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HARMFUL COMPETITION AND ITS IMPACT ON TECHNICAL PERFORMANCE IN SAUDI INSURANCE COMPANIES

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Abstract:
This study addresses harmful competition and its impact on the technical performance of Saudi insurance companies. It aims to identify sound strategies to confront harmful competition within insurance firms and to understand the distinction between technical functions and technical performance in insurance companies. The study's problem is centred around the effect of price competition in insurance companies and whether competition affects innovation and underwriting growth. It also investigates how harmful competition influences due compensation for policyholders and financial sustainability.
The study reached several findings, notably that Saudi insurance companies rely solely on pricing in their competitive practices. Profit margins decline due to harmful competition, which negatively affects companies' financial capabilities and their financial sustainability, exposing them to long-term financial risks. Unethical and non-transparent harmful competition adversely affects technical performance in Saudi insurance companies.
The study recommends that the Insurance Authority review relevant regulations. It also advises insurance companies to cooperate in exchanging expertise, support innovation in insurance products and services, avoid price-based harmful competition, and develop effective technical performance evaluation systems that enable firms to measure the impact of harmful competition and take necessary improvement actions.

Keywords: Competition, Pricing, Underwriting, Compensation, Reinsurance, Investments.

Introduction:

Research Problem:

Competition is inherent in commercial life; it greatly affects the development of the Saudi insurance market when it is fair and free, but has a negative impact when it becomes harmful. Therefore, the main research problem is:
What is the impact of harmful competition on the technical performance of Saudi insurance companies?
Sub-questions:

1. What is the effect of price competition in insurance companies?
2. Does competition affect innovation and increase underwriting in insurance companies?
3. How does harmful competition influence policyholders' compensation and financial sustainability?
4. To what extent does competition affect reinsurance in Saudi insurance companies?
5. Does harmful competition impact customer satisfaction and the investments of insurance companies?

Research Objectives:

1. To demonstrate the importance of competition in developing the insurance sector.
2. To clarify the impact of harmful competition on the technical performance of insurance companies.
3. To identify effective strategies to confront harmful competition within insurance companies.

4. To understand the difference between technical functions and technical performance in insurance companies.

Research Hypotheses:

1. Competition among insurance companies is based solely on price.
2. Competition affects underwriting and exposes companies to losses.
3. There is a statistically significant relationship between competition and due compensation for policyholders as well as financial sustainability.
4. Competition affects reinsurance in Saudi insurance companies.
5. There is a statistically significant relationship between competition and insurance companies' investments.

Importance of the Study:

- **Scientific Importance:** To understand the impact of competition on Saudi insurance companies and how technical functions are affected, and to highlight the harmful competition that causes the collapse and deterioration of the Saudi insurance market.
- **Practical Importance:** To provide relevant authorities with optimal solutions to mitigate the severity of competition, avoid harmful competition, and adopt sound competitive practices.

Research Methodology:

The study used a **descriptive approach** to examine literature regarding competition and technical performance in insurance companies, as well as an **analytical approach** by analyzing a questionnaire related to the research hypotheses.

- **Geographical Scope:** Insurance and reinsurance companies operating in the Saudi insurance market.
- **Time Scope:** The year 2022.
- **Subject Scope:** Study of competition and the extent to which technical performance in insurance companies is affected, especially with the emergence of numerous new companies increasing competitive pressure.

Previous Studies:

(Abdullah, 2015)

The study addressed underwriting policy and its impact on the financial solvency of Sudanese insurance companies. It aimed to understand the underwriting policies followed by Sudanese insurers. The study found that some companies are too lenient in underwriting, taking on risks beyond their capacity. It recommended that insurers adopt prudent financial policies to avoid jeopardizing their financial positions due to excessive underwriting.

(Hassani Hussein, 2016)

This study examined pricing as a means to enhance competitiveness in the insurance industry, with a focus on the Algerian experience. It emphasized the importance of competitiveness in insurance despite the difficulty in defining its foundations and sources. The study's problem lay in how the specifics of the insurance industry affect pricing policies and the competitiveness of insurance firms. It concluded that Algerian insurance firms lack essential components for accurate cost analysis of insurance products, especially given the specificity of each risk and company. It emphasized that financial elements are key in pricing and should factor in the investment returns which help reduce product costs. Recommendations included developing strong actuarial skills and maintaining accurate and long-term databases to

analyze compensation costs per product and accident frequency rather than per compensation year.

