

The working relationship between internal and external auditors and the moral courage of internal auditors: Tunisian evidence

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Abstract

Purpose – This paper aims to examine the association between the working relationship between internal and external auditors and the moral courage of internal auditors to report management fraud in the Tunisian setting.

Design/methodology/approach – Data are gathered from 163 internal auditors working in Tunisian companies and a partial least squares–structural equation model (PLS-SEM) is used to test the hypothesis regarding the effect of the cooperation between internal and external auditors on internal auditors' moral courage.

Findings – The results of this study provide strong empirical support for the positive impact of the working relationship between internal and external auditors on internal auditors' moral courage to report management fraud and unethical behaviors.

Practical implications – The reported results increase the awareness of Tunisian regulators to enact regulations that strengthen the collaboration between internal and external auditors to promote internal auditors' moral courage and then limit fraud and improve organizational performance in the Tunisian setting.

Originality/value – This paper fills one of the major research gaps in internal audit and moral courage research streams by revealing that the courageous behavior of internal auditors can be fostered by specific means efficacy such as the working relationship between internal and external auditors.

Keywords Internal auditors, External auditors, Working relationship, Moral courage, Fraud, Tunisia

Paper type Research paper

1. Introduction

Recent financial scandals have emphasized the role played by internal auditors in reporting frauds and wrongdoings (Khelil, Hussainey, & Noubbigh, 2018; Khelil, 2022; Eulerich *et al.*, 2021; Christ *et al.*, 2021). However, the decision to report detected fraud is dependent on certain virtues and personal characteristics of internal auditors. In this regard, Khelil, Hussainey, and Noubbigh (2016) and Khelil, Akrouf, Hussainey, and Noubbigh (2018) posit that moral courage represents a key factor that can stimulate internal auditors' intentions to report fraud and unethical behaviors. Given this importance, it becomes crucial to understand the main factors that may enhance the courageous behaviors of internal auditors.

Extant literature dealing with the psychological characteristics of internal auditors has uncovered the developmental processes of internal auditors' moral courage (Khelil *et al.*, 2016; Khelil, Akrouf *et al.*, 2018; Khelil, Hussainey *et al.*, 2018). This is particularly true in emerging economies where the internal auditing profession is still trying to find its feet as a profession



with unregulated rights and duties (Khelil & Khlif, 2022). Therefore, this study aims to fill in this research gap by examining the effect of the working relationship between internal and external auditors on internal auditors' moral courage. It is worthy to note that the corpus of studies on the external auditor's evaluation of Internal Audit Function (IAF) quality represents the highest developed research area and the most chronic topic within auditing research studies (Behrend & Eulerich, 2019). However, research on the positive effect of internal–external auditor working relationships remains scarce (Behrend & Eulerich, 2019; Alzeban & Gwilliam, 2014).

Alzeban and Gwilliam (2014) advocate that the cooperation and coordination between internal and external auditors have long been viewed as important to the audit's benefits for the organization and external stakeholders. Examples of such coordination and cooperation include joint planning and exchange of information, opinions and reports to facilitate higher-quality audits.

Concerning our research objective, and to the best of our knowledge, only the study of Khelil, Hussainey *et al.* (2018) has qualitatively addressed the significant role of the working relationship between internal and external auditors in promoting moral courage among internal auditors. Internal auditors interviewed by Khelil, Hussainey *et al.* (2018) explain that strong collaboration with their external counterparts makes them feel more confident and supported. The present study extends this qualitative work by conducting an empirical inquiry dealing with the effect of the working relationship between these two groups on internal auditors' moral courage. Thus, the question raised by this study is: "what is the effect of the working relationship between internal and external auditors on internal auditors' moral courage?"

Based on the social cognitive theory developed by Bandura and the efficacy model of Eden (2001), this paper hypothesizes that the strong collaboration between internal and external auditors leads to increased moral courage of internal auditors. Under the model of internal–external efficacy of Eden (2001), the working relationship between internal and external auditors may represent a specific mean efficacy [1] that can foster the moral courage of internal auditors in Tunisian companies (Khelil, Hussainey *et al.*, 2018).

