

Impact of Applying Fraud Detection and Prevention Instruments in Reducing Occupational Fraud: Case study: Ministry of Health (MOH) in Gaza Strip

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Abstract: The study aimed to identify the effect of applying detection and prevention tools for career fraud in combating and preventing fraud and reducing its risks through an applied study on Palestinian Ministry of Health in Gaza Strip, Palestine. To achieve the objectives of the study, the researchers used the questionnaire as a main tool to collect data, and the descriptive and analytical approach to conducting the study. The study population consisted of (501) supervisory employees working at MOH in Gaza Strip, Palestine. The researchers used the stratified random sample method and the multiple regression method to measure the effect. The study concluded a set of results, the most important of which is a positive evaluation among respondents about the levels of application of tools to detect and prevent job fraud within MOH, and the presence of a high interest in tools to prevent job fraud during the implementation of its various work. The study recommended the necessity for the Palestinian National Authority to develop and approve laws regulating health sector, so that those laws guarantee the prevention of conflicts of interest, especially for the category of doctors, by preventing job duplication of doctors working in the government sector. Also study recommended the need for MOH to adopt principles of health sector governance and begin immediately to implement them. This process to ensure transparency, disclosure and accountability in the business framework in a manner that realizes the effective protection of stakeholders and does not compromise or discriminate in the application of these principles, which ensures that all forms of job fraud are organized in an organized manner and within fixed legal frameworks.

Keyword: fraud, detection instruments and preventing fraud, occupational fraud, fraud management.

1. INTRODUCTION

The number of job fraud cases exposed around the world reached 2,690, and the total losses resulting from these cases amounted to more than 7 billion \$.

The bill for job fraud and abuse of powers in the Middle East outperformed those in the world.

According to the UN report on job fraud and abuse of job powers issued by the American Anti-Fraud Association ACFE in 2018, the average losses in cases that studied in the Middle East reached 200.000 \$, which is the second highest average losses in the world. [1].

Most studies conducted by large accounting and consulting firms reveal that fraud is a growing crisis facing organizations internationally.

Programs that are developed to combat fraud include policies, procedures, and tools that help management in preventing and detecting fraud. According to specialized studies conducted by the World Bank, the internal control system that provides a sound control environment is the ideal way for public sector organizations to mitigate the risk of fraud, yet the strong monitoring system Fraud does not guarantee that the organization will not occur, so other defense lines such as internal and external audit system and other auxiliary systems must be implemented. [2]

A global survey on fraud conducted by ACFE found that the government sector was the second most represented sector for fraud after the banking sector and other financial institutions. Also the study found that the more the size of the organization, the higher the incidence of fraud, and that fraud can be easily committed and more in the public sector organizations. [3]

Some other studies indicate that about 60% of American companies were exposed to fraud, and that the best institutions suffer from a decrease in their returns by 5% as a minimum due to fraud and financial corruption.

Another citizen survey conducted by AMAN Foundation in 2018 on the reality of fraud and its fight in Palestine, showed that the most important problems that must be prioritized for solving it is the problem of fraud. In 2018, there was a noticeable increase in the prevalence of fraud, and the percentage of citizens who considered anti-fraud efforts increased fraud is still weak and insufficient. [4]

In Gaza Strip, the Public Prosecution handled a number of fraud cases in previous years, handling 3 cases in the year 2010 classified as bribery and embezzlement of public funds, and in 2017 it handled 6 cases.

Based on an interview with the director of the financial department and the head of the central custody department at MOH, it was found that the ministry suffers from cases of

job fraud and the presence of deficiencies in systems and tools to detect and prevent job fraud.

Given these risks, the process of discovering and preventing fraud or manipulation has become one of the most important challenges facing senior management to ensure its credibility and preserve the assets of the organization.

From the foregoing it becomes clear the importance of studying the impact of applying tools to detect and prevent job fraud in institutions in general, especially in government institutions and especially in MOH because of its important role in serving the Palestinian community, therefore focus must be placed on policies and tools that help management in detecting and preventing job fraud.

In view of the literature review, the study raises the question of:

Q1. What is the effect of applying fraud detection and prevention tools in MOH?

Q2. How far anti-fraud tools able to reduce occupational fraud?

2. LITERATURE REVIEW

Fraud is considered one of the most important challenges facing institutions, as it impedes performance and wastes rare money and materials and harms the institution, its reputation and competitiveness. Harm may take various forms other than financial loss, whatever its value, so the greatest damage may be that which affects the performance of the organization, its reputation, credibility and public confidence that leads to multiple risks.

The problem size is large by all standards and it seems that it is not limited to a specific institution, whether financial, industrial or service.

In addition, fraud adapts to the variables that occur in any sector, despite the mechanisms of auditing, the requirements of independent auditors and the rules of professional conduct; however, fraud is on the increase.

It is often difficult to recover money and assets wasted due to fraud activities, and often it is impossible. Fraud control and anti-fraud programs are less costly and more effective than attempts to recover money and misappropriated assets.

The history of job fraud shows a significant development in the complexity of frauds in our time.

According to the ACFE fraud website, it has published a document called the "Fraud Museum" that contains many old books citing old fraud cases that questioned the fairness of financial statements. [5]

South Sea Company committed one of the first financial frauds in the financial statements in the year (1711-1727) and caused a great bankruptcy in England. In 1719 the company proposed a plan that would bear the entire debt of the United Kingdom in exchange for government bonds. During manipulation of the share price, the share price rose from 128 pounds to more than 1,000 pounds before the collapse of the company, which led to financial damage to thousands of investors, including senior members of Parliament.

According to ACFE, there are more than twelve categories for fraud, and in each day, we discover new fraud behavior that related to technology and development in modern life. Some important fraud fields are highlighted briefly in the coming paragraphs. Noticed that this paper discussing occupational fraud that involve in most of fraud areas that we know till today.