(Krach Hossam, 2017)
This study evaluated the performance of property insurance companies. It aimed to determine how to assess 13 key ratios that measure technical, financial, and solvency performance as well as annual outcomes of property insurers. The study found many statistically significant differences in performance indicators.

(Abdullah Mohammed Abdullah Mohammed and Siddiq Jadin Babiker, 2017)
The study's problem was that claim settlements are directly linked to risk management mechanisms, particularly in the selection of risks and scientific pricing methods, rather than price competition. The goal was to examine whether risk management mechanisms in insurance companies facilitate easy claim settlements. It found that scientifically selecting risks improves underwriting quality, which in turn simplifies the claims process.

Research Gap:
The researcher noted that previous studies addressed competition alongside other variables, but none directly studied the impact of competition on technical performance in insurance companies, despite its significant influence. Many studies exist on technical functions, but there is a lack of research on technical performance. For example, Mohammad Abbas's study assessed the impact of car insurance pricing on the financial solvency of Sudanese insurance firms, addressing only one technical function — pricing

Competition Among Insurance Companies:
Introduction:
All organizations today face intense and varied competitive forces in the market. It is very difficult nowadays to find an organization that operates and dominates the market alone without the presence of competing organizations, whether they offer similar or substitute products. Therefore, organizations engage in collecting information and data, conducting studies and analyses, using statistical and mathematical methods, and relying on computers and the internet in order to reach convincing results that enable them to make decisions related to production, pricing, distribution, sales, advertising, and other activities that help them withstand competition[1].

Types of Competition:
The opportunities available to an organization vary depending on the nature of the competition in the market. The more intense the competition, the fewer the opportunities available to the organization and the more restricted its pricing policy. Conversely, the weaker the competition, the greater the opportunities available and the more flexible its pricing policy. This competition varies in terms of intensity, number, strength, ability, and market control. Therefore, competition has been classified based on these factors and the nature of the market and other influences. From these classifications, we select the following:

[1]Ahmed Mohamed Ahmed Mandour, *Principles of Econometrics and Mathematical Economics*, published by Alexandria University, 2000.

a. Perfect Competition:
Under this type of competition, the producer and seller do not have the freedom to set prices due to the nature of the product and demand. Within the framework of monopolistic competition, the market is characterized by a large number of producers who adopt product differentiation policies related to features, uses, quality, and services provided. Through this, each producer can control a portion of the product market. In this case, each enterprise can follow its own pricing policy without fearing price wars among competing companies.

b. Free Competition:
Free competition closely resembles perfect competition but with some differences that can be summarized as follows:

- The number of sellers in free competition is less than in perfect competition.
- There is slight variation in pricing policy among sellers, but this variation should be minimal when the products are similar in quality, and it should be acceptable if there are noticeable differences in quality.
- There are restrictions on the movement of capital between industries, goods, and projects, and possibly also restrictions on the movement of capital within industries and products.

c. Imperfect Competition:
Within this framework, competition can be classified into three types based on differences in the number of sellers and buyers, capital variation, and other factors. Imperfect competition refers to the absence of one or more conditions required for perfect competition.

- It includes: Monopolistic Competition and Oligopoly

Competition Among Insurance Companies:
Competition is a fact of business practice. Companies compete in terms of price, quality, design, sales, location, and nearly every business operation. We observe the emergence of a number of insurance companies recently, which increases the intensity of competition in the Saudi insurance market, despite the weak insurance awareness and the focus on certain types of insurance in Saudi Arabia.

Definition of Competition:
Business competition is the rivalry between companies selling similar products or targeting the same audience, aiming to increase sales, revenue, and market share compared to others[2]. In insurance companies, competition should be based on several factors such as price, customer care, customer satisfaction, and fast claims settlement.

Competition Among Insurance Companies Includes:

- **Limiting harmful competition** among national companies, as the continuation of such competition certainly depletes the resources of those companies, especially the smaller ones. This affects the reputation of the insurance sector if they fail to meet their obligations and undermines trust in the sector as a whole while increasing the appeal of internationally reputable companies.
- Large companies that engage in destructive competition without technical foundations will not be able to accumulate the necessary premiums to cover potential losses, which may eventually drain their technical and financial reserves and reduce their chances of survival.

