Kool, 2022). Additionally, it encourages a just and equal system in which pension payments are paid for by both employers and employees.

Globally, living standards and life expectancies have significantly improved in recent years as a result of globalisation. Due to decreasing death rates, this has led to a steady rise in the number of people in the world who are 60 or older (O'Driscoll et al., 2021). The future is expected to see a higher proportion of senior people than children, with a commensurate rise in the number of elderly workers, as societal and economic trends continue to impact our world. Due to worries about having insufficient retirement funds to cover rising living costs and high healthcare costs in old age, Jordan's lack of effective retirement planning has come to light (Mohammad & Darwish, 2022). Furthermore, from 1975 to 2015, the dependency ratios significantly increased. These elements emphasise how important it is to address retiree issues and their financial retirement planning.

In order to assure a stable financial future during their post-employment years, people must carefully consider their retirement plans. However, a number of variables, such as financial attitudes, financial knowledge, financial anxiety, the role of financial risk tolerance, and the use of financial advisor management, might affect how effective retirement planning is (Harlow et al., 2020). For the purpose of creating successful ways to encourage sustainable financial retirement planning, it is essential to comprehend how these aspects interact with one another. Individuals' financial behaviours and decisions, particularly when it comes to retirement planning, are significantly influenced by their financial attitudes, knowledge, anxiety, and risk tolerance. While negative attitudes may prevent motivation, positive attitudes are linked to prudent financial decisions and successful retirement planning. Financial literacy helps people make better decisions and plan for retirement by empowering them to handle their money wisely (Alkhawaldeh & Mahmood, 2021; Alkhawaldeh et al., 2020; Alkhawaldeh et al., 2022; Salleh et al., 2022). Retirement planning might be hampered by financial anxiety since it makes people ignore or put it off. Retirement portfolio asset allocation and investment choices are influenced by financial risk tolerance (Brandon-Joseph, 2023). Gaining insight into decision-making and risk preferences requires an understanding of how risk tolerance mediates the interaction between attitudes, knowledge, anxiety, and retirement planning. Financial advisor management are essential because they offer direction, knowledge, and tailored advice. The development of initiatives to encourage positive attitudes, improve financial literacy, reduce anxiety, and customise advice to risk tolerance is a task for policymakers, institutions, and advisers. Planning for retirement is made easier and more sustainable with this insight. This study attempts to investigate the factors that affect Jordanian self-employed people's financial retirement planning. This study seeks to better understand financial retirement planning and the efforts necessary to maintain one's lifestyle after retirement in order to offer Jordanians who work for themselves useful insights and advice. The formation of hypotheses, a thorough explanation of the technique, an analysis of the results, and a conclusion follow a thorough assessment of the body of prior research.

ISSN: 2197-5523 (online)

## **Literature Review**

#### **Prospect Theory**

Prospect Theory can be used to support the suggested relationships between financial risk tolerance, the use of a financial advisor management, financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning. Prospect Theory, which was created by Daniel Kahneman and Amos Tversky, sheds light on how people make decisions when faced with risk and uncertainty (Winger, 2021). Prospect Theory holds that rather than evaluating outcomes based on empirical probability, people evaluate probable outcomes based on subjective value. According to this idea, people take less

risk when there are rewards and more risk when there are losses (Prietzel, 2020). Depending on their financial attitudes, expertise, and anxiety levels, people may have varying risk preferences when it comes to retirement planning. Individuals' willingness to accept financial risks is reflected by their financial risk tolerance, which is a crucial element of the suggested relationship (Samsuri, et al., 2019). According to the prospect theory, a person's financial attitudes, such as their level of risk aversion or risk-seeking behaviour, might have an impact on their risk preferences. Higher risk-takers might be more eager to invest a larger percentage of their retirement funds in securities that have higher potential returns but also higher volatility. A person with a reduced risk tolerance, on the other hand, would favour more cautious investing options with lower potential returns but lower volatility (Wang et al., 2020). The involvement of a financial advisor management can also serve as a moderator in the interaction between prospective theory-based sustainable financial retirement planning and financial attitudes, knowledge, and worry. According to Malkawi and Al Hawamdeh (2018) and Ebrahimigharehbaghi et al. 2022, financial advisers can offer knowledge and advice in determining risk preferences, setting reasonable retirement goals, and creating effective investment strategies. They can facilitate the relationship between these variables and sustainable financial retirement planning by assisting people in making decisions that are in line with their financial attitudes, knowledge, and risk preferences. In addition, Prospect Theory contends that people's perspectives on gains and losses are asymmetrical. People could be less motivated by equal gains than by losses. Financial anxiety can affect people's decision-making by multiplying the detrimental effects of prospective losses on their retirement funds (Fraihat, et al. 2023; Giannikos, et al., 2023). Financial anxiety is a reflection of people's fear or tension about their financial condition. In this situation, financial advisor management can offer confidence and support to reduce financial concern and help people plan financially sustainable retirements (Alhawamdeh, 2021).

ISSN: 2197-5523 (online)

## **Social Comparison Theory**

According to Leon Festinger's Social Comparison Theory, people gauge their own skills, viewpoints, and characteristics by evaluating how they compare to others. According to this idea, people naturally seek out social comparisons to learn more, support their own opinions, and assess their own performance in a variety of areas, including money and retirement planning (Unkelbach, et al., 2023). According to the Social Comparison Theory, people may make comparisons with others who share their financial attitudes, knowledge, and levels of worry in the context of sustainable financial retirement planning. Individuals can evaluate their own financial readiness, investment preferences, and retirement planning progress through these comparisons (Kearney, 2023). People may be inspired to take action and better their personal financial status if they believe they are lagging behind their colleagues or others who are financially successful in retirement planning. Social comparisons can also have

an impact on financial risk tolerance, which is a significant component of the suggested link (Al-Waely et al., 2021; Zhang et al., 2022). People may contrast their levels of risk tolerance with those of their peers or those they view as financially successful. Individuals' ideas of what is deemed an acceptable or desirable risk tolerance in retirement planning can be influenced by these comparisons. According to Lehyeh et al. (2021; Mohd Isa & Daukin 2023), social comparisons can have an impact on people's financial views and how important sustainable financial retirement planning is to them. Based on the Social Comparison Theory, a financial advisor management 's engagement may serve as a mediating factor. Individuals can receive professional guidance, information, and solutions from financial advisor management to help them benchmark their retirement planning progress and compare their financial condition to that of others. Financial advisor management can serve as a point of reference for people, offering assurance and direction based on their knowledge and experience working with previous clients (Athota et al., 2023). Individuals can use societal comparisons to their advantage by consulting with a financial advisor management and applying what they learn to their own retirement planning choices. In conclusion, the Social Comparison Theory affirms the importance of social comparisons in how people assess their financial attitudes, knowledge, anxiety, risk tolerance, and sustainable financial retirement planning (Haniyi, et al., 2020). This link is supported by research. Social comparisons can affect people's views, drives, and retirement planning behaviours. Involving a financial advisor management might make it easier for people to compare themselves to others by giving them a point of reference and professional advice. Understanding how social comparisons affect the mediating role of financial risk tolerance and financial advisor management involvement in the relationship between financial attitudes, knowledge, anxiety, and sustainable financial retirement planning can be improved by incorporating concepts from the social comparison theory.

ISSN: 2197-5523 (online)

#### **Hypotheses Development**

Planning for retirement is crucial if someone wants to save enough money to sustain their preferred standard of living after retirement. A sound personal financial plan is the first step towards more responsible handling of one's financial resources (Alshebami & Aldhyani, 2022). Findings from a study on the financial planning experiences of younger workers (Sousa-Ribeiro et al., 2022) show that the process of generating long-term financial planning for retirement often overwhelms these workers.