The choice of the Tunisian context is motivated by the previous conclusions of Khelil and Khlif (2022) that the fear of negative consequences is the main reason for the failure of internal auditors to perform their tasks effectively. Moreover, previous literature has advocated that Tunisia represents an excellent example of a MENA country where internal auditors can play a critical role in combating corruption and protecting firms from wrongdoings (Murphy & Albu, 2018; Khelil, 2022; Khelil & Khlif, 2022).

A total of 163 questionnaires were administered to internal auditors working in Tunisian companies, and a partial least squares–structural equation modeling (PLS-SEM) was used to test the hypothesis regarding the effect of the cooperation between internal and external auditors on internal auditors' moral courage. Although the advantage of utilizing SEM has been recognized in several precedent studies, SEM is still underused by accounting and auditing works compared with associated disciplines such as management and information systems (Hampton, 2015).

The findings of this study show that the working relationship between internal and external auditors is positively and significantly associated with internal auditors' moral courage. Therefore, the collaboration between these two groups represents a key factor in enhancing the courageous behaviors of internal auditors to report illegal wrongdoings. Thus, Tunisian regulators should enact regulations that strengthen this collaborative relationship to enhance the courageous behaviors of Tunisian internal auditors as they still operate within a jurisdictional void with no formal rules regulating their roles and duties (Khelil & Khlif, 2022).

Noting that Tunisia is adopting an approach to enhance transparency and good corporate governance, revealing what encourages internal auditors to break their silence and behave ethically can help perform this goal. Indeed, auditing literature support that an ethical

internal audit function can improve corporate governance by reporting financial irregularities, reducing administrative corruption and deterring employee theft (Gramling, Maletta, Schneider, & Church, 2004; Asiedu & Deffor, 2017; Khelil, 2022).

It is believed that telling the truth by reporting management fraud has various beneficial effects not only for organizations but for society as a whole (Balafoutas, Czermak, Eulerich, & Fornwagner, 2020; Khelil, 2022). Indeed, previous evidence has shown that reporting wrongdoing has protected the interests of several stakeholders

including employees, consumers, minority investors and citizens since it allows the company to continue the activity and avoid bankruptcy (Miceli, Near, & Schwenk, 1991; Harbour & Kisfalvi, 2014).

It should be noted that our results can be relevant not only for the Tunisian setting but also for the international context and particularly for MENA [2] countries as they share close cultural and institutional characteristics (Al-Akra *et al.*, 2016; Khelil, 2022).

The remainder of the paper is organized as follows. Section 2 presents the social cognitive theory. In section 3 this paper reviews relevant literature and develop the hypothesis. In section 4, this paper discusses the research methodology. The interpretation of the results is provided in section 5 and discussed in section 6. Section 7 concludes the paper.

2. Social cognitive theory

Social cognitive theory also named as the theory of efficacy beliefs, which has been developed by Bandura (1986) reveals beliefs of efficacy as a crucial concept that guide people and motivate their actions (Bandura, 1997; Eden, 2001, Eden, Ganzach, Flumin-Granat, & Zigman, 2010). According to Bandura (2000), perceived efficacy plays a key role in human functioning because it directly influences behavior, expectations, aspirations and goals, outcomes and perception of opportunities in the social environment and impediments.

The social cognitive theory has been extended by Eden (1996, 2001) by developing a model of internal-external efficacy. According to this model, Eden (2001) suggests that behavior and task achievement are not only enhanced by internal efficacy (notably self-efficacy) but also by external efficacy covers means efficacy in addition to collective efficacy (Eden *et al.*, 2010; Yaakobi & Weisberg, 2020).

Defining means-efficacy as “*the individual’s belief in the utility of the means available to him or her for performing the job . . . The individual attaches utility to a myriad of means that may facilitate (or hinder) performance*” (Eden, 1996, p. 4), Eden supports that both researchers and practitioners should consider means-efficacy, as they do self-efficacy, a crucial component of motivation (Agars & Kottke, 2021). Efficacious means include implements (e.g. computers, equipment and software), bureaucratic tools (e.g. processes, procedures) and persons (e.g. supervisors, coworkers and followers) (Eden, 2001; Eden *et al.*, 2010; Hannah, Sweeney, & Lester, 2010).