[2]2020/0www.business4lions.com

- **Developing the technical competence** of the current generation of underwriters based on sound principles, training them to price various risks scientifically, thus preparing a new generation of underwriters capable of assessing risks using accident indicators, loss ratios, and future probabilities, while considering physical and moral risk factors. This also includes using actuaries in non-life insurance.
- **Maximizing the use of reinsurance capacities** already present in Arab markets, where efficient reinsurance companies have demonstrated credibility over the years and have never failed to meet their obligations. These companies are well-known among industry professionals in Arab markets and represent national capacities. There is a pressing need to remove the barriers hindering their growth. The first step is to guide supervisory and regulatory authorities to include Arab reinsurers in the list of approved reinsurers for local companies, and to take all necessary measures to facilitate business exchange between Arab markets.
- **Strengthening the financial positions** of insurance and reinsurance companies, increasing their capital, and paving the way for mergers is a necessity imposed by the globalization era.
- **Forming alliances between insurance companies and banks** in areas such as marketing insurance, premium collection, and investments. This trend has received particular importance in insurance markets of industrialized countries.
- **Establishing alliances among companies within national markets** to offer integrated services, which reduces competition, increases underwriting capacity, and diversifies risk portfolios[3].

The Most Important Pillars of Competition in Insurance Companies:

1. **Claims settlement** – Insurance exists for claims. Fast claim settlements help build a strong reputation and attract more clients, leading to sound underwriting.
2. **Diversification of the insurance portfolio** – Covering all types of insurance, especially rare ones like health, agriculture, and Takaful.
3. **Geographic expansion** – A wide presence through branches helps customers access services more easily.
4. **Training and qualification of staff** – A true competitive weapon that helps in sound risk assessment, attracting good risks, and identifying legitimate claims.
5. **Reinsurance agreements** – Enable companies to accept large, major, and rare risks such as financing and guarantee risks.
6. **Ongoing study of the insurance market** – Helps avoid mistakes and prevents companies from falling into debt and exiting the market. Also helps understand risk costs in relation to price, inflation, etc[4].

Competition in Practice:

- Insurance companies compete on price to attract clients, often lowering deductibles and depreciation rates and offering lenient premium payment terms.
- Companies compete to acquire largeand desirable risks from one another through relationships, repeated visits, and promises of special treatment.
- Companies compete to win market awards for the best insurance provider[5].

[3]Shumoom Mohamed Ahmed Al-Amin – Insurance Supervisory Authority – *Insurance Supervision Memoranda* – p. 16.

[4]Ammar Hamid, Director of Risk Management and Reinsurance at Al-Salama Insurance Company, personal interview, Tuesday, 05/08/2019, at 2:00 PM.

However, the authors believe that competition in the above areas is not ideal in the insurance field. Competition should be based on the quality of the insurance service, particularly claims settlement, which is the core of a company's strength. Increasing operational expenses such as salaries and essential equipment raises the cost...

The researcher believes that competition among insurance companies on the aforementioned points is not healthy for the insurance sector. Ideally, competition should focus on the quality of insurance services, particularly in the settlement of claims, which is the core of a company's strength. However, increased operating expenses—such as salaries and essential equipment—raise the cost of insurance. As a result, companies fiercely compete to gain more business, leading to lower insurance premiums, which ultimately exposes them to losses.

Pros and Cons of Competition:
The pros and cons of competition vary from one person to another, from one time period to another, and depending on each party's position in the market.
Key Advantages of Competition:

- Optimal use of insurance companies' capital.
- Adding new capacity to national markets and increasing retention.
- Improving insurance services and maximizing added value.
- Developing marketing methods.
- Developing insurance products.
- Enforcing the use of modern technology and actuarial experts in product development.
- Focusing on customer satisfaction and prompt claims payments.
- Developing investment methods and introducing new investment channels.
- Providing better training opportunities and improving human resources.
- Creating new job opportunities.

Key Disadvantages:
These are generally seen from the perspective of those involved in monopolistic or protected markets.

- Lowering price levels, as both the insurance company and the customer view price as the sole competitive factor.
- Creating an unhealthy business climate.
- Market instability and erosion of profit margins.
- Draining the financial resources of insurance companies—especially smaller ones—potentially jeopardizing policyholders' rights.
- Forcing some national insurance companies, under intense competitive pressure, to adopt improper practices to maintain their market share, endangering the national industry.
- Loss of local expertise and talent due to attractive offers from foreign entrants in the market.
- Foreign companies, upon entering local markets, tend to focus on large, profitable risks while avoiding less profitable insurance activities.