* Financial fraud

Notorious financial analyst Ivar Kreuger put the first piece in the Museum of Fraud collection. He participated in a large number of frauds in the early twentieth century, including embezzlement of funds, transfer of debts to subsidiaries and counterfeiting of \$ 142 million in Italian bonds, and after his fraudulent schemes began to collapse, he committed suicide in 1932. [6]

Then came the massive collapse of the American stock market in 1929, which historians unanimously agreed was the result of a series of financial frauds that led shareholders to sell their property, and after less than 30 days, the stock market collapsed, causing the worst crisis financial in US history.

The term "fraud" according to the IAS International Audit Standards 240 refers to "an intentional act by one or more individuals among management, employees, or third parties, involving the use of deception and to obtain an unjust or illegal advantage." [7]

The IIA International Internal Auditors defined fraud as "Any illegal act characterized by deceit, concealment, or violation of trust. These acts are not dependent upon the threat of violence or physical force. Frauds are perpetrated by parties and organizations to obtain money, property, or services; to avoid payment or loss of services; or to secure personal or business advantage. [8]

Until recently, organizations did not implement a "pre-emptive strategy" to combat fraud and anticipate problems before they occurred. Rather, most of the measures were reflective through internal oversight and review but did not include strategies to address fraud in a way.

According to the ACFE, small organizations, defined as businesses with fewer than 100 employees, are the number one victim of fraud with three out of ten, or 30%, of small businesses being affected. Data presented by the ACFE's report determined that small businesses can expect to lose \$150,000 due to fraud, which is the same monetary amount that large companies, defined as more than 10,000 employees, are expected to lose. [9]

The collapse of Enron created a loss of approximately \$70 billion in the capital markets. In 2017, the Annual Fraud Indicator showed that fraud-related losses to the UK economy were estimated at £190 billion. [10]

In particular, financial fraud can adversely affect a firm's innovation activities in several ways. First, fraud initiated by managers leads to loss of credibility and trust: employees (in particular, inventors) lose their respect for top managers and thus doubt whether managers will fulfill their implicit

agreements to reward innovation, suggesting a negative relationship between fraud and innovation activities. [11]

Financial fraud also forms or enhances a corporate culture of short-termism and myopia that discourages high-quality innovation, instead of promoting “low-hanging fruit” projects that require less creativity and effort. Moreover, financial fraud distracts managers and reduces their and inventors’ job security, thereby leading to organizational disturbances that prevent managers and inventors from focusing on long-term plans and commitments, both of which are important for innovation. [12] [13].

* Crowdfunding fraud

Fraud can take many forms such as: [14] [15]

1. Issuing false statements relating to material facts.
2. The company's knowledge that the data is incorrect.
- 3- The company shall have the intention to deceive the investor.
- 4- The investor should suffer damage and lose his money.

With regard to Crowdfunding platforms, we can see several factors by which we can distinguish the existence of fraud or not, because it is about the behavior of what we cannot know and predict. Among these factors:

- 1- Negative selection of the project: The investor believes that the idea of the project is successful and will benefit him. An example of this is a campaign on Kickstarter for meat imported from Japan (Kobe beef) by an American company that provided unrealistic data and videos about the popularity of this brand in America.

The purpose of the campaign was to import the meat to USA and achieved (120.000\$) out of (23.000\$) in a short period of time through (3.000) investor. The volume of turnout raised the doubts of the site team and after conducting the necessary investigations, the manipulator was discovered by the campaign owner with positive data and comments for his product. [16] [17]

* supply chain fraud

In 2013, a scandal in Europe emerged when products being sold as beef were found to contain horsemeat, with some cases containing 100% horsemeat. The obvious distinction between a cow and a horse suggests that the adulteration of the food in the supply chain (SC) was deliberate, rather than through accidental substitution. Fraud that occurs within the SC has seen little research attention, despite being identified as the “single most exposed area” of fraud. [18]

One of the main challenges of exploring inter-organizational fraud is that both perpetrators and victims of fraud tend to hide it. Perpetrators desire to hide their behavior, and victims are not interested in disclosing fraud that affects their product quality and company image. Despite the nature of inter-organizational fraud as a hidden event, it can have significant financial impact on firm performance.

Furthermore, endogenous risks that occur within an SC have been suggested as more important than exogenous risks, motivating additional research into risks which can occur between parties in an SC such as inter-organizational fraud.

Recently, emphasis has been placed on the need to better understand effectively managing opportunistic behavior through relational management. [19]

* Food fraud

Food Fraud is illegal deception conducted for economic gain. There is an increased vulnerability to the deception since the global food industry is faced with rapid innovation driven by technology advances and market changes as consumer choices and preferences evolve. [20]

Regulations and standards covering the safety of food are also evolving to keep up with these changes in the marketplace, all aimed at protecting the consumer.

To add to this complexity, there are many terms and definitions that have overlapping, or often confusing interpretations, including food fraud, food authenticity, food integrity, economically motivated adulteration, food protection, food crime, food security, contaminant, adulterant, and others. [21]

Research on Food Fraud prevention extends beyond the traditional food science disciplines, and now includes Social and Behavioral Sciences and Criminology.