Based on the works of Eden (1996, 2001) and Agars and Kottke (2021) have made a distinction between general and specific means efficacy. The authors define “specific means-efficacy” as an individual’s assessment of the particular resources (e.g. information, time, specific persons, tools and software) required to achieve a specific identified task, and “general organizational means-efficacy”. Based on these predictions, the working relationship between internal auditors and external auditors may represent a specific mean-efficacy. Such a specific mean efficacy has been found, by Khelil, Hussamey *et al.* (2018) as a determinant of the internal auditors’ moral courage.

3. Literature review and hypothesis development

3.1 Internal auditing regulation in Tunisia

To reinforce financial transparency corporate governance procedures and financial transparency in Tunisia, the guide to good practice for the governance of Tunisian

companies (2012) requires the creation of an internal auditing function and audit committee (Khelil, 2022). However, unlike external auditors who operate under a clear jurisdictional framework in the code of commercial companies in Tunisia (in terms of duties, rights and appointments), Tunisian internal auditors function within a jurisdictional void with no formal rules regulating their duties and roles. We can find the Internal Audit Tunisian Association (IATA or IIA Tunisia) that is founded in 1981 and affiliated with the International Institute of Internal Auditors (IIA).

The IATA has the status of a nonprofit organization (Decree-Law No. 88 for the year 2011) and does not have either disciplinary power or dismissal authority. Its principal objective is to bring together all Tunisian internal auditors and the diffusion of international standards and best practices related to internal auditing in public and private companies (Khelil & Khlif, 2022; Khelil, 2022).

3.2 Internal auditor's moral courage and ethical behavior

The IIA is the primary professional organization that sets standards for auditing practice that encourages sensitive information reporting both internally and externally. Indeed, truthfulness is rooted in the definitions of internal auditing since it highlights the importance of independence and objectivity in supporting truthfulness. In the same context, Standard 1,120 underlies that "Internal auditors must have an impartial, unbiased attitude and avoid any conflict of interest" (IIA, 2009; Standard 1,120).

In addition to being bound by duties that prevent them from behaving in their self-interest, the code of ethics requires internal auditors to not be influenced by their interests and to remain unbiased to tell the truth (Norman *et al.*, 2010). The IIA Code of Ethics (IIA, 2009) emphasizes several cardinal principles that internal auditors are expected to uphold together with rules of conduct that specify norms of behavior expected of internal auditors. Cardinal principles such as integrity and objectivity are understood to be applied and upheld by internal auditors to remain unbiased and truthful.

Although the professional and ethical standards of internal auditing functions are designed so that internal auditors act as truth-tellers in organizational contexts; internal auditors still face ethical conflicts (Roussy, 2012) when the disclosure of audit results can have negative effects on their careers (Khelil & Khlif, 2022).

Balafoutas *et al.* (2020) recognize the particular importance of objective reporting in the internal audit field due to the conflict of interest. The authors explain that conflicts of interest arise when an internal auditor has a personal interest or a competing professional making the auditors' independent and objective decision-making hardly possible.

The view of Balafoutas *et al.* (2020) is supported by Khelil and Khlif (2022) who claim that serving different customers (e.g. managers, informal groups in society and audit committees) with conflicting expectations, puts internal auditors under pressure and urges them to follow a strategy of a trade-off between commercial and professional values. Khelil and Khlif (2022) reveal that the fear from negative consequences is the main reason for the intention of internal auditors to prioritize managers' interests in the favor of other stakeholders. This conclusion emphasizes the significant role of moral courage in breaking the silence of internal auditors and behaving ethically by telling the truth about management fraud.

Indeed, in addition to being considered an important tool for overcoming enormous psychological pressures (e.g. fear), previous studies (e.g. Koerner, 2014; Sekerka *et al.*, 2009) support that moral courage serves as an instrument that promotes ethical behaviors by overcoming ethical conflict and moral pressures. According to Mansur, Sobral, and Islam (2020), moral courage represents a fundamental basis for genuine ethical behavior by reflecting moral standards within one's moral self. Similarly, Comer and Sekerka (2018)

explain that moral courage enables the individual to “be” ethical persons and, then, “act” morally.

The role of moral courage in overcoming moral conflict and enhancing auditors’ ethical behavior is evident in previous auditing literature (Armstrong *et al.*, 2003; Roussy, 2012; Everett & Tremblay, 2014; Khelil *et al.*, 2016, 2018).