## Financial Attitudes, Financial Knowledge, Financial Anxiety, and Sustainable Financial Retirement Planning

There is an expanding body of research on financial attitudes and sustainable retirement planning (Kim & Hanna, 2021). Given their impact on saving and investment behaviours, researchers contend that financial attitudes are important factors influencing retirement planning behaviour (Lusardi, Mitchell,

& Curto, 2022). Financial management proactivity is frequently accompanied by increased financial literacy, which facilitates sustainable retirement planning (Sekita, 2022). Retirement planning is impacted by gender differences in financial attitudes, with women typically being more conservative (Hudon & Perrier, 2022). Additionally, it has been noted that social and cultural factors influence financial attitudes (Van Rooij, Lusardi, & Alessie, 2021). These data led this study to suggest that:

ISSN: 2197-5523 (online)

# H1a: There is significant and positive effect of financial attitudes on sustainable financial retirement planning

In recent years, there has been a significant increase in financial knowledge and sustainable financial retirement planning. Researchers have suggested a direct connection between financial knowledge and retirement planning (Lusardi, Mitchell, & Curto, 2021). As people are better able to make educated financial decisions, a higher level of financial education frequently coincides with enhanced retirement readiness (Sekita, 2022). According to Hudon and Perrier (2022), gender variations in financial knowledge have an impact on retirement planning, with women typically having less financial knowledge and, as a result, being less prepared for retirement. Additionally, retirement planning is substantially impacted by one's comprehension of complicated financial products (Davies & Blake, 2022). The impact of socioeconomic differences in financial knowledge on retirement planning has also been studied (Van Rooij, Lusardi, & Alessie, 2021). This implies the necessity for demographically-based targeted financial education. These data led this study to suggest that:

## H1b: There is significant and positive effect of financial knowledge on sustainable financial retirement planning

In recent empirical work, the relationship between "Financial Anxiety and Sustainable Financial Retirement Planning" has drawn attention. Evidence suggests that worrying about money may make it more difficult to plan for retirement (Kim, Garman, & Sorhaindo, 2022). High financial anxiety patients frequently put off or avoid making financial decisions, which can impair their readiness for retirement (Archuleta, Dale, & Spann, 2022). In their work, Hudon and Perrier (2023) demonstrate how financial education can significantly reduce financial worry and promote better retirement planning practises. The significance of context-sensitive therapies is shown by the fact that socioeconomic characteristics can also worsen financial anxiety (Van Rooij, Lusardi, & Alessie, 2023). These data led this study to suggest that:

# H1c: There is significant and negative effect of financial anxiety on sustainable financial retirement planning

## Financial Attitudes, Financial Knowledge, Financial Anxiety, and Financial Risk Tolerance

ISSN: 2197-5523 (online)

Recent empirical studies on "Financial Attitudes and Financial Risk Tolerance" have highlighted how closely related these ideas are. It has been found that a person's financial attitudes and willingness to assume financial risk are positively correlated (Grable & Lytton, 2021). Higher risk tolerance is typically correlated with more positive financial attitudes, which influences investing decision-making. This is supported by a study by Yao, Gutter, and Hanna (2022), which contends that people who have a proactive financial attitude are more likely to take financial risks. People with negative financial attitudes, on the other hand, are more inclined to adopt risk-averse financial behaviours. Men generally exhibit higher risk tolerance than women do (Barber & Odean, 2022). Gender disparities in financial views and risk tolerance are also a topic. Underscoring the complexity of this link, socioeconomic and cultural factors can also have an impact on these correlations (Van Rooij, Lusardi, & Alessie, 2023). These data led this study to suggest that:

## H2a: There is significant and positive effect of financial attitudes on financial risk tolerance

Recent years have seen a major expansion in the empirical literature on financial knowledge and financial risk tolerance, which points to a significant correlation between the two. According to Grable and Lytton (2021), a greater risk tolerance is frequently correlated with having a deeper understanding of financial concepts. These people are better able to manage any dangers related to financial decisions. Financial knowledge, according to Yao, Gutter, and Hanna (2022), is essential for determining risk tolerance and affecting investing decisions and strategies. Low risk tolerance might be shown in conservative financial behaviour brought on by a lack of financial knowledge. There are also notable differences between men and women in terms of financial knowledge and risk tolerance (Barber & Odean, 2022). These data led this study to suggest that:

## H2b: There is significant and positive effect of financial knowledge on financial risk tolerance

In empirical investigations, the connection between "Financial Anxiety and Financial Risk Tolerance" has drawn increasing attention. According to research, there is a link between financial anxiety and risk tolerance, with those who have more financial anxiety being less risk-tolerant (Zhou & Hanna, 2022). Because they are concerned about prospective losses, people like this have a tendency to make risk-averse financial decisions. According to Archuleta, Dale, and Spann (2022), people's perceived risks of investing might cause financial anxiety. Han, Gutter, and Kim (2021) discovered a similar pattern: people with high financial anxiety frequently have less diverse investment portfolios, which suggests a conservative investing approach and low risk tolerance. Socioeconomic factors also come into play, with income levels and financial

stability having an impact on risk tolerance and financial anxiety (Van Rooij, Lusardi, & Alessie, 2023). Financial education, according to Hudon and Perrier (2022), may reduce financial anxiety while potentially boosting risk tolerance. These data led this study to suggest that:

ISSN: 2197-5523 (online)

## H2c: There is significant and positive effect of financial anxiety on financial risk tolerance

## Financial Attitudes, Financial Knowledge, Financial Anxiety, and Financial advisor management

Recent years have seen a remarkable growth in the empirical literature for the study of Financial Attitudes and Financial advisor management. According to research, those with favourable financial views are more likely to use advisors, highlighting the importance of financial attitudes in adviser utilisation (Collins & O'Rourke, 2021). According to studies, trust is a key component in this connection, and people with good financial attitudes are more likely to trust and work with financial advisor management as a result (Hung, Yoong, & Brown, 2022). In addition, gender inequalities have been noted, with women being less likely to seek out professional financial guidance despite having usually more conservative financial attitudes (Barber & Odean, 2022). These data led this study to suggest that:

## H3a: There is significant and positive effect of financial attitudes on financial advisor management

According to the empirical research on financial knowledge and financial advisers, financial knowledge significantly influences whether or not people seek out the assistance of financial advisor management. According to Collins and O'Rourke (2021), people who are more financially literate are more inclined to interact with financial advisor management because they are aware of the value that advisors can provide to their financial decision-making process. On the other hand, Yao, Gutter, and Hanna (2022) suggest that those with little financial knowledge might also seek help to make up for their ignorance. It's interesting to note that there are gender gaps in financial knowledge, with women more likely than males to seek out professional guidance (Barber & Odean, 2022). These data led this study to suggest that:

## H3b: There is significant and positive effect of financial knowledge on financial advisor management

In recent empirical work, the interaction between "Financial Anxiety and Financial advisor management" has been a major theme. According to Archuleta, Dale, and Spann (2022), people with high levels of financial anxiety are more likely to use financial advisor management to lessen their stress and uncertainty. On the other hand, some people who experience financial anxiety could shun financial counsellors out of mistrust or fear, which could prolong their financial misery (Hung, Yoong, & Brown, 2022). As a result, there is a

complex relationship between financial concern and using financial advisor management that may be influenced by a number of circumstances. There are gender inequalities that have been noted, with women being more likely to seek out professional financial guidance because they typically have higher levels of financial concern (Barber & Odean, 2022). A crucial finding is that financial education plays a critical role in lowering financial concern and promoting the use of financial advisor management (Lusardi, Mitchell, & Curto, 2022). These data led this study to suggest that:

ISSN: 2197-5523 (online)

## H3c: There is significant and positive effect of financial anxiety on financial advisor management

## Financial Risk Tolerance, Financial advisor management, and Sustainable Financial Retirement Planning

Important information about how risk tolerance affects retirement planning may be found in the empirical research on financial risk tolerance and sustainable financial planning. Due to their increased readiness to invest in potentially high-return assets, people with higher financial risk tolerance are thought to be more likely to have viable retirement plans, according to researchers like Yao, Gutter, and Hanna (2022). Barber and Odean (2022) also discovered that gender had a major impact, with males being more inclined to choose aggressive investment methods due to their higher risk tolerance. This could possibly result in retirement plans that are more sustainable. However, better retirement results do not always follow from having a larger risk tolerance. Due to probable market volatility, overly risky techniques may result in unsustainable retirement planning (Grable & Lytton, 2021). These data led this study to suggest that:

## H4a: There is significant and positive effect of financial risk tolerance on sustainable financial retirement planning

In recent years, the body of empirical work on "Financial advisor management and Sustainable Financial Retirement Planning" has significantly expanded. The employment of financial advisor management frequently leads to more sustainable retirement planning, according to Yao, Gutter, and Hanna's research (2022), primarily because of expert guidance and improved investment diversification. According to Hanna, Waller, and Finke (2022), using a financial advisor management can enhance retirement savings rates, improving financial security in retirement. The effectiveness of financial advisor management, however, varies depending on the client-advisor relationship, the calibre of the advice, and the client's financial knowledge (Hung, Yoong, & Brown, 2023). These data led this study to suggest that:

## H4b: There is significant and positive effect of financial advisor management on sustainable financial retirement planning

#### **Role of Financial Risk Tolerance**

Financial risk tolerance is crucial to the process of making financial decisions since it affects a variety of things, including the kind of investments one makes, their financial planning, and their readiness for retirement (Thanki et al., 2022). It relates to how much people are prepared to put up with uncertainty and possible loss in order to make financial decisions that could result in higher returns. The foundation of successful personal financial management and financial planning is knowing one's risk tolerance. An individual's financial risk tolerance has a big impact on their investment choices. People who have a highrisk tolerance are more likely to invest in risky assets like equities, which have a larger risk of losing money but also higher potential profits (Covey, 2022). In contrast, people who are not comfortable taking risks frequently favour safer assets like bonds or savings accounts, which have lower returns but lower risks (Ali et al., 2020; Park & Martin, 2022). Therefore, a person's investment portfolio's composition and, consequently, their potential for wealth generation are directly influenced by their risk tolerance. Retirement planning is significantly influenced by one's financial risk tolerance as well (Rahies et al., 2022). larger risk-takers might feel more at ease postponing guaranteed income sources like pensions in favour of investments that could offer larger returns, which could result in more sustainable retirement income (Owusu et al., 2023). On the other side, those who are less risk-tolerant would appreciate the security of income streams that are assured, possibly forgoing better profits in favour of a reduced risk. These decisions have a direct impact on how financially prepared a person is for retirement (Che Hassan et al., 2023). Additionally, one important aspect of managing one's personal finances is one's tolerance for financial risk. It influences choices about spending, saving, and borrowing. For instance, a person with a high-risk tolerance may be more eager to borrow money to support large-ticket investments or expenditures (Rosario, 2023). Individuals with poor risk tolerance, on the other hand, could put saving before borrowing and concentrate on creating a safety net for their finances. Though risk tolerance is a crucial component of financial decision-making, it must be matched with financial objectives, one's stage in life, and market conditions (Ali et al., 2019; Mendoza et al., 2023). As extremely hazardous methods might result in big losses, having a high-risk tolerance does not always translate into better financial success. Similar to this, taking on too little risk might lead to lost investment opportunities and insufficient wealth growth (Ghadwan et al., 2022). Therefore, in order to make wise financial decisions that are in line with one's financial goals and circumstances, it is essential to have a complete awareness of one's financial risk tolerance as well as competent financial counsel and preparation. Last but not least, financial risk tolerance is not constant and can alter over time depending on variables including income fluctuations, changes in family circumstances, financial knowledge, and market conditions (Hisamuddin et al., 2021; Al-Waely et al., 2021; Kashif et al., 2022). In order to maintain alignment between financial strategies and decisions and changing financial goals and circumstances, it is crucial to regularly analyse one's risk tolerance. As a result, this study will use the financial advisor management 's function as a mediating variable and offer the following hypotheses:

ISSN: 2197-5523 (online)

H5: There is mediating effect of financial risk tolerance on the relationship between financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning

## Role of Financial advisor management

Financial advisors are the people to consult for professional knowledge on financial planning. They play a crucial role in guiding clients in areas such as investment planning, debt reduction, retirement preparation, and asset security. Particularly in Jordan, working as a financial advisor management requires certification from the Certified Financial Planner (CFP) programme, relevant work experience and academic credentials, and a Securities licence obtained through successful test taking (Dobson, 2022). From the perspective of retirement planning, their expertise often aids clients in setting attainable objectives, diversifying their investments, and enhancing their preparation (Fan, et al., 2022). Numerous factors, such as an individual's financial outlook, degree of knowledge, and demographic features, play a role in whether or not they decide to see an expert (Gerace et al., 2022). Since not everyone uses a financial counsellor, it's important to keep in mind that their advice may vary in quality and may not always improve matters. For this reason, having a financial advisor management may improve one's self-control and empower them to make better choices regarding their retirement savings (Ali, et al., 2022). Kim et al. used a propensity score matching method to examine whether or not using a financial counsellor was associated with continuing to save for retirement. Retirement planning was found to be the primary reason for saving among households that used financial advisor management, as opposed to those that did not (Fang et al., 2022). However, Sommer et al.'s (2022) research revealed no proof that hiring a financial advisor management influenced a client's decision to start saving for retirement. To clarify the connection between the dependent and independent variables, Baron and Kenny propose including a third variable as a mediating factor. In light of the financial advisor management 's potential position as a mediator, the following hypotheses will guide this investigation.

H6: There is mediating effect of financial advisor management on the relationship between financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning

It is clear from the discussion that further work has to be done to examine the effect of financial risk tolerance and the financial adviser as a mediating variable between these four factors (financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning). Therefore, the study suggests the research framework shown in Fig. 1.

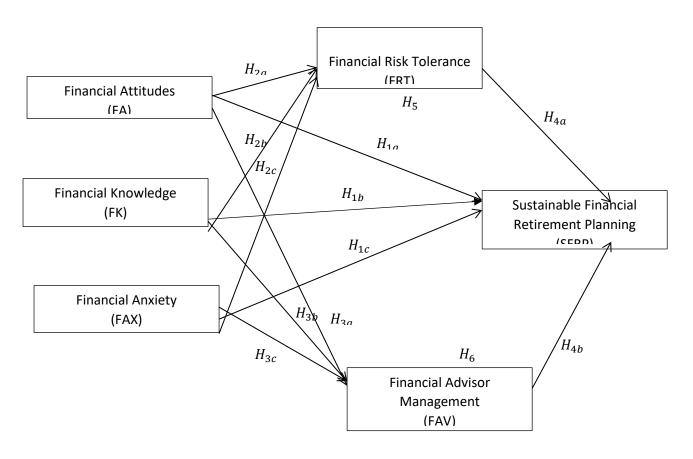


Fig 1 Research Framework
Prepared by the authors (2023)

## Methodology

In order to investigate the direct connections between financial attitude, financial knowledge, financial anxiety, and financial retirement planning, a quantitative technique was used in this study. It also assessed the financial advisor management 's ability to mediate these relationships. The goal of this study is to examine the hypothesis emphasising the influence of independent variables on the dependent variable as well as the mediating effect that might strengthen these interactions. In a given situation, hypothesis testing often clarifies the nature of particular interactions, establishes disparities between groups, or establishes the independence of two or more components (Alkhawaldeh, et al., 2023). Data were gathered once through a questionnaire survey and a cross-sectional methodology. This approach attempted to record respondents' opinions on the subject at hand. The study used the table created by Sekaran and Bougie utilising a sample size formula to get the sample size from a specific population. There were 188,765 small and medium-sized businesses (SMEs) in the entire population. Sekaran and Bougie's table indicates that 383 SMEs should be included in the sample. Individual SME owners served as the analysis unit in this study, and their replies reflected their views as independent contractors. A ten-point Likert scale was used to measure the data (Alkhawaldeh et al., 2023). Measurement tools for sustainable financial retirement planning (SFRP) were modified from Mustafa et al. (2023), Mustafa et al. (2023), Kaiser et al. (2022), Gondaliya (2022), Mustafa et al. (2023), Mustafa et al. The SmartPLS 4 software was used to do data analysis utilising statistical techniques, notably the partial least squares structural equation modelling (PLS-SEM) method. This approach, which is popular in social sciences and management research, makes it easier to calculate relationships between path models and latent variables. The structural model and the measurement model are the first two stages of the PLS-SEM analysis.

## **Findings and Discussion**

#### **Assessment of Measurement Model**

The PLS analysis starts with a review of the measurement model, also referred to as the outer model. The two most crucial criteria employed in PLS analysis to assess measurement models are validity and reliability (Alkhawaldeh, et al., 2023). These two measurement model evaluation criteria were used to produce the outcomes of item reliability, construct internal consistency reliability, convergent validity utilising outer loading, composite reliability, average variance explained (AVE), and discriminant validity.

## **Construct Internal Consistency Reliability**

Estimates of composite reliability (CR) were utilised to gauge the internal consistency of the measurement model. Alkhawaldeh et al. (2023) suggest employing a CR coefficient threshold of at least 0.70 for evaluating the constructs' dependability. CR is favoured above other measures like Cronbach's alpha because it can provide more accurate estimates of a construct's dependability by relaxing the tau-equivalence (equal item component loading) assumption, as stated by Hair et al. (2019). Table 2 displays the results for internal consistency reliability, including Cronbach's alpha, composite reliability, and the number of participants who agreed with the statement that the construct was reliable. Significantly, all measures utilised had Cronbach's alphas and composite reliability scores more than 0.70, indicating good reliabilities. These findings show that the constructs used in the study are sufficiently consistent and reliable.