There are a range of food fraud prevention programs, tools and training activities conducted by industry groups such as the Grocery Manufacturers Association (GMA) and their Science and Education Foundation (GMA SEF) which published “Consumer Product Fraud” and “Brand Protection and Supply Chain Integrity”. [22]

Many fraud cases in which the food service sector was involved have emerged and particularly fish species have been examined. Mislabeling of fish species was discovered in 30% of the Brussels’ restaurants and canteens examined and the extent of mislabeling depended on the type of catering business. Sushi bars presented, for instance, a considerably higher rate (45%) than regular restaurants (28%). [23]

False labeling is one way that fraudsters target consumers. At particular risk is people with specific food allergies who depend on reassurances that gluten, peanuts, lactose, and so on are absent in the foods they buy. Manufacturers’ claims may be fraudulent or food labels may simply omit listing problematic ingredients. Spices are a particularly high risk sector because they are expensive and very easy to adulterate. In 2013, the Food Standards Agency (FSA) issued an urgent alert to people in England and Wales with nut allergies about a batch of ground cumin that had been found to contain traces of almond protein not listed on the label. [24]

Food fraud in food service occurs anywhere in the world. In the US 22% of grouper samples appeared to be in fact the cheaper species pangasius. Furthermore, Oceana conducted one of the largest seafood fraud investigations to date and collected 1215 seafood samples world-wide. Species testing revealed that one-third of the samples analyzed were mislabeled. [25]

* Occupational Fraud

Among the various kinds of fraud that organizations might be faced with, occupational fraud is likely the largest and

most prevalent threat. Occupational fraud -fraud committed against the organization by its own officers, directors, or employees- constitutes an attack against the organization from within, by the very people who were entrusted to protect its assets and resources. [26]

Under the ACFE’s approach, occupational fraud consists of asset misappropriation, corruption and financial statement fraud.

Given the significant threat posed by management override, as well as its frequency in occupational fraud cases, understanding the unique nature of management override fraud is important.

The ACFE finds that this opportunity most commonly comes from a lack of internal controls (29%) or from successful override of internal controls (20%).

Further, the ACFE finds that a lack of controls is most commonly related to asset misappropriation cases (30%), and less related to financial statement fraud (24%) or corruption (23%). By contrast, override is most commonly related to corruption cases (23%), and less frequently related to asset misappropriation (20%) or financial statement fraud (17%). [27]

KPMG (2016) also finds that override of controls is common in fraud cases, and they note that the largest frauds in their study involve collusion/override. Further, survey internal auditors and note that “pursuing deviations from policy and management override of controls” is an area of relative internal control weakness in the firms studied. [28]

In general, the occupational fraud related concepts reviewed are: management fraud, employee fraud, asset misappropriation fraud, financial statement fraud, internal control system, corruption, and microfinance.

Occupational fraud occurs when one or more individuals in a management position, those charged with governance, employees, or third parties, intentionally act by involving the use of deception to obtain an unjust or illegal advantage. Management fraud involves one or more members of management while employee fraud involves only employees of the organization. [29]

Financial statement fraud occurs when there is deliberate misrepresentation in the financial statement of an organization in order to deceive users. Such a misstatement is considered material when it influences the economic decisions taken by the users.

The primary responsibility for prevention and detection of irregularities and errors in an organization rests with management because it has a contractual duty of care for the assets of the owners. Consequently, it is management’s responsibility to set up an internal control system.

That is, a system of controls set up by the management of a company to carry out the business of the company in an orderly and efficient manner. Such a system ensures the adherence to management policies, safeguard of assets, completeness and accuracy of the assets of the company’s activities. An internal control system is composed of many individual internal controls. [30]

2.1 Fraud triangle

Fraud has disaster consequences for organizations, threaten their existence and jeopardize their reputation. In the business world today, the risks increase dramatically, which led to the disclosure of the role of many factors that are able to control and correct accounting irregularities, which are considered means to prevent and detect fraud.

Fraud risk management is the process of managing all fraud risk in the organization. This includes evaluating potential fraud risks associated with business processes to ensure the achievement of business objectives.

Fraud risk management embraces both fraud detection and fraud prevention, which are necessary for an effective strategy to combat fraud. Whereas fraud detection aims to discover and recognize any fraudulent activities, fraud prevention seeks to avoid or reduce fraud. Both are independent and should be aligned and considered jointly. [31]

The model of fraud triangular which is the most famous model that researchers study for occupational fraud, consist of three parts as shown in Fig. 1.



Fig. 1. Fraud triangle

Source: Davis, M. (2019). Strategies to Prevent and Detect Occupational Fraud in Small Retail Businesses, PHD Dissertation, Walden University, Minnesota, USA, p. 37.

1. Rationalization to commit fraud: Another key, yet the daunting element of the fraud triangle is an employee’s rationalization for committing occupational fraud, is internal; thus, it is not predictable, the auditor cannot observe what the fraudster is thinking. [32]

However, rationalization is a critical element of the fraud triangle that decision-makers cannot overlook when using the fraud triangle model in strategizing to determine fraud risk control procedures. Some individuals who commit financial crimes have a mindset that their actions are acceptable, and they make rationalizations in an attempt to prove to others that their actions were justified.

Ishida, Chang, and Taylor (2016) posited that rationalization is an attitude that some fraudsters possess a mindset, character, or set of values that allow them to commit fraudulent acts knowingly and willingly without remorse.

Ishida et al. (2016) suggested that greater incentives propel individuals to be able to rationalize their unethical acts. [33]

2. Opportunity to commit fraud: Because the opportunity to commit fraud represents a weakness in internal controls, the fraud triangle is most useful when determining the most effective internal controls to prevent and detect occupational fraud.

Boyle et al. (2015) posited that the opportunity to commit fraud within an organization is ever-present and an organization's internal controls primary function should be to address the opportunity component of the fraud triangle. [34]

For this reason, it is essential that small business owners address the matter of immediate opportunity for occupational fraud attacks within their businesses. More important, it is essential that small business owners realize the risk in not using the fraud triangle model during fraud risk assessments. In the decomposition of fraud risk assessment using the fraud triangle, researchers assess each component separately. Each element standing alone, on its own account could increase the likelihood of fraud when the decision makers utilize the fraud triangle as an assessment tool. [35] [36]

3. Pressures, motivations, or incentives to commit fraud:

Pressure or motivation to commit fraud often triggers the fraud triangle. Holtfreter (2015) argued that men and women provide the same rationalization for stealing from their employers. Men and women have maintained that they were borrowing and intended to repay their employers at some time in the future; however, the motivations were not the same for men and women. Motivation for men to commit financial crimes was often a result of an unshareable financial need such as a gambling debt or addiction. Motivation for women to commit financial crimes was medical expenses or medical expenses for a sick child or family member. [37]

Attractive incentives for perform cause management and employees to act unethically. Incentives such as promotion, titles, salary increases, and bonuses are the driving forces that place pressure on the fraudster to act criminally. Incentives and recognition could compel management to lie about work they have done or taken credit for work done by others in order to enhance their reputation. Newfound recognition could motivate management to commit fraud, which is assessable using the fraud triangle. [38]

2.2 Fraud detection and prevention tools

As discussed previously, Occupational fraud entails three major categories: (1) asset misappropriation; (2) corruption; (3) fraudulent financial statements.