[5]Atif Yassin Othman, Deputy General Manager of Al-Salama Insurance Company, personal interview, 05/08/2019 at 1:00 PM.

- Foreign companies often rely on reinsurance capacity provided by their parent companies, which may escalate price-based competition[6].

Technical Performance in Insurance Companies:

Technical performance refers to a company's ability to manage technical operations and deliver insurance services efficiently and effectively. Strong technical performance enhances a company's market position and increases its market share. It includes several components:

1. **Risk Management**: The ability to assess potential risks and determine appropriate insurance pricing.
2. **Claims Management**: Efficient and prompt handling of client claims, which influences customer satisfaction and trust, along with verifying claims to avoid fraud and protect financial interests.
3. **Product Marketing**: The ability to design and promote insurance products that meet market needs.
4. **Underwriting Management**: Making sound decisions about accepting or rejecting risk.
5. **Modern Technology**: Using tech to improve efficiency and streamline operations, such as big data and AI.
6.
7. **Financial Performance Evaluation**: Analyzing revenue and expenses to ensure sustainability.
8. **Training and Development**: Training employees to improve overall performance and promote a technical performance culture.
9. **Product Pricing**: Based on historical data analysis to determine appropriate policy pricing, ensuring competitive rates without harming profitability[7].

Challenges Facing Insurance Companies in Improving Technical Performance:

1. **Market Changes**: Fierce price competition affects service quality, and changing customer needs require continual product and service innovation.
2. **Risk Management**: Difficulty in accurately collecting and analyzing data to assess risks; emergence of new risks (e.g., environmental or technological) needing fresh strategies.
3. **Cybersecurity**: Protecting sensitive data from breaches and dealing with tech disruptions (e.g., war-related data loss experienced by many companies).
4. **Regulatory Changes**: Adapting to laws and regulations can be complex and costly (e.g., applying accounting standard B17 or reinsurance in Takaful-based Arab markets).
5. **Rising Costs**: Increasing operating costs impact the ability to improve technical performance, along with the need to enhance efficiency in human and tech resource use.

Strategies Insurance Companies Can Adopt to Tackle These Challenges:

[6]Shumoom Mohamed Ahmed Al-Amin, *The Development of Insurance and Its Economic Importance*, General Authority for Insurance Supervision and Control (Insurance Seminar for Government Units – Conference Hall – Agricultural Bank of Sudan, April 24–26, 1994), pp. 4–5.

[7]Dr. Mohamed Abdelaziz Al-Safi, Research and Operations Department (National Insurance Supervisory Authority), personal interview – Port Sudan, 05/06/2024, at 11:00 AM.

1. **Ongoing Product Development**: To meet changing market demands, offer user-friendly, interactive services to attract clients (focus on service quality and customer satisfaction).
2. **Data and AI Utilization**: Use big data analytics to assess risks and accurately set prices, and apply AI in claim processing and customer service improvement.
3. **Enhanced Risk Management**: Use advanced underwriting strategies and adopt digital insurance for its flexibility and adaptability to increasing risks.
4. **Regulatory Compliance**: Establish specialized teams to monitor legislative and regulatory changes.
5. **Customer Engagement**: Conduct surveys and gather feedback to understand expectations, and provide apps and websites for easier access.
6. **Tech Partnerships**: Collaborate with tech firms to drive innovation and offer new solutions; also partner with service providers (e.g., medical insurance) to enhance service quality[8].

Difference Between Technical Performance and Technical Functions:

Technical performance relates to how successfully and efficiently insurance operations are conducted overall, **while technical functions** refer to specific activities performed by technical teams to achieve and improve that performance. Both are vital for a company's market success.

First: Technical Performance

Refers to the efficiency and effectiveness of technical operations in insurance companies, including risk assessment, product pricing, and claims management. It is measured by indicators like loss ratio, customer satisfaction, and profitability. The goal is to deliver efficient and profitable insurance services.

Second: Technical Functions

Refer to specific activities and tasks performed by technical teams within the company, including:

- **Underwriting**: Accepting or rejecting risks based on evaluation and setting appropriate prices.
- **Claims Management**: Taking necessary steps to ensure the insured party receives their rightful compensation.
- **Reinsurance**: Risk distribution between the direct insurance company and internal or external reinsurance providers.
- **Marketing**: Effectively promoting insurance services to attract clients.
- **Investment Management**: Monitoring and selecting profitable investments to maximize returns[9].