**Table 1 Internal Consistency Reliability** 

	Cronbach's Alpha	Composite Reliability (rho_a)	Composite Reliability (rho_c)
FA	0.862	0.862	0.901
FAV	0.912	0.913	0.93
FAX	0.875	0.875	0.906
FK	0.834	0.842	0.884
FRT	0.794	0.812	0.860
SFRP	0.888	0.889	0.911

Prepared by the authors (2023)

## **Construct Convergent Validity**

By examining the outer loadings of individual indicators and the average variance extracted (AVE), we were able to establish convergent validity for the concepts of financial risk tolerance, financial advisor management, financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning. Each item's loading should be bigger than 0.708, as suggested by Hair et al. (2019). In order to ensure conformity with the aforementioned requirement, all products with loadings lower than 0.708 were omitted. As can be seen in Table 2, FRT3 failed to make the cut since its loading value was lower than 0.708, which was a prerequisite. Thus, FRT3 was taken out of the equation. In addition, the AVE values for all of the constructs were greater than the minimum threshold of 0.50, indicating strong convergent validity for the measurement model.

ISSN: 2197-5523 (online)

**Table 2 Convergent validity** 

	Factor Loading	AVE
Financial Attitudes (FA)		0.646
FA1	0.812	
FA2	0.835	
FA3	0.861	
FA4	0.768	
FA5	0.738	
Financial Advisor Management (FAV)		0.655
FAV1	0.837	
FAV2	0.801	
FAV3	0.821	
FAV4	0.836	
FAV5	0.769	
FAV6	0.801	
FAV7	0.801	
Financial Anxiety (FAX)		0.618
FAX1	0.799	
FAX2	0.849	
FAX3	0.833	
FAX4	0.739	
FAX5	0.748	
FAX6	0.742	
Financial Knowledge (FK)		0.607
FK1	0.725	
FK2	0.867	
FK3	0.834	
FK4	0.799	
FK5	0.750	
Financial Risk Tolerance (FRT)		0.557
FRT1	0.831	

FRT2	0.879	
FRT3	Deleted	
FRT4	0.756	
FRT5	0.776	
Sustainable Financial Retirement Planning (SFRP)		0.561
SFRP1	0.727	
SFRP2	0.735	
SFRP3	0.704	
SFRP4	0.796	
SFRP5	0.770	
SFRP6	0.790	
SFRP7	0.717	
SFRP8	0.746	

Prepared by the authors (2023)

## **Discriminant validity**

Discriminant validity, as defined by Hair et al. (2019), is the degree to which one construct may be distinguished from another. The low degree of agreement between the relevant measurements and other measures used to evaluate different elements is what sets it apart, as stated by Alkhawaldeh et al. (2023). In this study, we evaluated the discriminant validity of the HTMT ratio of correlations and the Fornell-Larcker criterion [58]. The study passed the Fornell-Larcker criterion because the square root of the average variance extracted (AVE) for each construct was higher than the correlations between the construct and other constructs. In addition, the discriminant validity was established due to the fact that all measures had HTMT correlation ratios of less than 0.85. The fact that the bootstrap confidence intervals never contained the value 1 also lent credence to the data's discriminant validity. Tables 3 and 4 demonstrate that there were less out-of-diagonal than diagonal correlation coefficients between constructs, indicating that all measures satisfied the criterion for discriminant validity.

Table 3 Fornell-Larcker Criterion Discriminant validity

	FA	FAV	FAX	FK	FRT	SFRP
FA	0.804					
FAV	0.616	0.810				
FAX	0.563	0.672	0.786			
FK	0.642	0.662	0.657	0.779		
FRT	0.599	0.689	0.568	0.551	0.789	
SFRP	0.654	0.632	0.596	0.568	0.666	0.749

Prepared by the authors (2023)

**Table 4 HTMT Discriminant validity** 

	FA	FAV	FAX	FK	FRT	SFRP
FA						
FAV	0.617					
FAX	0.676	0.777				
FK	0.593	0.787	0.601			
FRT	0.668	0.642	0.737	0.546		
SFRP	0.576	0.519	0.600	0.611	0.636	

Prepared by the authors (2023)

In this study, the measurement model had high degrees of convergent, discriminant, and internal consistency reliability. These results show that the study's measurement methodologies for assessing retirement planning sustainability, financial risk tolerance, adviser attitudes, knowledge, and anxiety are accurate and reliable.

#### **Assessment of Structural Model**

The structural model in this research investigates the links between exogenous (individual) factors (financial attitudes, financial knowledge, and financial anxiety) and endogenous (retirement planning) variables (financial risk tolerance, and financial adviser). The structural model was evaluated by computing the coefficient of variance explained (R2), establishing the level of construct collinearity, and evaluating the significance of the path coefficients, all as suggested by Hair et al. (2019). To ensure the structural model did not have any collinearity issues, a collinearity analysis was conducted as recommended by Hair et al. (2019). The VIF (variance inflation factor) was determined as part of this study. According to Hair et al. (2019), this VIF range is optimal. We can rule out significant lateral multicollinearity because none of the VIF values in Table 5 are greater than 3.0. By taking these measures, the study guarantees that the structural model is free of collinearity and allows for an accurate evaluation of the connections between the key variables.

**Table 5 Variance Inflation Factor (VIF)** 

	FAV	FRT	SFRP
FA	2.509	1.767	2.163
FAX	2.862	2.321	2.634
FK	2.541	1.654	2.33
FAV			2.817
FRT			2.298

Prepared by the authors (2023)

To determine the statistical significance of both the direct and indirect path coefficients, bootstrapping was used in this work [60]. The direct path coefficients were calculated using a bootstrap sample of 5000, as advised by

Hair et al. (2019), to reliably quantify the significance of the links between variables in the structural models. Table 6 displays the outcomes of the PLS structural model, including empirical t-values indicated by the values in the arrow's brackets and the path coefficients denoted by the Beta value. The result presented in Table 6 and Fig 2 reveal significant correlations. Firstly, Financial Attitude (FA) shows a significant and positive impact on Sustainable Financial Retirement Planning (SFRP) with a Beta value of 0.262, a T-value of 6.252, and a P-value less than 0.05. This indicates that an increase of 1 unit in FA corresponds to a 0.262-unit increase in SFRP. Furthermore, the result demonstrates that Financial Knowledge (FK) also has a significant and positive impact on SFRP with a Beta value of 0.256, a T-value of 4.341, and a P-value less than 0.05. This suggests that a 1-unit increase in FK is associated with a 0.256unit increase in SFRP. On the contrary, Financial Anxiety (FAX) presents a significant but negative impact on SFRP, with a Beta value of -0.169, a T-value of 2.390, and a P-value less than 0.05. This indicates that a 1-unit increase in FAX results in a 0.169-unit decrease in SFRP. The findings presented in Table 6 and Fig 2 demonstrate significant correlations. Firstly, Financial Attitude (FA) has a considerable and positive impact on Financial Risk Tolerance (FRT), as evidenced by a Beta value of 0.216, a T-value of 4.231, and a P-value less than 0.05. This suggests that an increment of 1 unit in FA would lead to an increase of 0.216 unit in FRT. Similarly, the result shows that Financial Knowledge (FK) also significantly and positively influences FRT, as indicated by a Beta value of 0.249, a T-value of 3.476, and a P-value less than 0.05. This finding denotes that a 1-unit increase in FK corresponds to a 0.249-unit increase in FRT. Interestingly, Financial Anxiety (FAX) also demonstrates a substantial and positive impact on FRT. This is evident with a Beta value of 0.489, a T-value of 8.997, and a P-value less than 0.05. This indicates that a 1-unit increase in FAX results in a significant increase of 0.489 unit in FRT. The correlations presented in Table 6 and Fig 2 indicate key relationships. Firstly, Financial Attitude (FA) demonstrates a significant and positive influence on Financial advisor management usage (FAV), with a Beta value of 0.244, a T-value of 4.480, and a P-value less than 0.05. This indicates that an increment of 1 unit in FA corresponds to a rise of 0.244 unit in FAV. Additionally, the data shows that Financial Knowledge (FK) also has a meaningful and positive effect on FAV, illustrated by a Beta value of 0.258, a T-value of 4.385, and a P-value less than 0.05. This suggests that a 1-unit increase in FK equates to a 0.258-unit increase in FAV. Interestingly, Financial Anxiety (FAX) shows a significant and positive impact on FAV as well, as indicated by a Beta value of 0.464, a T-value of 7.440, and a P-value less than 0.05. This suggests that a 1 unit rise in FAX corresponds to a substantial increase of 0.464 unit in FAV. The result presented in Table 6 and Fig 2 demonstrate important correlations. It is evident that Financial Risk Tolerance (FRT) has a substantial and positive impact on Sustainable Financial Retirement Planning (SFRP), with a Beta value of 0.417, a T-value of 6.756, and

a P-value less than 0.05. This suggests that a 1-unit increase in FRT would result in a corresponding rise of 0.417 unit in SFRP. Additionally, the findings reveal

that the usage of a Financial advisor management (FAV) has a significant and positive effect on SFRP. This is indicated by a Beta value of 0.211, a T-value of 3.296, and a P-value less than 0.05. This suggests that an increment of 1 unit in FAV would result in a 0.211-unit increase in SFRP.