Building on Thorne (1998)’s model adopted from Rest’s four-component model of ethical decision-making (see Figure 1), Armstrong *et al.* (2003) consider moral courage as an instrumental virtue that enables individuals to move from ethical intention to ethical behavior.

In this regard, moral courage is defined as a virtue and moral competence that “*compels or allows an individual to do what he or she believes is right, despite fear of social or economic consequences*” (Peterson & Seligman, 2004, p. 216). As a result, it contributes to consistency between moral intentions and behavior (Solomon & Brown, 1992).

Roussy (2012) suggests that courage is an essential value in addition to integrity and these two features go hand in hand. For instance, Everett and Tremblay (2014) find that moral courage was the virtue that motivated Cynthia Cooper (WorldCom’s ex-Vice President of internal audits) to report WorldCom’s fraud and fostered her resilience in the face of adversity, threat and risk.

3.3 Hypothesis development

The relationship between internal and external auditors has been widely addressed by professional standards (Institute of Internal Auditors [IIA], 2009; American Institute of Certified Public Accountants [AICPA], 2008; Public Company Accounting Oversight Board [PCAOB], 2013, 2007; International Standards for the Professional Practice of Internal Auditing (ISPPA)). These standards suggest that working relationships between the respective audit parties should include sharing information and coordination of activities which consequently permits assisting internal auditors in performing their objectives and providing better service to the organization (Alzeban & Gwilliam, 2014). Moreover, the information provided by the internal auditor to his/her external counterpart permits assisting in providing a higher-quality audit opinion and possibly one delivered with greater resource efficiency (Behrend & Eulerich, 2019; Alzeban & Gwilliam, 2014).

According to the review of Behrend and Eulerich (2019), the stream of research examining the external auditor’s evaluation of IAF quality represents the highest-developed research area and the most chronic topic within auditing research studies. However, research on the positive effect of internal–external auditor working relationships remains scarce (Behrend & Eulerich, 2019; Alzeban & Gwilliam, 2014).

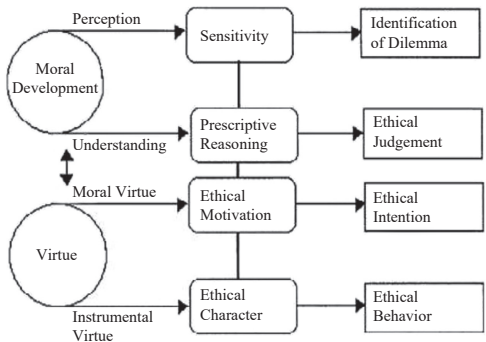


Figure 1.
Thorne’s (1998)
integrated model of
ethical decision making

Source(s): Armstrong *et al.* (2003, p.3)

Recent evidence shows a positive relationship between external and internal audit cooperation and the strength of the internal audit function (Pike, Chui, Martin, & Olvera, 2016; Mat Zain, Subramaniam, & Stewart, 2006; Brody, Golen, & Reckers, 1998; Maletta, 1993). O'Leary and Stewart (2007) maintain that by working together, the relationship between internal and external auditors should be one of cooperation and support to improve overall audit quality. In their analysis, O'Leary and Stewart (2007) identify the external auditor as a crucial component of corporate governance with the ability to affect the internal auditor's decision-making. The results report a significant external auditor impact on both the likelihood judgment and the ethical assessment. Likewise, Brody (2012) argues that good communication is an obligatory condition to realize good cooperation. The author adds that such communication may increase the likelihood of fraud detection (Calderon & Green, 1994), foster openness and engender greater trust (Mat Zain *et al.*, 2006). Conversely, communication barriers between external and internal auditors can have a significantly negative impact on an audit's efficiency.

From an empirical standpoint, Alzeban and Gwilliam (2014) find a positive association between the working relationship between internal and external auditors and the effectiveness of the internal auditing function. Similar results are reported by Pike *et al.* (2016) who demonstrate that the coordination between external and internal auditors enhances efficiency in the evaluation of internal controls and improves organizations' compliance with SOX-related regulations (2002).