Key Indicators to Measure Technical Performance in Insurance Companies:

1. **Loss Ratio**: Total claims paid compared to written premiums—used to assess the company's effectiveness in managing and evaluating risks.
2. **Expense Ratio**: Operational costs compared to written premiums—used to evaluate administrative and operational efficiency.
3. **Profitability Ratio**: Sum of loss and expense ratios—used to determine whether the company is making a profit or loss.

[8]Dr. Fikri Kabashi – Professor at Al-Neelain University – *Marketing of Insurance Services* – personal interview.
[9]Dr. Mohamed Abdelaziz Al-Safi, previously cited.

4. **Customer Retention Rate**: The percentage of clients who renew their policies—reflects customer satisfaction.
5. **Premium Growth Rate**: The percentage increase in premiums compared to previous years—indicates the company's ability to attract new clients and expand market share.
6. **Claims Processing Rate**: Number of claims processed within a certain period—reflects claims management efficiency and responsiveness.
7. **Error Rate**: Percentage of errors in document and claims processing—used to enhance quality and accuracy.
8. **Return on Investment (ROI)**: Profit from investments relative to costs—indicates the effectiveness of the company's asset investments.
9. **Claims Reserve Adequacy Ratio**: Assesses whether financial reserves set aside for claims are sufficient until settlement—vital for ensuring the company can meet financial obligations[10].
10. **Liquidity Indicators**: Quick liquidity ratio—measures the company's ability to cover short-term obligations and indicates overall financial health.
11. **Solvency Indicators**: Measure the company's ability to meet long-term obligations, including the debt-to-equity ratio, which shows reliance on external financing.
12. **Insurance Portfolio Growth Indicators**: Measure the company's success in growing business volume through attracting new clients and increasing written premiums[11].

Using these indicators enables insurance companies to comprehensively evaluate their technical performance and make data-driven decisions to enhance efficiency and profitability

Data Analysis and Hypothesis Testing

In this section, the researcher analyzes the personal data and questionnaire responses and tests the study's hypotheses using statistical methods and graphical representations. In addition, a comparison is conducted between the most important findings of the field study and those of previous studies, as outlined below:

First: Personal Data

Variable	Attribute Category	Frequencies	Percentage
Age	Less than 30 years	3	9.7%
	30 to less than 35 years	11	35.5%
	35 to less than 40 years	5	16.1%
	40 years and above	12	38.7%
	Total	31	100%
Academic Qualification	Bachelor's Degree	17	54.8%
	Higher Diploma	5	16.1%
	Master's Degree	6	19.4%
	PhD	1	3.2%

[10]alal bin Ibrahim Arabi, *The Impact of Using Financial Analysis on Evaluating the Performance of Saudi Insurance Companies: An Applied Study*, Faculty of Economics and Administration, King Abdulaziz University.
[11]Ahmed Sayed Abdel-Zaher, *Measuring and Evaluating the Technical Performance of Insurance Companies Through the Factors Affecting Underwriting Results, with Application to General Insurance*, Master's Thesis, 2013. (Teaching Assistant, Department of Mathematics, Statistics, and Insurance – Faculty of Commerce)

Variable	Attribute Category	Frequencies	Percentage
	Other	2	6.5%
	Total	31	100%
Field of Specialization	Accounting	5	16.1%
	Business Administration	2	6.5%
	Economics	4	12.9%
	Insurance	11	35.5%
	Banking Studies	1	3.2%
	Other	8	25.8%
	Total	31	100%
Job Title	Insurance Technician	18	58.1%
	Department Head	9	29%
	Branch Manager	4	12.9%
	Total	31	100%
Years of Experience	Less than 5 years	6	19.4%
	6 to less than 10 years	13	41.9%
	11 to less than 15 years	3	9.7%
	15 years and above	9	29%
	Total	31	100%

Source: Prepared by the researcher from field study data, 2025.

Analysis:

From Table (1), the researcher observes that 38.7% of the study sample falls into the age group over 40 years, followed by 35.5% in the age group 30 to less than 35 years, while the remaining 25.8% of the sample is distributed among other age groups. This indicates that the majority of the study sample consists of experienced individuals.

Furthermore, 54.8% of the participants hold a bachelor's degree, while 39.2% hold postgraduate degrees.