**Table 6 Path Analysis** 

Path Analysis	В	STD	T	Р	Decision
FA -> SFRP	0.262	0.042	6.252	0.000	Supported
FK -> SFRP	0.256	0.059	4.341	0.000	Supported
FAX -> SFRP	-0.169	0.071	2.390	0.017	Supported
FA -> FRT	0.216	0.051	4.231	0.000	Supported
FK -> FRT	0.249	0.072	3.476	0.001	Supported
FAX -> FRT	0.489	0.054	8.997	0.000	Supported
FA -> FAV	0.244	0.055	4.480	0.000	Supported
FK -> FAV	0.258	0.059	4.385	0.000	Supported
FAX -> FAV	0.464	0.062	7.440	0.000	Supported
FRT -> SFRP	0.417	0.062	6.756	0.000	Supported
FAV -> SFRP	0.211	0.064	3.296	0.001	Supported

Prepared by the authors (2023)

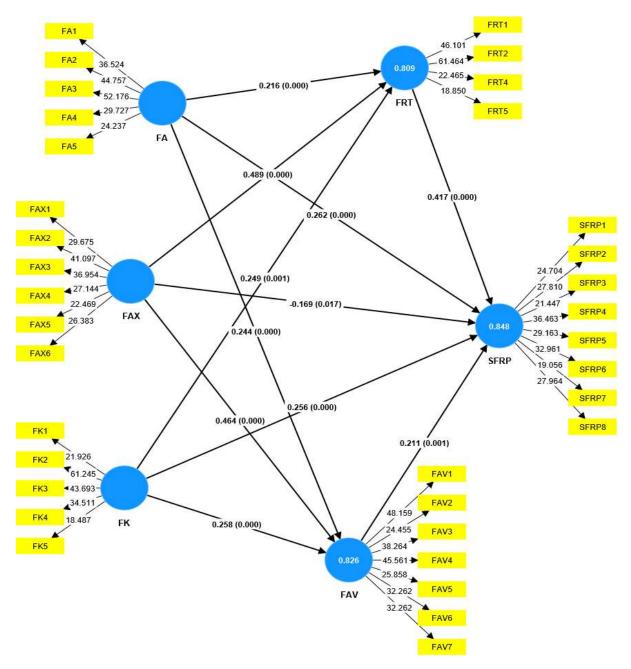


Fig 2 Path Analysis
Prepared by the PLS-SEM (2023)

## **Mediation Analysis**

In this study, the proposed mediation link was tested following the guidelines provided by Preacher and Hayes (2004, 2008). The mediation was identified through the indirect effect, using the bootstrapping method. Preacher and Hayes (2008) suggest that if the 95% boot confidence interval (CI: LL-UL) for the indirect effect doesn't include "0", mediation can be inferred. The results pertaining to the mediation hypotheses are presented in Table 7. The bootstrap results in Table 7 indicated a significant indirect effect (FA ->FRT->FAV-> SFRP, = 0.142, t-value=4.240) at p<0.01. Since the 95% Boot CI (LL= 0.082, UL= 0.214) doesn't encompass 0, this confirmed the existence of mediation. Likewise, the

indirect effect (FAX -> FRT->FAV-> SFRP, = 0.302, t-value=7.020) was also significant at p<0.01 as per Table 7's bootstrap results. The 95% Boot CI (LL= 0.086, UL= 0.232) for this effect doesn't include 0, providing further evidence of mediation. Moreover, the bootstrap results showed a significant indirect effect (FK -> FRT->FAV-> SFRP, =0.158, t=4.320) at p<0.05. Since the 95% Boot CI for this effect (LL= 0.224, UL= 0.390) doesn't overlap 0, this also confirmed the mediation. Consequently, it can be concluded that, in the context of Jordan, Financial Risk Tolerance and Financial advisor management do serve as positive mediators in the relationship between financial attitudes, financial knowledge, financial anxiety, and sustainable financial retirement planning.

#### **Table 6 Indirect Effect**

Path Analysis	В	STD	T	Р	Decision
FA ->FRT->FAV-> SFRP	0.142	0.033	4.240	0.000	Supported
FAX -> FRT->FAV-> SFRP	0.302	0.043	7.020	0.000	Supported
FK -> FRT->FAV-> SFRP	0.158	0.037	4.320	0.000	Supported

Prepared by the authors (2023)

#### **Discussion**

Financial planning is a cornerstone for securing a comfortable future postretirement. If not handled properly, retirement could turn into a difficult stage, especially if retirees experience financial difficulties. Those who have not made adequate preparations for retirement may find themselves forced to continue working past the retirement age in order to cover daily costs. To provide financial security for retirees and their family members as well as a happy retirement, adequate financial preparation is essential. In line with earlier research, the results show that financial attitudes have a significant favourable impact on financial retirement planning (Cabler, 2019). A person's awareness of their current financial situation can be improved by having a knowledgeable financial attitude, which is essential for retirement planning. Regularly keeping track of monthly expenses can help people save money and prevent unnecessary spending, which is essential for effective retirement financial planning (Lusardi & Mitchell, 2007). The study's findings support earlier studies by showing a significant positive impact of financial knowledge on financial retirement planning. An individual's capacity to design a successful retirement plan and maximise investment returns can be improved by having a solid understanding of financial ideas and instruments (Lusardi & Mitchell, 2011). This can lead to better financial well-being in retirement. Financially savvy people are also probably better able to negotiate complex financial markets and choose wisely when it comes to investing in and saving for retirement (Hastings, Madrian, & Skimmyhorn, 2013). According to the study's findings, financial worry has a significant detrimental impact on financial retirement planning, which is consistent with past research. Effective financial planning for retirement has been demonstrated to be hampered by financial anxiety, which is described as a type of anguish or unease related to personal financial

situations (Archuleta et al., 2013). High levels of financial worry can cause people to put off or delay important financial decisions, such planning for retirement (Britt et al., 2015). A larger inclination for short-term financial behaviour may also be present in people with higher levels of financial concern, frequently to the expense of long-term financial objectives like retirement savings (Xiao & Porto, 2017). The results support earlier research in this area by indicating that financial attitudes, financial knowledge, and financial anxiety considerably positively influence financial risk tolerance and the usage of financial advisor management. More specifically, it has been found that two important factors contribute to better financial risk tolerance: having a positive financial attitude and having more financial knowledge. As they are more likely to comprehend the potential benefits and losses connected with different financial instruments, people with positive financial attitudes and in-depth financial knowledge are frequently more at ease with financial risks (Grable & Lytton, 1999). Additionally, people who have a strong understanding of finance and a favourable attitude towards money may be more likely to use the services of financial advisor management. Their capacity to appreciate the advantages of expert counsel in financial decision-making processes can be related to this behaviour (Robb et al., 2012). It's interesting to note that a higher level of financial worry has also been associated with a greater propensity to consult financial experts. This may be because people believe that expert counsel can reduce worry by offering individualised financial strategies and solutions (Hackethal et al., 2012). According to the study's findings, using a financial counsellor and being willing to take on financial risk both have a significant favourable impact on financial retirement planning. These findings are consistent with past studies. Prior studies have shown a positive association between retirement planning and financial risk tolerance. People who feel more at ease taking financial risks are frequently more engaged and conscientious in their retirement planning. These people often recognise the value of investing and are prepared to take the associated risks in order to ensure they have enough money for retirement (Grable, 2000). Regarding the influence of financial advisor management, research indicates that getting expert guidance is quite beneficial for retirement planning (Collins & Urban, 2020). Advisors can provide individuals with specialised expertise and approaches that they may lack. Individuals may negotiate complicated financial issues, make wise decisions, and efficiently plan for retirement with the assistance of a financial advisor management. According to the study's findings, financial knowledge, financial anxiety, and sustainable financial retirement planning are all positively mediated by financial risk tolerance and the presence of a financial advisor management. The body of literature currently in existence supports these findings. Higher levels of financial risk tolerance, when taken into account as a mediator for financial knowledge and attitudes on retirement planning, enable people to make more knowledgeable and assured decisions about investments for retirement (Grable & Lytton, 1999). On the other hand, it lessens the negative effects of money worries and enables people to take calculated risks for long-term financial gain (Yao, Hanna, & Lindamood, 2004). Financial advisor management' mediation function is equally essential, in a similar way. Financial knowledge and sustainable retirement planning can be positively correlated when advisors transform it into workable plans (Marsden, Zick, & Mayer, 2011). They can also change people's attitudes about money to one that is more focused and disciplined, which will enhance retirement outcomes. Additionally, according to a 2009 study by Hung, Clancy, Dominitz, Talley, Berrebi, and Sallee, financial advisor management can help people manage their financial anxiety by offering them strategies (Hung, Clancy, Dominitz, Talley, Berrebi, & Sallee). These findings highlight the crucial role that risk tolerance and financial advice play in enhancing the beneficial impacts of financial knowledge and attitudes and in reducing the negative effects of financial anxiety on retirement planning.