Concerning our research objective, and to the best of our knowledge, only the study of Khelil, Hussainey *et al.* (2018) has qualitatively addressed the significant role of the working relationship between internal and external auditors in promoting moral courage among internal auditors.

Khelil, Hussainey *et al.* (2018) provide evidence that the collaboration between internal and external auditors is a key determinant of internal auditors' moral courage since interviewed internal auditors consider external auditors as "*a window for the disclosure*" and "*an indirect and intelligent disclosure*" (Khelil, Hussainey *et al.*, 2018, p. 329). In other words, internal auditors will have more incentives to report wrongdoings when collaborating with external auditors during their audit mission.

Based on the above discussion and the assumptions of social cognitive theory, the following hypothesis is tested.

- H1. The moral courage of the internal auditors is positively related to a strong working relationship between them and external auditors.

4. Research method

4.1 Data collection

The data were collected from Tunisian firms that have an internal auditing function and where the owners are not applied in the management of the companies. Three copies of the questionnaire were administered (face-to-face and electronically) to 72 listed firms and 6 unlisted firms in both financial and nonfinancial sectors. By doing so, the final sample includes 234 potential respondents.

Our questionnaire (Appendix) consisted of two parts. The first part gathered basic demographic information of the internal auditor (including gender, age, work experience, training level, certification, work experience and tenure). The second measure is the level of internal auditors' moral courage and the level of cooperation between internal and external auditors in the given company. The survey measures included in the questionnaire were translated from English to French by a translation specialist so that they become understandable to internal auditors who are more familiar with the French language. The questions are then independently back-translated into English by a second translator to

ensure that the meaning of each statement is preserved (Brislin, 1980). To ensure the understandability of our questionnaire, five internal auditors were consulted. Based on their suggestions, this paper improved the structure and understandability of the questionnaire.

The data collection lasted 10 weeks (in 2021) and allowed us to receive useable answers from 163 internal auditors. Our final sample is composed of 72 internal auditors working in the financial sector and 91 working in the nonfinancial sector. The respondents include 104 men and 59 women with an average age of 33.17 years. The participants had between 2 and 33 years of professional experience. In addition, more than half of the respondents (57%) had a master's degree in accounting and auditing and approximately 9% of them had an international certification related to internal auditing (CISA, CIA or DPAI).

4.2 Variable measurement

4.2.1 *Dependent variable: moral courage (COURAGE)*. Following Khelil, Akrouit *et al.* (2018), this paper used the four-item moral courage scale developed by Hannah and Avolio (2010) to measure the moral courage of internal auditors. Hannah and Avolio's (2010) moral courage scale has shown high reliability and construct validity in previous empirical studies (Schaubroeck *et al.*, 2012; Hannah *et al.*, 2013; Khelil, Akrouit *et al.*, 2018). Participants were asked to answer the following question "How do you act when confronted by frauds committed by your manager?" based on a five-point Likert scale ranging from 1(strongly disagree) to 5 (fully agree).

4.2.2 *Independent variable: relationship between internal and external auditors (RELEX)*. The relationship between internal and external auditors was assessed by the same proxies used by Alzeban and Gwilliam (2014). Participants were asked to rate their level of agreement (from "1 = strongly disagree" to "5 = fully agree) with each statement aiming to measure: their attitude towards external auditors; discussion of the audit plan discussing mutual interests; frequency of meetings; sharing working papers; external auditors' reliance on the work of the internal audit; and management's promotion of the relationship between internal and external auditors.

5. Data analysis and results

5.1 Descriptive statistics

Descriptive statistics are presented in Table 1. The mean value of moral courage amounts to 4.131 and it ranges from 1 to 5. The value is closer to 5 indicating that internal auditors enjoy a high level of moral courage in the Tunisian setting.

The average relationship between internal and external auditors accounts for 4.112 and varies from 1 to 5. It indicates that the collaboration between Tunisian internal auditors and their external counterparts is strong.

5.2 Measurement model analysis

The reliability of the measurement model in PLS is assessed based on indicator reliability and internal consistency reliability. However, its validity is evaluated based on convergent validity and discriminant validity (Khelil *et al.*, 2018; Lisi, 2018).