In the first two categories of crime, the employing organizations are the 'victims'. In the third category, whilst employees do conduct financial statement fraud, for example to achieve performance bonuses, or to hide asset misappropriation, these actions can also be performed by employees "on behalf of" the company. This would more correctly be classified as corporate crime as the general public and society become the 'victims'.

There are many tools to prevent and detect fraud action according to the industry. Most important tools will discuss here in briefly to prevent and detect fraud.

* Reducing opportunity

The role of opportunity in promoting crime is underscored across disparate societies and cultures as can be seen in the various maxims of western and eastern societies; "opportunity makes the thief".

Theories of opportunity highlight the need to change the environment in which crime can occur in order to affect the assessments made by potential offenders concerning the costs and benefits associated with committing particular offences; "opportunity is a 'root cause' of crime".

Within the opportunity crime theory context, fraud triangle model characterizes 'perceived opportunity' as a critical constituent of occupational fraud. In order to reduce opportunity, increasing the perceived probability of detection and punishment is emphasized. [39]

Therefore, it is vital to assess and secure the effectiveness of controls with respect to detecting and preventing occupational fraud. There can be various proxy measures to gauge such effectiveness. One of the most common methods used, is to compare the median loss and detection period, or the employees' perception of the effectiveness of antifraud controls, and between one organization which is implementing a specific measure, such as a whistle-blowing program, and another organization, which is not. [40]

* Assembling the fraud team

Fraud examinations usually required a cooperative effort among different disciplines, and there for, once it is determined that an allegation or issue will be investigated, those responsible must determine who will lead the investigation and who should be involved in the investigation.

To determine who should be involved in the investigation, it is necessary to identify what skills are needed. Typically, fraud investigations required skill from different disciplines and industry sectors. Auditors, fraud examiners, managers, attorneys, security personal, and others are frequently associated with fraud investigations. Typically, team members should have: [41]

1. Accountant and audit knowledge.
2. Knowledge of industry.
3. Knowledge of the organization.
4. Knowledge of the law.
5. Knowledge about privacy issue.
6. An understanding of psychology and motivational factors.
7. Interviewing skills.
8. Communications skills.
9. Computer skills.

* Internal audit

Companies usually report financial reports and information to key stakeholders and continuously are reporting more than financial results, communicating on organization values concerning stewardship, management practices, employee relations and other related topics. [42]

Additionally, established evidence showed that internal audit function impact on financial reporting quality in terms of detecting and preventing fraud. Kabuye et al., (2017) revealed that internal auditors are integral parts of corporate governance and contribute in ensuring the reliability and integrity of financial statements. [43]

However, the study of Davidson et al., (2005) noted a weak and negative association between internal audit function and financial reporting quality in Australia. Similarly, Al-Shetwi, et al., (2011) reported a negative association between mere establishment of internal audit function and financial reporting quality of Saudi Arabian companies listed in the Saudi Stock Exchange. [44]

Internal auditors play a critical function in financial reporting; one of such area is in preventing management opportunistic behavior in earnings management. Prawitt et al., (2009) based on PCAOB (2007), SAS No.65 and AICPA, (1991) developed their measures taking into consideration factor in assessing the internal audit function competence and the information gathered from IIA GIAN data base which comprised of survey responses from Chief Audit Executives (CAE's) concerning the development of internal audit activities.

Internal audit function quality is positively related to financial reporting quality as proxies by discretionary accruals and the propensity to beat/miss analysts forecast. Thus, that increases in internal audit function quality increased the possibilities of the internal audit function to identify and prevent management opportunistic accounting behavior and thereby ensuring that irregularities are corrected before the release of financial statement. [45]

* Reporting system

Key concepts to identify risk factors for employee and management fraud, as well as strategies to prevent fraudulent activity throughout are an ethical work environment, the fraud triangle, and staff training in risk management. The focus is on the fraud triangle's internal control mechanism. Internal controls are the first prevention mechanisms enforced to prevent occupational fraud, explicitly monitoring. [46] [47]

Owners of small retail businesses could use monitoring to record employee transactions, access to inventory, including the time, as well as employee email correspondence.

Warren et al. (2015) suggested that monitoring disgruntled employees e-mail could prevent and detect the employee's intent to commit fraud. Continuous risk management training would reinforce the importance of identifying and preventing fraud in addition to the ethical work environment. [48]

Hotlines are anonymous reporting mechanisms that can be used by employees, suppliers, or customers to report informal activities or allegations of fraud. The ability to report fraud as anonymous is extremely important because many employees and other stakeholders may be afraid to report suspicious behavior for fear of the threat of reprisal, especially from officials. Hotlines are a method of detection in addition to a preventive measure, by increasing the degree

of fear of employees who are considering committing crimes. [49]

* Internal control

The primary responsibility for prevention and detection of irregularities and errors in an organization rests with management because it has a contractual duty of care for the assets of the owners. Consequently, it is management's responsibility to set up an internal control system. That is, a system of controls set up by the management of a company to carry out the business of the company in an orderly and efficient manner. Such a system ensures the adherence to management policies, safeguard of assets, completeness and accuracy of the assets of the company's activities. An internal control system is composed of many individual internal controls. [50]

The most effective fraud detection methods are internal audit review, a special investigation by management, employee notification, internal control, and accidental findings.