ISSN: 2197-5523 (online)

#### Conclusion

Retirement is an important stage in life since it signals the change from many years of hard labour to a time of leisure at home. But careful planning is necessary for a fulfilling retirement, with financial readiness being a key aspect. Without enough savings, retirees may experience financial challenges, especially when dealing with unforeseen circumstances like high medical costs, which are more likely to occur as people age. Thus, managing such unforeseen events requires excellent financial planning for retirement. The main goal of this study is to pinpoint the important variables affecting Jordanian selfemployed people's financial retirement planning. A conceptual model illustrating financial retirement planning among the self-employed population is the study's final output. Participants received self-administered surveys as part of the quantitative research approach used in this study. The goal was to pinpoint important elements influencing Jordanian independent professionals' financial retirement planning. The results of this study showed a substantial direct relationship between the dependent variable, financial retirement planning, and three independent variables, financial attitude, financial knowledge, and financial anxiety. The association between financial attitude, financial knowledge, financial anxiety, and financial retirement planning was also found to be positively mediated by financial risk tolerance and the function of a financial advisor management. For anyone wishing to comprehend the crucial elements affecting healthy financial retirement planning among independent contractors in Jordan, these insights could be of great value.

## **Managerial Implication**

The findings of this study have important implications for future retirees, younger generations, and policymakers. Regardless of their socioeconomic status, policymakers should make increasing understanding of financial retirement planning a top priority among all independent contractors. Policymakers can enable independent workers to successfully plan for retirement by educating them and giving them the tools, they need. The results

of the study are also directly applicable to independent contractors. They can use the ideas examined in this study to create retirement plans that are tailored to each person's particular situation. Self-employed people can improve their financial readiness and make wise decisions for a safe retirement by embracing the highlighted criteria. The younger generation is also affected by the results of this study. Younger people understand the difficulties saving for retirement may provide, even with a guaranteed income, given the rising expenses of goods and services. Younger generations can proactively address these issues and take efforts towards creating a solid financial foundation for their future retirement by recognising the elements influencing financial retirement planning.

ISSN: 2197-5523 (online)

## **Limitations of the Study**

This study has some shortcomings even though it offered insightful information. The data was only collected from Jordan's Northern region's self-employed people; thus, it might not be indicative of the entire nation or other employment types. Additionally, because the study's focus was mostly on quantitative research, certain qualitative aspects that may have an impact on retirement planning may have been missed. To improve generalizability, future research might take into account a larger and more varied sample from other geographical locations and occupational categories. Additionally, incorporating qualitative techniques like focus groups or interviews may help us understand things more deeply. Finally, to provide a more complete picture of retirement planning, the possible contribution of additional variables, such as cultural influences, financial technology, or market dynamics, may be investigated.

## References

and marketing, 9(4), 95.

Al Hawamdeh, A. (2021). Perceptions of Human Resource Management Strategies by Employees at Private Universities in Jordan (Doctoral dissertation, Alliant International University).

AL SAYYED, S. M. M., & OTHMAN, D. O. H. (2021). The extent to which the Social Security Institution in Jordan adheres to the requirements of International Accounting Standard No (19) for employee benefits. Journal of Contemporary Issues in Business and Government Vol, 27(3), 2552.

Al-Hawamdeh, H. M. (2020). The Intermediate Role of Organizational Flexibility in the Impact of Using Information Technology on the Efficiency of the Application of IT Governance in Jordanian Industrial Companies. Modern Applied Science, 14(7), 1-75. Alhawamdeh, H. M., & Alsmairat, M. A. (2019). Strategic decision making and organization performance: A literature review. International review of management

AlHawamdeh, H., Al-Hawamdeh, E., & Faour, A. (2016). An Overview of Job Engagement in Jerash Private University: Job Engagement and its Influence on Job Performance. European J. Bus. Manag, 8(18), 161-176.

Alhawamdeh, M., Jaradat, G., & Alhawamdeh, H. (2020). Deep learning techniques to diagnose COVID-19 big data based on features extracted from CT and x-ray images. International Journal of Applied Engineering Research, 15(8), 873-883.

ALHAWAMDEH, T. (2021). The Impact of Business Process Reengineering on Cost Reduction of International Business Operating in the Middle East. The Journal of Asian Finance, Economics and Business, 8(10), 87-95.

Alhawarin, I., & Selwaness, I. (2019). The Challenges of Social Security Coverage and Early Retirement in Jordan. The Jordanian Labor Market: Between Fragility and Resilience, 313.

Ali, M. A. S., Ammer, M. A., & Elshaer, I. A. (2022). Determinants of Investment Awareness: A Moderating Structural Equation Modeling-Based Model in the Saudi Arabian Context. Mathematics, 10(20), 3829.

Ali, O. A. M., Matarneh, A. J., Almalkawi, A., & Mohamed, H. (2020). The impact of cyber governance in reducing the risk of cloud accounting in Jordanian commercial banksfrom the perspective of Jordanian auditing firms. Modern Applied Science, 14(3), 75-89.

Ali, O., Al-tahat, S., Al-Duleemi, K., Al-Afeef, J., & Al-hawamdah, H. (2019). The Impact of the Decisions of the COBIT 5 Committee on the Effectiveness of the Internal Control Systems in the Jordanian Industrial Joint Stock Companies. The Journal of Social Sciences Research, 5(11), 1587-1599.

Alkhawaldeh, B. Y. S., Al-Zeaud, H. A., & Almarshad, M. N. (2022). Energy Consumption as a Measure of Energy Efficiency and Emissions in the MENA Countries: Evidence from GMM-Based Quantile Regression Approach. International Journal of Energy Economics and Policy, 12(5), 352-360.

Alkhawaldeh, B. Y., & Mahmood, S. (2021). The Effect of Government Support for Fuel and Wheat on Economic Growth in Jordan: An Application of Dynamic Autoregressive-Distributed Lag.

Alkhawaldeh, B. Y., Mahmood, S., & Jakada, A. H. (2020). An empirical assessment of the effect of taxes and interest rate on economic growth in Jordan: an application of dynamic autoregressive-distributed lag. Research in World Economy. 11 (3), 1, 7.

Alkhawaldeh, B., Y., Alhawamdeh H., Al-Afeef M., A., M., Al-Smadi, A., W., Almarshad, M., Fraihat, B., A., M., Soumadi, M., M., Nawasra, M., & Alaa A., A., (2023). The effect of financial technology on financial performance in Jordanian SMEs: The Role of Financial Satisfaction. Uncertain Supply Chain Management, 11(3), 1-12.

Alshebami, A. S., & Aldhyani, T. H. (2022). The interplay of social influence, financial literacy, and saving behaviour among Saudi youth and the moderating effect of self-control. Sustainability, 14(14), 8780.

Al-Waely, D., Al Hawamdeh, H., & Al-Taee 3rd, H. (2021). Designing an Investment Portfolio for Innovative Solutions to Control the Crisis Market during the Covid-19 Pandemic. Indian Journal of Economics and Business, 20(2).