Table 1.
Descriptive statistics

Variables	Observations	Mean	Standard deviation	Minimum	Maximum
COURAGE	163	4.131	2.167	1	5
RELEX	163	4.112	3.333	1	5

Note(s): MC: moral courage; RELEX: Relation between internal and external auditors

The factor loading indicator is used to assess the reliability. According to the common rule of thumb, only items with factor loading exceeding 0.700 should be retained in the model to ensure internal consistency reliability (composite reliability > 0.700) and convergent validity (average variance extracted, AVE > 0.500) (Hair, Hult, Ringle, & Sarstedt, 2014; Hajli & Lin, 2016).

Table 2 reveals that all the factor loadings, in our model, are greater than 0.700. Furthermore, the satisfactory reliability of the constructs is supported as all composite reliabilities are greater than 0.700 (Hajli & Lin, 2016; Lisi, 2018). On this basis, no item was deleted from our measurement model. The values of Cronbach's alpha that exceed 0.600 also confirm the constructs' reliability (Murphy & Davidshofer, 1988; Khelil, Akrouit *et al.*, 2018). The convergent validity of constructs which is evaluated based on the AVE values and presented in Table 2, shows a satisfactory convergent validity (the AVE for each variable exceeds 0.500) (Khelil *et al.*, 2018; Lisi, 2018).

The discriminant validity of the measurement model was assessed in the last step. As shown in Table 3, the terms of discriminant validity are satisfied in the model (Hair *et al.*, 2014). Therefore, the structural equation modeling is allowed to test our hypothesis linking

Model

Moral courage: COURAGE

COURAGE 1: I will confront my peers if they commit an unethical act	0.915
COURAGE 2: I will confront my manager if she/she commits an unethical act	0.970
COURAGE 3: I will always state my views about ethical issues to my supervisors	0.971
COURAGE 4: I will go against the group's decision whenever it violates my ethical standards	0.979
Composite reliability	0.979
Cronbach's alpha	0.971
AVE	0.920

Relationship between Internal and external auditors: RELEX

RELEX 1: External auditors are friendly and supportive	0.956
RELEX 2: External auditors have a good attitude towards internal auditors	0.984
RELEX 3: External auditors are willing to give internal auditors an opportunity to explain their concerns	0.964
RELEX 4: External and internal auditors consult on the timing of work in which they have a mutual interest	0.980
RELEX 5: External auditors discuss their plans with internal audit	0.969
RELEX6: External auditors rely on internal audit work and reports	0.986
RELEX 7: External and internal auditors meet on a regular basis	0.969
RELEX 8: External and internal auditors share their working papers	0.988
RELEX 9: Senior management helps to promote effective cooperation between internal and external audit	0.992
Composite reliability	0.995
Cronbach's alpha	0.994
AVE	0.954

Table 2.
Item loadings,
composite reliability
and AVE statistics for
all variables ($n = 163$)

	CR	COURAGE	RELEX
COURAGE	0.979	0.959	
RELEX	0.995	0.878	0.977

Note(s): COURAGE: Moral courage; RELEX: Relationship between internal and external auditors

CR: Composite reliability

*Diagonal elements are the square roots of AVEs. Off-diagonal elements are the correlations between constructs

Table 3.
Inter-construct
correlations and square
root of AVE
statistics* ($n = 163$)

the morale courage of internal auditors to the level of collaboration between internal and external auditors.

5.3 Structural model analysis: the test of hypothesis

The assessment criteria for the structural model are the level of significance of the path coefficients produced by PLS and the measures of R^2 . Hair *et al.* (2014) and Khelil, Akrouit *et al.* (2018) suggest that the main target constructs' level of R^2 should be high as the objective of the prediction-oriented PLS-SEM approach is to explain the variance of the endogenous latent variables. Standardized path coefficient, t -statistics and R^2 are shown in Table 4 and graphically, in Figure 2.

As reported in Table 4, our model has a good explanatory power $R^2 = 0.771$. The coefficient for the hypothesized path is statistically significant ($p = 0.000$). This provides strong support for our proposed hypothesis.

6. Discussion

The result shows a positive and significant effect of the working relationship between internal and external auditors on internal auditors' moral courage. This finding corroborates previous results reported by Khelil, Hussainey *et al.* (2018b) who describe the cooperation between internal and external auditors as a tool that enhances the moral courage of internal auditors in Tunisian organizations.