PwC (2020) explains that the most effective fraud prevention mechanisms are: [51]

1. Conduct an investigation (71%). Getting to the root of the problem is key to preventing further damage. Companies often seek external assistance to investigate the fraud when either objectivity is crucial or they lack the resources or expertise to do it themselves.

2. Bolster their internal controls, policies and procedures (>50%). While some policies and procedures may be easy targets, it's important to assess operations globally and identify what might be missing.

3. Take disciplinary action against employees (44%). In line with regulatory guidance, compliance programs should apply to all and no-one should be beyond their reach; no person should be deemed too valuable to be disciplined. Enforcement of a compliance program is one of the keys to its effectiveness.

Also, the implementation of controls in society related to the management of resources for social and economic development. At a more specific level, internal control outlines various steps to ensure that the financial report has been presented accurately. [52]

* Other tools

1. Disclose the incident to government authorities. Disclosing the fraud early can sometimes result in a more favorable outcome with regulators.

2. Conduct training. Training does not only better inform staff of new policies and procedures, it also promotes a stronger culture around fighting fraud.

3. Coincidence. According to the UN report on job fraud and abuse of powers issued by the American Anti-Fraud Association of 2018, 7% of all fraud cases examined in the report were discovered by chance, and this percentage is of high relative importance compared to the rest of the tools used to detect fraud.

4. External audit. The external audit function, which begins first in the financial and accounting field and then in other organizational functions (operational audit), has evolved

considerably in recent times. This function includes a sudden or periodic examination of the organization's activities to help managers improve the management and performance of these organizations, and also includes examining policies and goals Procedures, information and resources. The external audit is carried out by independent persons who are not responsible for the management of the institution or the activities they review, and the external audit mission ends by writing a report with the auditor's opinion on the fairness of the financial statements. [53]

From previous literature review, the following hypothesis in this research can be written as:

H0: There is a statistically no significant effect for the tools used to detect and prevent fraud in incidence of occupational fraud in MOH.

3. RESEARCH DESIGN

3.1 Study population and sampling

This study conducted on (501) supervisory employees working at MOH. A pilot sample of (30) units was used to study the tools of the study, to verify the validity and stability of these tools. The research sample consist from (210) unit using stratified random sample method as shown in table (3).

Table 1: Study Sample

No.	Department	Head Division	Head of Department	Director of Department	General Manager
1	Primary Health Care	49	48	9	0
2	Administrative Department	5	5	2	0
3	Financial Department	5	10	2	0
4	Pharmacy Department	3	6	2	0
5	Hospital Department	17	33	7	1
6	Nursing unit	3	3	1	0
	Total= 210	82	105	23	1

(168) questionnaires were retrieved with a rate of recovery (80%), as the percentage is considered excellent and can be relied upon strongly in disseminating the results of the study.

3.2 Research instrument

Since the nature of hypothesis and the variables involved are the ones that control the selection of the appropriate tool, accordingly, the researchers have prepared a measure for that study commensurate with its objectives and requirements, the elements of fraud detection and prevention instruments and occupational fraud.

The process of designing and preparing the study scale has gone through several stages and steps:

1. Review the literature of occupational fraud, and previous studies on the subject of the current study.
2. Collect and define scale paragraphs.
3. Formulation of the standard expressions according to the study sample.
4. Set the meter instructions.

5. Correct the meter.

6. Conduct a study of stability and honesty of the scale.

The first dimension (Independent variable) referring to fraud detection and prevention instruments prepared from AFCE (2011) guide from (45) paragraphs. The second dimension (dependent variable) of the instrument which measure occupational fraud aspirations was developed by authors from (14) paragraphs.

Also Trustees validity has been conducted by a group of expert in fraud detection and prevention instruments and financial and auditing field. Those statements were further revised and modified by the experts in a subsequent stage before drafting the final version of the questionnaire.

A 10-point Likert scale of agreement was used for measurement, running from "Strongly Agree" to "Strongly Disagree", with a Neutral category for scale midpoint.

Several statistical tools were used for data analysis and hypothesis testing, including reliability Correlation using Cronbach's alpha, "ANOVA", Simple Linear Regression.

3.3 Validity and reliability assessment

The study adopted Cronbach's α to measure the internal consistence reliability of the questionnaire. The results showed that Cronbach's α values for all dimensions were $>$ (0.5). It indicated that the design of the questionnaire had a high internal consistency as shown in table (2).

Table 2: Coefficients of Alpha Cronbach

Field	No. of paragraphs	Alpha-Cronbach stability
fraud detection and prevention instruments	45	0.961
occupational fraud	41	0.845

3.4 Data analysis and discussion of results

Descriptive analysis for independent variable (Crowdfunding financing) to determine weighted average and rank for paragraphs are shown in table (3).

Table 3: Descriptive Analysis for Fraud Detection and Prevention Instruments

NO.	Sub-Field	Mean	Dev.	Weight	Rank
1	Management Review	7.40	1.45	73.97	4
2	Internal Control	7.40	1.55	73.97	5
3	Internal Audit	7.50	1.50	74.97	1
4	External Audit	7.48	1.47	74.76	3
5	Reporting System	7.21	1.71	72.15	6
6	Coincidence	7.49	1.60	74.93	2
7	Total	7.41	1.38	74.13	

According to previous table (3), the relevant importance can be shown as following:

1. It is clear that there is a high degree of use of tools to detect and prevent occupational fraud within MOH, where

the relative weight of using these tools reached 74.13% and an average of (7.41) and a standard deviation of (1.38)

2. The third sub-field internal audit ranked first with a relative weight reached 74.97% with an average of (7.5) and a standard deviation of (1.5).

3. The fifth sub-field advice of informants ranked last with a weight of 72.93% with an average of (7.41) and a standard deviation of (1.38).

4. The researchers explain this high level to the use of tools to detect and prevent occupational fraud in MOH to the various challenges and problems in the environment of Gaza Strip, which imposed themselves on the nature of the measures that must be taken in an attempt to overcome these challenges, where various reports indicate a state of weakness in the quality of medical services provided to the Palestinian citizen in Gaza Strip for reasons related to a complex set of weaknesses and inherited challenges.