Al-Waely, D., Fraihat, B. A. M., Al Hawamdeh, H., Al-Taee, H., & Al-Kadhimi, A. M. M. N. (2021). Competitive Intelligence Dimensions as a Tool for Reducing the Business Environment Gaps: An Empirical Study on the Travel Agencies in Jordan. Journal of Hunan University Natural Sciences, 48(11).

Archuleta, K. L., Dale, A., & Spann, S. M. (2013). College students and financial distress: Exploring debt, financial satisfaction, and financial anxiety. Journal of Financial Counseling and Planning, 24(2), 50-62.

Archuleta, K., Dale, A., & Spann, S. (2022). Financial Anxiety and Retirement Planning. Journal of Financial Counseling and Planning.

Athota, V. S., Pereira, V., Hasan, Z., Vaz, D., Laker, B., & Reppas, D. (2023). Overcoming financial planners' cognitive biases through digitalization: A qualitative study. Journal of Business Research, 154, 113291.

Barber, B. & Odean, T. (2022). Gender, Financial Attitudes, and Risk Tolerance. Journal of Financial Economics.

Barber, B., & Odean, T. (2022). Gender, Financial Anxiety, and Financial Advisor Usage. Journal of Financial Economics.

Bogataj, D., Battini, D., Calzavara, M., & Persona, A. (2019). The ageing workforce challenge: Investments in collaborative robots or contribution to pension schemes, from the multi-echelon perspective. International journal of production economics, 210, 97-106.

Brandon-Joseph, L. (2023). Three essays on the relationship between financial worry and financial behaviors (Doctoral dissertation).

Britt, S. L., Klontz, B., Tibbetts, R., & Leitz, L. (2015). The financial health of mental health professionals. Journal of Financial Therapy, 6(1), 17-32.

Cabler, S. (2019). Financial discipline and its impact on retirement planning. Journal of Financial Stability, 38, 66-78.

Chatterjee, S., & Fan, L. (2023). Surviving in financial advice deserts: limited access to financial advice and retirement planning behavior. International Journal of Bank Marketing, 41(1), 70-106.

Che Hassan, N., Abdul-Rahman, A., Mohd Amin, S. I., & Ab Hamid, S. N. (2023). Investment Intention and Decision Making: A Systematic Literature Review and Future Research Agenda. Sustainability, 15(5), 3949.

Collins, J. M., & O'Rourke, C. M. (2021). Financial Literacy and Financial Advisor Usage. Journal of Personal Finance.

Covey, C. (2022). Impact of Risk Perception and Risk Tolerance on Investment Portfolio Decisions.

Davies, G. & Blake, D. (2021). Trust in Financial Institutions and Retirement Planning. Journal of Pension Economics & Finance.

Davies, G., & Blake, D. (2022). Understanding Financial Products and Retirement Planning. Journal of Retirement.

Dobson, R. (2022). Make Simplicity Your Superpower! Communication Hacks Every Financial Advisor Should Know. Sound Wisdom.

Ebrahimigharehbaghi, S., Qian, Q. K., de Vries, G., & Visscher, H. J. (2022). Application of cumulative prospect theory in understanding energy retrofit decision: A study of homeowners in the Netherlands. Energy and Buildings, 261, 111958.

Fan, Y. E., Foo, Q. Y., Hoh, S. N., & Khor, Y. P. (2022). The effect of covid-19 pandemic on retirement planning. Evidence from private employed persons (Doctoral dissertation, UTAR).

Fang, J., Hao, W., & Reyers, M. (2022). Financial advice, financial literacy and social interaction: what matters to retirement saving decisions?. Applied Economics, 54(50), 5827-5850.

Fraihat, B. A. M., Abozraiq, A. M., Alkasawneh, M. W. A., Alghasawneh, Y. S. S., Almasarweh, M. S., & Alaa, A. A. (2023). The Impact of Total Quality Management (TQM) in the Performance of Information Technology Startup's at King Hussein Business Park. International Journal of Professional Business Review: Int. J. Prof. Bus. Rev., 8(5), 70.

Garcia Mata, O. (2021). The effect of financial literacy and gender on retirement planning among young adults. International Journal of Bank Marketing, 39(7), 1068-1090.

Gerace, A., Rigney, G., & Anderson, J. R. (2022). Predicting attitudes towards easing COVID-19 restrictions in the United States of America: The role of health concerns, demographic, political, and individual difference factors. Plos one, 17(2), e0263128.

Ghadwan, A., Wan Ahmad, W. M., & Hanifa, M. H. (2022). Financial Planning for Retirement: The Mediating Role of Culture. Risks, 10(5), 104.

Giannikos, C. I., Kakolyris, A., & Suen, T. S. (2023). Prospect theory and a manager's decision to trade a blind principal bid basket. Global Finance Journal, 100806.

Gondaliya, V. (2022). Financial Anxiety, Financial Literacy and their Relationship with Financial Advice Seeking: A Literature Review. Journal of Management Research, 22(1), 28-38.

Grable, J. & Lytton, R. (2021). Financial Attitudes and Risk Tolerance. Journal of Personal Finance.

Grable, J. E., & Lytton, R. H. (1999). Financial risk tolerance revisited: the development of a risk assessment instrument. Financial Services Review, 8(3), 163-181.

Grable, J., & Lytton, R. (2021). Financial Literacy and Risk Tolerance. Journal of Personal Finance.

Grable, J., & Lytton, R. (2021). Risk Tolerance and Sustainable Retirement Planning. Journal of Personal Finance.

Hackethal, A., Haliassos, M., & Jappelli, T. (2012). Financial advisors: A case of babysitters? Journal of Banking & Finance, 36(2), 509-524.

Han, S., Gutter, M., & Kim, J. (2021). Financial Anxiety and Investment Portfolio Diversification. Financial Planning Review.

Haniyi, A. K. A., Alwag, A. A., Alhawamdeh, H., & Alzoub, N. A. (2020). ENTREPRENEURSHIP AND ITS IMPACT ON PERFORMANCE. PalArch's Journal of Archaeology of Egypt/Egyptology, 17(3), 149-156.

Hanna, S., Waller, W., & Finke, M. (2022). Financial Advisor Impact on Retirement Savings Rates. Journal of Financial Counseling and Planning.

Harahap, S., Thoyib, A., Sumiati, S., & Djazuli, A. (2022). The Impact of Financial literacy on Retirement Planning with Serial Mediation of Financial Risk Tolerance and Saving Behavior: Evidence of Medium Entrepreneurs in Indonesia. International Journal of Financial Studies, 10(3), 66.

Harlow, W. V., Brown, K. C., & Jenks, S. E. (2020). The use and value of financial advice for retirement planning. The Journal of Retirement, 7(3), 46-79.

Hastings, J. S., Madrian, B. C., & Skimmyhorn, W. L. (2013). Financial literacy, financial education, and economic outcomes. Annual Review of Economics, 5, 347-373.

Hisamuddin, S. B., Albattat, A., & Kassim, A. A. M. (2023). The Effect of Perceived Risk, Perception of Covid-19, Subjective Norm, Financial Condition And Attitude on Tourists' Behavioural Intention During Pandemic: Case of Malaysian Tourists. International Journal of Professional Business Review, 8(6), e0479-e0479.

Hoffmann, A. O., & Plotkina, D. (2020). Why and when does financial information affect retirement planning intentions and which consumers are more likely to act on them?. Journal of Business Research, 117, 411-431.

Hudon, T. & Perrier, E. (2022). Gender, Financial Literacy, and Retirement Planning. Journal of Retirement.

Hudon, T., & Perrier, E. (2022). Financial Education and Anxiety. Journal of Financial Therapy.

Hudon, T., & Perrier, E. (2022). Gender, Financial Literacy, and Retirement Planning. Journal of Personal Finance.

Hudon, T., & Perrier, E. (2023). Financial Education and Anxiety in Retirement Planning. Journal of Financial Therapy.

Hung, A., Yoong, J., & Brown, J. R. (2023). The Role of Financial Advisors in Retirement Planning. Journal of Pension Economics and Finance.

Kaiser, T., Lusardi, A., Menkhoff, L., & Urban, C. (2022). Financial education affects financial knowledge and downstream behaviors. Journal of Financial Economics, 145(2), 255-272.

Kashif, A. R., Qadri, U. A., Tahir, A. H., & Naz, A. (2022). Factors Affecting Expected Return and Re-investment Intention of Stock Market Investors: A Comprehensive Study on Human Psychology during Investment Decisions. Pakistan Journal of Social Sciences, 42(2), 467-478.