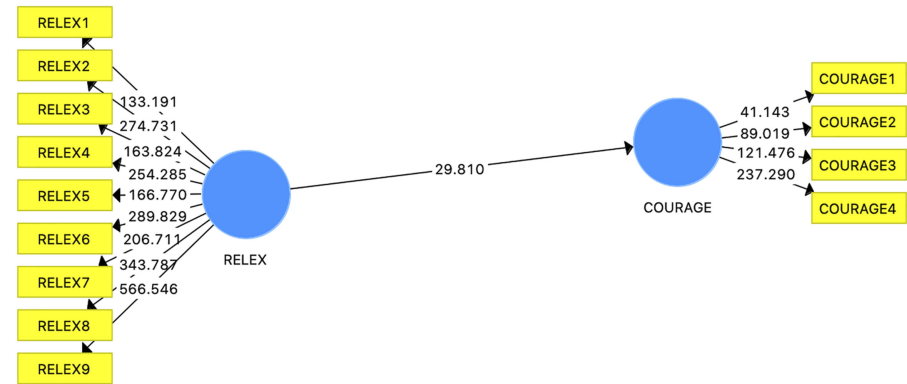
Our result is also in line with that reported by Brody (2012) who argues that good communication and cooperation between these two groups can increase the detection of fraud, enhance openness and engender greater trust.

Table 4.
PLS structural model:
path coefficients,
 t -statistics and
 R^2 ($n = 163$)

	SPC	Standard deviation (STDEV)	t -statistic	p -value	Decisions about the hypothesis
RELEX →COURAGE	0.878	0.029	29.810	0.000	Supported
R^2	0.771				

Note(s): COURAGE: Moral courage; RELEX: Relationship between internal and external auditors
SPC: standardized path coefficient

Figure 2.
PLS structural model
(extracted from
SmartPLS 3)



Source(s): Ringle, Wende, and Becker (2015)

The finding of this study can be explained by the interpretation of O'Leary and Stewart (2007) who identify the external auditor as a crucial component of corporate governance and can affect an internal auditor's decision-making by affecting both his/her judgment and ethical assessment.

In sum, the study confirms the previous evidence on the working relationship between external and internal auditors and the strength of the internal audit function (Pike *et al.*, 2016; Mat Zain *et al.*, 2006). It also confirms the pertinence of the recommendations of international legislation that encourages the coordination between internal and external auditors (PCAOB, 2013, 2007; American Institute of Certified Public Accountants [AICPA] 2008; Institute of Internal Auditors [IIA] 2009).

Furthermore, the result supports the assumptions of social cognitive theory suggesting that means efficacy represents a crucial component of employees' motivation since it influences their behaviors, expectations, aspirations and goals, outcomes and perception of opportunities in the social environment (Eden *et al.*, 2010; Agars & Kottke, 2021).

Based on the above discussion, it is believed that the audit committee is required to review the internal auditors' coordination with their external counterparts and encourage a cooperation relationship between both parties in the Tunisian setting. This collaboration may also have a beneficial effect on external auditors as internal auditors may provide them with confidential and sensitive information which plays a critical role in assessing audit risk and tracing audit procedures.

7. Conclusion, contributions and future research perspectives

This study aims to investigate how the collaboration between internal and external auditors may influence internal auditors' moral courage concerning fraud and wrongdoing reporting in the Tunisian setting. Based on 163 questionnaires collected from internal auditors working in Tunisian companies and using the PLS-SEM, this study provides empirical evidence on the significant effect of the working relationship between internal and external auditors on internal auditors' moral courage.

This paper makes noteworthy contributions to both internal audit and moral courage literature. It fills one of the major research gaps in these research streams by revealing that the courageous behavior of internal auditors can be fostered by specific means efficacy such as the working relationship between internal and external auditors. In addition, to be based on auditing and accounting works, this study relies on extant literature from other disciplines (ethics, psychology and social cognitive theories) that permits to contribute to the existent audit research field.

From a methodological standpoint, this study contributes to accounting and audit research by using SEM in exploring empirically this relationship in an emerging economy.