5. The most important of which is the lack of medical competencies available in Gaza Strip, and the continued dependence of the sector on the outside to provide many important medical care services.

6. Added to previous point, migration of distinguished medical staff in general, and those with specializations Precision Medical in particular.

7. Those challenges imposed themselves on the department of the ministry and pushed it to rely on the use of tools to detect and prevent job fraud in the hope of addressing the shortcomings that contribute to the low quality of these services in order to ensure the development of a positive mental image of them about the overall performance.

Occupational fraud descriptive analysis as dependent variable is shown in table (4) to determine weighted average and rank for paragraphs.

Table 4: Descriptive Analysis for Occupational Fraud

NO.	Field	Mean	Dev.	Weight	Rank
1	Devices and equipment are used professionally without being used for personal purposes.	6.86	2.42	68.63	12
2	The Ministry takes the necessary measures to prevent the dispensing of medicines for personal purposes.	7.14	2.20	71.37	11
3	The Ministry is taking the necessary supervisory measures to prevent doctors from referring patients to their private clinics for service.	6.84	2.48	68.39	13
4	The ministry does not rely on specific suppliers to supply its purchases.	7.51	1.91	75.12	6
5	The supply quotations are distributed with absolute transparency.	7.70	1.90	77.02	3

NO.	Field	Mean	Dev.	Weight	Rank
6	All expenses and revenues are documented with real official documents	8.02	1.80	80.24	1
7	The Ministry allows the media to enter its work sites to verify some of issues.	7.44	2.06	74.40	7
8	The Ministry is keen to award its bids based on an objective system of absolute transparency.	7.82	1.76	78.21	2
9	Employees have a general culture of not accepting personal gifts related to work.	7.67	1.88	76.67	4
10	Medical services are provided to all beneficiaries without discrimination.	7.44	2.06	74.40	7
11	The information in work reports reflects the reality applied within the ministry.	7.54	1.93	75.36	5
12	All employees are treated according to the law without favoritism.	7.17	2.22	71.73	10
13	The applicable work mechanisms guarantee fighting the exploitation of occupational site for personal purposes within the ministry.	7.30	2.17	72.98	9
14	Medical transfers abroad are granted for all eligible cases without discrimination.	6.83	2.27	68.33	14
	Total	7.38	1.40	73.78	

According to previous table (4), the relevant importance can be shown as following:

1. The respondents agreed that preventing occupational fraud in MOH is practicing among the ministry (73.78%).

2. The respondents agreed that paragraph (6) all expenses and revenues are documented with real official documents is very important in preventing and detecting occupational fraud.

3. The results of the analysis also showed the weakness of the necessary control procedures by the ministry to prevent doctors from referring patients to their private clinics to receive the service, as the relative weight of the respondents' opinions about this paragraph reached 68.39%.

Researchers explained such weakness in the procedures to the scarcity of specialized medical personnel working in Gaza, and the migration of many of them abroad as a direct result of the economic and political conditions experienced by the Palestinian community in the Gaza Strip.

Also, the weakness of the public budget in wages, that provide them with the acceptable minimum to conduct their business with absolute transparency.

4. The analysis also showed that the exploitation of the Ministry's devices and equipment for personal purposes still casts a shadow on the nature of health work in the Gaza Strip, as 68.63% indicated that those devices and equipment are used professionally away from personal purposes.

That explained cause of a culture which is still controlling an important segment of the Gaza community that believes in the effectiveness of personal knowledge and mediation in the performance of personal purposes even if it is at the expense of the citizens' beneficiaries. This segment includes part of the health sector workers in the Gaza Strip.

Step wise regression used to test whether there is an impact for independent variable (Fraud Detection and Prevention Instruments) on the dependent variable (**Occupational Fraud**). The results are shown in Table (5) and table (6).

Table 5: Anova Test

Field	Model	DF	F
Preventing Occupational Fraud	Regression	3	141.58
R	R²	Resident	164
0.849	0.721	Total	167
			Sig
			0.000

Table 6: Step Wise

Dependent Variable	Model	B	T	Sig
Preventing Occupational Fraud	constant	1.563	5.129	.000
	Reporting System	.424	7.673	.000
	Internal Audit	.217	3.152	.002
	Internal Control	.153	2.265	.025
	Variables excluded			
	Management Review	.059	.674	.501
	External Audit	.046	.690	.491
	Coincidence	.086	1.056	.293

The results of Anova test in table (5) indicate that sig. is less than (0.05) for independent variable (Fraud Detection and Prevention Instruments), which mean that there is significant statistically effect for independent variable (Fraud Detection and Prevention Instruments) on preventing occupational fraud.

Pearson coefficient and regression coefficient sign for independent variable was positive. This result means whenever the value of independent variables increase, there will be increase in preventing occupational fraud.

Changes in the independent variable is responsible for the interpretation of a rate (r²= 72.1%) of all the changes that occur in preventing occupational fraud, and there is a rate

(100 - r²) due to other factors specific to the other independent variables and other factors not mentioned in the model, in addition to the random error.

Table (6) reveals that the findings of significance level are less than (0.05), which means that we can rely on the previous model and circulating the sample results on research community.

According to step-wise regression, some factors eliminated from the model for lack of statistical significance (Management Review, External Audit, and Coincidence).

Therefore, the results of the analysis proved the existence of a relationship between the independent variable and the dependent variable. According to that, we accept hypothesis H1 and refuse H0. The H1 hypothesis can be written as:

H1: There is a statistically significant effect for the tools used to detect and prevent fraud in incidence of occupational fraud in MOH.

Table (6) determines the figure of step-wise regression equation for the impact of fraud detection and prevention Instruments on preventing occupational fraud. This equation can be written as follow:

$$\text{Preventing Occupational Fraud} = 1.563 + (0.424 * \text{Reporting System}) + (0.217 * \text{Internal Audit}) + (0.153 * \text{Internal Control})$$

4. CONCLUSION

According to data analysis, the authors recommend that Palestinian National Authority has to develop and approve laws regulating health work, so that these laws guarantee the prevention of conflicts of interest, especially for the category of doctors, and provide them with acceptable wages that guarantee a decent life.