Kawar, M., Nimeh, Z., & Kool, T. A. (2022, September). From protection to transformation: Understanding the landscape of formal social protection in Jordan. Economic Research Forum (ERF).

Kearney, J. R. (2023). Conceptualizing Adolescent Social Media Usage through Social Comparison and Self-Discrepancy Theories (Doctoral dissertation, Regent University). Kim, J., Garman, E. T., & Sorhaindo, B. (2022). Financial Anxiety and Retirement Preparedness. Journal of Personal Finance.

Kim, K. & Hanna, S. (2021). The Role of Financial Attitudes in Retirement Planning. Journal of Financial Planning.

Lehyeh, S. A., Alharafsheh, M., Hanandeh, R., Abuaddous, M., & Al-Hawamdeh, H. (2021). The effects of total quality management practices on strategic performance using the BSC methodology: the mediating role of knowledge sharing. Academy of Strategic Management Journal, 20(6), 1-12.

Lusardi, A., & Mitchell, O. S. (2007). Baby Boomer retirement security: The roles of planning, financial literacy, and housing wealth. Journal of Monetary Economics, 54(1), 205-224.

Lusardi, A., & Mitchell, O. S. (2011). Financial Literacy and Planning: Implications for Retirement Wellbeing. In Financial Literacy: Implications for Retirement Security and the Financial Marketplace. Oxford University Press.

Lusardi, A., Mitchell, O. S., & Curto, V. (2021). Financial Literacy and Retirement Planning. Journal of Consumer Affairs.

Lusardi, A., Mitchell, O. S., & Curto, V. (2022). Financial Education and Sustainable Retirement Planning. Journal of Consumer Affairs.

Mahmood, S., Hussein, A., Alkhawaldeh, B., Ismail, S., & Musibau, H. O. (2020). Determinants of Human Capital Inequality in Developing Countries: Generalized Method of Moments (GMM). Editorial Board, 407.

Malkawi, A., & Al Hawamdeh, H. (2018). The Impact of Commitment Time Sharing Companies by Applying the Standards of Corporate Governance in Creating Sustainable Employment Opportunities in Jordan. International Journal of Business and Management, 13(7), 230-230.

Mendoza, D. M., Padernal, A. M. G., Pante, E. M. S., Magbata, E. V. S., & Mandigma, M. B. S. (2023). Big Five Personality Traits and Financial Literacy: Effect on Risk Tolerance of Filipino Investors from Higher Education Institutions in Metro Manila. Review of Integrative Business and Economics Research, 12(2), 235-251.

Mohammad, T., & Darwish, T. K. (2022). Human resource Management in Jordan: Challenges and future prospects. HRM in the Global South: A Critical Perspective, 155-187.

Mohd Isa, M. Y., & Daukin, M. (2023). The influence of retirement goals and risk attitudes on Malaysian women's retirement planning. Cogent Economics & Finance, 11(1), 2195041.

Mustafa, W. M. W., Islam, M. A., Asyraf, M., Hassan, M. S., Royhan, P., & Rahman, S. (2023). The effects of financial attitudes, financial literacy and health literacy on sustainable financial retirement planning: The moderating role of the financial advisor. Sustainability, 15(3), 2677.

O'Driscoll, M., Ribeiro Dos Santos, G., Wang, L., Cummings, D. A., Azman, A. S., Paireau, J., ... & Salje, H. (2021). Age-specific mortality and immunity patterns of SARS-CoV-2. Nature, 590(7844), 140-145.

Owusu, G. M. Y., Korankye, G., Yankah, N. Y. M., & Donkor, J. B. A. (2023). Financial risk tolerance and its determinants: The perspective of personnel from security services in Ghana. Borsa Istanbul Review.

Park, H., & Martin, W. (2022). Effects of risk tolerance, financial literacy, and financial status on retirement planning. Journal of Financial Services Marketing, 1-10.

Prietzel, T. T. (2020). The effect of emotion on risky decision making in the context of prospect theory: a comprehensive literature review. Management Review Quarterly, 70(3), 313-353.

Rahies, M. K., Khan, M. A., Askari, M., Ali, Q., & Shoukat, R. (2022). Evaluation of the Impact of Risk Tolerance and Financial Literacy on InvestmentIntentions of Securities Investors in Pakistan using the Theory of Planned Behavior (TBP). Empirical Economic Review, 5(1), 104-137.

Robb, C. A., Babiarz, P., & Woodyard, A. (2012). The demand for financial professionals' advice: The role of financial knowledge, satisfaction, and confidence. Financial Services Review, 21(4), 291.

Rosario, E. P. (2023). Risk Tolerance of Small-to-Medium Enterprise Owners and Operators Towards Capital Markets: Evidence from the Philippines. The Journal of Asian Finance, Economics and Business (JAFEB), 10(1), 157-167.

Salleh, M., Wahab, S., Karim, M. R. A., & Lim, T. S. (2022). Financial literacy and behavioural disposition in retirement saving—A study on employee's preparedness for a fully defined contributionpension scheme in Malaysia. Kasetsart Journal of Social Sciences, 43(3), 619-628.

Samsuri, A., Ismiyanti, F., & Narsa, I. M. (2019). Effects of risk tolerance and financial literacy to investment intentions. International Journal of Innovation, Creativity and Change, 10(9), 40-54.

Sekita, S. (2022). Financial Literacy and Retirement Planning in Japan. International Review of Financial A Archuleta, K., Dale, A., & Spann, S. (2022). Financial Anxiety and Financial Advisor Usage. Journal of Financial Counseling and Planning.

Sekita, S. (2022). Financial Literacy and Retirement Planning in Japan. International Review of Financial Analysis.

Sommer, M., Lim, H., & MacDonald, M. (2022). Financial advisor use, life events, and the relationship with beneficial intentions. Financial Services Review, 30(1), 69-88.

Sousa-Ribeiro, M., Persson, L., Sverke, M., & Lindfors, P. (2022). Approaching retirement: A qualitative study of older nursing assistants' experiences of work in residential care and late-career planning. Journal of aging studies, 60, 100994.

Tan, S., & Singaravelloo, K. (2020). Financial literacy and retirement planning among government officers in Malaysia. International Journal of Public Administration, 43(6), 486-498.

Thanki, H., Shah, S., Sapovadia, V., Oza, A. D., & Burduhos-Nergis, D. D. (2022). Role of Gender in Predicting Determinant of Financial Risk Tolerance. Sustainability, 14(17), 10575.

Unkelbach, C., Alves, H., Baldwin, M., Crusius, J., Diel, K., Galinsky, A. D., ... & Mussweiler, T. (2023). Relativity in Social Cognition: Basic processes and novel applications of social comparisons. European Review of Social Psychology, 1-54.

Van Rooij, M., Lusardi, A., & Alessie, R. (2021). Socioeconomic Differences in Financial Knowledge and Retirement Planning. Journal of Financial Stability.

Van Rooij, M., Lusardi, A., & Alessie, R. (2023). Socioeconomic Factors and Financial Anxiety. Journal of Financial Stability.

Wang, Y., Zhang, L., Ding, Q., & Zhang, K. (2020). Prospect theory-based optimal bidding model of a prosumer in the power market. IEEE Access, 8, 137063-137073.

Winger, G. (2021). Risk Assessment: Prospect Theory and Civil–Military Affairs. In Oxford Research Encyclopedia of Politics.

Xiao, J. J., & Porto, N. (2017). Financial anxiety and financial capability in the United States. International Journal of Social Welfare, 26(3), 249-260.

Yao, R., Gutter, M., & Hanna, S. (2022). Financial Risk Tolerance and Sustainable Retirement Planning. Financial Services Review.

Zhang, M., Liu, Y., Zhang, W. Y., Yang, J. G., Yang, W. M., Zhou, J., & Mao, Z. M. (2022). Exploring perceived challenges of self-management in low-income older people with hypertension: A qualitative study. International Journal of Nursing Practice, 28(3), e13059.

Zhou, R. & Hanna, S. (2021). The Impact of Risk Tolerance on Retirement Savings. Financial Services Review.

Zhou, R., & Hanna, S. (2022). Financial Anxiety and Risk Tolerance. Financial Services Review.

Zhou, R., & Hanna, S. (2022). Risk Tolerance, Financial Knowledge, and Retirement Savings. Financial Services Review.

Zhou, R., & Hanna, S. (2023). Risk Tolerance and Financial Anxiety in Retirement Planning. Financial Services Review.