Since the audit committee does not represent a real effective control mechanism in both emerging and developed economies (Roussy, 2012; Oussii, Klibi, & Ouertani, 2019; Khelil & Khelif, 2022), it is believed that the result of this study can offer an alternative solution to regulators and standard setters to implement rules fostering the cooperation between external and internal auditors to reduce their fear and report accurate information.

Moreover, noting that Tunisia is adopting an approach to enhance transparency and good corporate governance, revealing what encourages internal auditors to break their silence and behave ethically can help reach this goal. For instance, previous empirical evidence (e.g. Gramling *et al.*, 2004; Asiedu & Deffor, 2017) suggests that an ethical internal audit function can improve corporate governance by reporting financial irregularities, reducing administrative corruption and deterring employee theft. By doing so, the internal audit department may foster the firm's financial well-being and organizational efficiency.

As for other studies using survey data, this empirical inquiry may suffer from self-report measures (assessment was only made by internal auditors) that may introduce a bias in the measurement of the working relationship between internal and external auditors.

Based on that both internal auditing activity and professional moral courage involve normative elements and cultural differences, the present study opens the door to further experimental investigations to examine the effect of the working relationship between internal and external auditors on internal auditors' moral courage in other emerging economies and survey both internal and external auditors to assess the degree of collaboration between both parties.

Notes

1. Means efficacy is defined as an individual's belief in the utility of the tools (bureaucratic tools, implements and other persons) at hand for task completion (Walumbwa, Cropanzano, & Goldman, 2011).
2. Middle East and North Africa.

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Further reading

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(The Appendix follows overleaf)

Appendix

Questionnaire n°.....

Date...

As part of the development of a research paper on the activity of internal auditing in Tunisia, we offer you a questionnaire that will be used to collect data to address our study objectives. It should be noted that the information collected will be treated confidentially. We would be grateful for your collaboration and your close involvement in this project. Your answers will be treated confidentially and anonymously.

Company Name...../Sector.....

Part 1: General information about internal auditor

1. Gender	Male		Female		
2. Training level	Level				
	Baccalaureate or equivalent				
	Baccalaureate degree + 2				
	Baccalaureate degree +3 = license				
	Baccalaureate degree +4				
	Baccalaureate degree +5 or +6				
	DESS, DEA, or equivalent				
	Doctorate and +				
	Other				
3. Number of years of experience					
4. Age					
5. Certifications	CIA	DPAI	CISA	Tunisian CPA	Other

Part 2: In the following questions, think about your typical actions and rate your *level of agreement* with how each statement below *applies to your behavior*. Use the following scale to indicate your level of agreement or disagreement with each statement.

strongly disagree 1	Disagree 2	Neutral 3	Agree 4	strongly agree 5
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Statement	Level of agreement (circle one number)
I.	
I will confront my peers if they commit an unethical act.	1 2 3 4 5
I will confront my manager if she/she commits an unethical act.	1 2 3 4 5
I will always state my views about ethical issues to my supervisors.	1 2 3 4 5
I will go against the group's decision whenever it violates my ethical standards.	1 2 3 4 5
2.	
External auditors are friendly and supportive	1 2 3 4 5
External auditors have a good attitude towards internal auditors	1 2 3 4 5
External auditors are willing to give internal auditors an opportunity to explain their concerns	1 2 3 4 5
External and internal auditors consult on the timing of work in which they have a mutual interest	1 2 3 4 5
External auditors discuss their plans with internal audit	1 2 3 4 5
External auditors rely on internal audit work and reports	1 2 3 4 5
External and internal auditors meet on a regular basis	1 2 3 4 5
External and internal auditors share their working papers	1 2 3 4 5
Senior management helps to promote effective cooperation between internal and external audit	1 2 3 4 5

About the author

Dr Imen Khelil is an assistant professor of accounting at Prince Sultan University in KSA. Her research focuses are ethics, internal auditing, moral courage and fraud. She has published in several refereed journals, including *International Journal of Auditing*, *Managerial Auditing Journal*, *MEDAR*, *Journal of Family Business Management*, *Journal of African Business* and *Journal of Financial Crime*. Imen Khelil can be contacted at: khalil_imen@yahoo.fr; ikhelil@psu.edu.sa

Internal and
external
auditors

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