MOH must adopt the principles of health sector governance and begin immediate application, to ensure transparency, disclosure and accountability in the business framework in order to achieve effective protection for stakeholders and not compromise or discriminate in the application of those principles, which ensures that all forms of occupational fraud are systematically fought within fixed legal framework.

Also there is a need to adopt policy of open door to various media outlets and informing them of cases of occupational fraud that may occur in the ministry and allowing them to publish it.

Added to previous recommendations, MOH has to integrate awareness-raising work programs so that these programs include educating workers about the concepts and tools for detecting and preventing occupational fraud and the nature of the policies adopted by the ministry towards this crime and the related penalties against its perpetrators.

Specialized training programs in the framework of detection and prevention of occupational fraud is needed, so that those programs are focused on workers in sensitive departments, especially those who working internal audit and internal control, as it is one of the most direct departments related to detecting suspicions of occupational fraud.

Finally, MOH must work in periodic organized programs aimed at listening to views of stakeholders about overall performance, especially those that carry criticism of

procedures or working methods, in order to make review and evaluate the working mechanisms used within its various departments.

REFERENCES

- [1] ACFE (2018). Report to the Nations on Occupational Fraud and Abuse, Global Fraud Study, Association of Certified Fraud Examiners, available at <http://www.acfe.com/report-to-the-nations/2018/> (accessed 5 May 2018).
- [2] World Bank Group (2018). Public Sector Internal Audit: Focus on Fraud. Centre for Financial Reporting Reform (CFRR). Washington, D.C., USA.
- [3] ACFE (2018). Op Cit., p. 24.
- [4] AMAAN (2018). Corruption and Fighting Corruption Report in Palestine for the year 2018, Coalition for Accountability and Integrity, Ram Alah, Palestine.
- [5] ACFE (2018). Op Cit..
- [6] <https://www.acfe.com/fraud-museum.aspx>
- [7] IAS international auditing standards. (2017). New York, USA, p. 29. Available at <https://www.kacr.cz/file/4133/2016-2017-iaasb-handbook-volume-1.pdf> (Accessed 28 May 2020).
- [8] International Standards for The Professional Practice of Internal Auditing (2017). Florida, USA, p. 23. Available at <https://na.theiaa.org/standards-guidance/Public%20Documents/IPPF-Standards-2017.pdf> (Accessed 28 May 2020).
- [9] Bunn, E., Ethridge, J., & Crew, K. (2019). Fraud in Small Businesses: A Preliminary Study, Journal of Accounting and Finance, vol. 19(3), issue 3, p. 24.
- [10] Omair, B., Alturki, A. (2020). A Systematic Literature Review of Fraud Detection Metrics in Business Processes, IEEE Access, vol. 8, p. 26893.
- [11] Hsu, P., Tian, F., & Yi, L. (2019). The Impact of Financial Fraud on Technological Innovation: Mvonia. Job Security and Loss of Trust. P. 2. Available at <https://ssrn.com/abstract=3562829> (Accessed 29 May 2020)
- [12] Acharya, V., Baghai, R., & Subramanian, K. (2014). Labor Laws and Innovation, Journal of Law and Economics vol. 56, issue 4, pp. 997–1037.
- [13] Balsmeier, B., Fleming, L., & Manso, G. (2017). Independent Boards and Innovation, Journal of Financial Economics, vol. 123, issue 3, pp. 536–557.
- [14] Abu Amuna, Y. M. (2018). the Electronic-Crowd Funding and its Impact on the Entrepreneurship: A Field Study, PHD Dissertation, Suez Canal University, Egypt.
- [15] Abu Amuna, Y. M. (2019). The Impact of Crowdfunding Financial Attributes On Entrepreneurship Risk Taking, Al-Mithqal For Economic & Administrative Sciences, Especial Edition, The International Conference on Business Information Technology and Intellectual Economics, pp. 513-520.
- [16] Abu Amuna, Y. M. (2019). Crowdfunding Financing Model effect on Entrepreneurship Aspirations, International Journal of Academic Accounting, Finance & Management Research (IJAAFMR), vol. 3, issue 1, pp. 53-60.
- [17] Abu Amuna, Y. M. (2019). Entrepreneurship, Crowdfunding Platforms and Sponsors Interaction, International Journal of Academic Management Science Research (IJAMSR), vol. 3, issue 1, pp. 53-60.
- [18] DuHadway, S., Talluri, S., Ho, W. & Buckhoff, T. (2019). Light in Dark Places: The Hidden World of Supply Chain Fraud, IEEE Transactions on Engineering Management, p.1 , doi: 10.1109/TEM.2019.2957439.
- [19] Tachizawa, E., Wong, C. (2015). The performance of green supply chain management governance mechanisms: A supply network and complexity perspective, Supply Chain Management, vol. 51, pp. 18–32.
- [20] Spink, J., Hegarty, V., Fortin, D., Elliott, T., & Moyer, C. (2019). The application of public policy theory to the emerging food fraud risk: Next steps, Trends in Food Science & Technology, vol. 85, pp. 116–128.
- [21] INFOSAN (2017). World Health Organization, Home Page for International Food Safety Authorities Network, Available at http://www.who.int/foodsafety/areas_work/infosan/en (Accessed 29 May 2020)
- [22] GMA, Grocery Manufacturer’s Association (2014). Brand Protection and Supply Chain Integrity: Methods for Counterfeit Detection, Prevention and Deterrence - A Best Practices Guide, FMI/GMA Trading Partner Alliance, Available at https://www.gmaonline.org/file-manager/Collaborating_with_Retailers/GMA_Inmar_Brand_Protection.pdf, (Accessed 29 May 2020).
- [23] Ruth, S., Veeken, J., Dekker, P., & Luning, P. (2020) Feeding Fiction: Fraud Vulnerability in The Food Service Industry, Food Research International, vol. 133, pp. 1-8.
- [24] Al-Teinaz, Y., Stuart Spear, S., & Abd El-Rahim, I. (2020). The Halal Food Handbook, onlinelibrary.wiley, p. 322.
- [25] Wang, D., Hsieh, P. (2016). The Use of Imported Pangasius Fish in Local Restaurants. Food Control, vol. 65, pp. 136–142.
- [26] ACFE (2018). Op Cit., p. 6.
- [27] Bishop, C., Hermanson, D., Marks, J., & Riley, R. (2019). Unique Characteristics of Management Override Fraud Cases, Journal of Forensic and Investigative Accounting, vol. 11, issue 3, pp. 395-415.
- [28] KPMG (2016). Global Profiles of the Fraudster, Switzerland: KPMG International.
- [29] Mukah, S. (2020). Occupational Fraud in Micro-Financial Institutions in Cameroon: Strategies for Timely Detection and Control, Journal of Economics and Management Sciences, vol. 3, issue 2, pp. 1-10.
- [30] Oxford Dictionary of Accounting. (2016). Oxford University Press. Available at <http://www.oup.com>, (Accessed 29 May 2020).
- [31] Cotton, D., Johnigan, S., & Givarz, L. (2016). Fraud Risk Management Guide, New York, NY, USA: COSO.
- [32] Shepherd, D., Button, M. (2018). Organizational Inhibitions to Addressing Occupational Fraud: A Theory of Differential Rationalization, Deviant Behavior, vol. 40, issue 8, pp. 1-22.
- [33] Ishida, C., Chang, W., & Taylor, S. (2016). Moral Intensity, Moral Awareness and Ethical Predispositions: The Case of Insurance Fraud, Journal of Financial Services Marketing, vol. 21, pp. 4-18.
- [34] Boyle, D., Boyle, J., & Mahoney, D. (2015). Avoiding the fraud mindset, Strategic Finance, vol. 97, issue 2, pp. 41-46.
- [35] Abu Amuna, Y. M., Aburahma, I, A. M. (2019). Enhancing Entrepreneurial Abilities through Various Crowdfunding Models, International Journal of

- Academic Management Science Research (IJAMSR), vol.3, issue 5, pp. 11-21.
- [36] Davis, M. (2019). Strategies to Prevent and Detect Occupational Fraud in Small Retail Businesses, PHD Dissertation, Walden University, Minnesota, USA, p. 27.
- [37] Holtfreter, K. (2015). General Theory, Gender-Specific Theory, and White-Collar Crime, *Journal of Financial Crime*, VOL. 22, pp. 422-431.
- [38] Sidorov, J. (2015). Best Practices for Health Outcomes Public Reporting, *Population Health Management*, vol. 18, pp. 399-401.
- [39] Suh, J., Nicolaides, R., & Trafford, R. (2019). The Effects of Reducing Opportunity and Fraud Risk Factors on The Occurrence of Occupational Fraud in Financial Institutions, *International Journal of Law, Crime and Justice*, vol. 56, pp. 79-88.
- [40] Hunziker, S. (2017). Efficiency of Internal Control: Evidence from Swiss Non-Financial Companies. *Journal of Management and Governance*, vol. 21, issue 2, pp. 399-433.
- [41] ACFE (2014). *Fraud Examiners Manual*, International Edition, p 1016.
- [42] Madawaki, A., Ahmi, A., & Ahmad, H. (2019). Internal control, Risk-Based Auditing and Financial Reporting Quality, 5th Annual International Academic Conference Proceedings, Kaduna State University, Kaduna, Nigeria, p. 164.
- [43] Kabuye, F. Nkundabanyanga, S. Opiso, J., & Nakabuye, Z. (2017). Internal Audit Organizational Status, Competencies, Activities and Fraud Management in The Financial Service Sector. *Managerial Auditing Journal*, vol. 32, issue 9, pp. 924-944.
- [44] Al-Shetwi, M. Ramadili, M., Chowdury, S., & Sori, M. (2011). Impact of Internal Audit Function (IAF) on Financial Reporting Quality (FRQ): Evidence from Saudi Arabia, *African Journal of Business Management*, vol. 5. Issue 27, pp. 11189-11198.
- [45] Aburahma, I. A. M., Abu Amuna, Y. M., & Aqel, M. A. (2020). The Relationship between GHRM Practices and Organizational Performance, *International Journal of Academic Management Science Research (IJAMSR)*, pp. 1-8.
- [46] Prawitt, F. Smith, L., & Wood, A. (2009). Internal Audit Quality and Earnings Management, *The Accounting Review*, vol. 84, issue 4, pp. 1255-1280.
- [47] Al Davis, M. (2019). Op Cit., P. 41.
- [48] Warren, D., Moffitt, C., & Byrnes, P. (2015). How Big Data Will Change Accounting, *Accounting Horizons*, vol. 29, pp. 397-407.
- [49] Li, t., Page, m., & Welch, V. (2019). *Cochrane Handbook for Systematic Reviews of Interventions*, John Wiley & Sons, UK.
- [50] Mukah, S. (2020). Op Cit., P. 2.
- [51] PwC. (2020). PwC's Global Economic Crime and Fraud Survey, Available at www.pwc.com/fraudsurvey (Accessed 31 May 2020)
- [52] Ariyanto, R., Bone, H. (2020). Fraud Awareness in Indonesian Governmental Sector: Multi-Agency Responses, *Review of Integrative Business and Economics Research*, vol. 9, issue 2, pp. 209-222.
- [53] Mir, M., Harun, H., & Sutiyono, W. (2018) Evaluating the Implementation of a Mandatory Dual Reporting System: The Case of Indonesian Local Government, *Australian Accounting Review*, vol. 29, issue 1, pp. 80-94.
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