Regarding field of specialization, the sample distribution is as follows:

- Accounting: 16.1%
- Business Administration: 6.5%
- Economics: 12.9%
- Insurance: 35.5%
- Banking Studies: 3.2%
- Other: 25.8%

As for job titles, the distribution is:

- Insurance Technician: 58.1%
- Department Head: 29%
- Branch Manager: 12.9%

These indicators demonstrate that the participants in the study sample possess relevant academic and practical qualifications in the insurance field, which reflects positively on the accuracy of the data they provided.

Additionally, the years of experience are distributed as follows:

- Less than 5 years: 19.4%

- 6 to less than 10 years: 41.9%
- 11 to less than 15 years: 9.7%
- 15 years and above: 29%

Analysis of Questionnaire Data:

First Hypothesis: Competition in insurance companies is based solely on pricing, known as price competition.

Table (2):

No.	Statements	Standard Deviation	Mean	Mode	Relative Importance	Degree of Agreement	Rank
1	Sudanese insurance companies determine prices based on the size of the insured risk.	0.87	3.97	4	79.4%	High	4
2	Sudanese insurance companies compete on price to attract customers.	0.99	4.22	5	84.4%	Very High	1
3	Sudanese insurance companies determine prices based on past experiences.	0.87	3.67	4	73.4%	High	6
4	Sudanese insurance companies consider special relationships and the number of insured risks in pricing.	0.83	4.19	5	83.8%	Very High	2
5	Customers select an insurance company based on the pricing it offers for risk coverage.	0.91	4.03	5	80.6%	Very High	3
6	Regulatory authorities do not establish appropriate mechanisms for risk pricing to help companies maintain market position.	1.11	3.64	4	72.8%	High	7
7	Insurance companies price their products based on competitor prices.	1.18	3.74	4	74.8%	High	5
8	Insurance companies set prices without actuarial studies or precise risk assessment.	1.24	3.29	3	65.8%	Moderate	8

Source: Prepared by the researcher based on field study data, 2025.

From Table (2), the descriptive statistics for the hypothesis statements indicate that the means range between 3.29 – 4.22, standard deviations range from 0.83 – 1.24, and the mode varies

from 3 to 5 for all statements. According to the five-point Likert scale, respondents mostly agreed, except for Statement 8, which reflects a neutral stance.

Table (3):
Chi-Square Test for First Hypothesis Statements

No.	Statement	Chi-Square	T Value	Degrees of Freedom	Sig. Level	Table Value	Significance
1	Insurance companies set prices without actuarial studies or precise risk assessment.	93.000	25.248	1	.000	4.53	Accepted
2	"	62.000	23.759	1	.000	4.42	Accepted
3	"	76.778	23.500	1	.000	4.26	Accepted
4	"	61.052	28.015	1	.000	4.16	Accepted
5	"	76.242	24.609	1	.000	4.22	Accepted
6	"	89.223	18.251	1	.000	4.11	Accepted
7	"	82.395	17.622	1	.000	4.90	Accepted
8	"	89.446	14.733	1	.000	4.30	Accepted

Source: Prepared by the researcher based on field study data, 2025.

Interpretation: From Table (3), the Chi-Square values range from 62.000 to 93.000, and T-values range from 14.733 to 28.015, all with 1 degree of freedom and significance levels of .000. Since all p-values are less than the significance threshold (0.05), this indicates statistically significant differences in responses, supporting the hypothesis.

Second Hypothesis: Competition affects the volume of underwriting in insurance companies and limits innovation.

Table (4):
Descriptive Statistics for Second Hypothesis Statements

No.	Statements	Standard Deviation	Mean	Mode	Relative Importance	Degree of Agreement	Rank
1	Competition negatively impacts the volume of underwriting in Sudanese insurance companies.	1.03	4.00	4	80%	High	6
2	Harmful price-based competition leads to nominal, unreal increases in underwriting.	0.54	4.32	5	86.4%	Very High	2
3	Intensified market competition causes underwriting shrinkage in some companies, leading to losses.	0.87	4.09	4	81.8%	High	3
4	Entry of new companies	0.94	4.03	4	80.6%	High	4

No.	Statements	Standard Deviation	Mean	Mode	Relative Importance	Degree of Agreement	Rank
	amid deteriorating economic conditions intensifies competition and reduces underwriting.						
5	Healthy competition positively influences underwriting and reduces insurance company losses.	0.56	4.48	5	89.6%	Very High	1
6	Increasing number of insurance companies amid low awareness negatively affects underwriting.	0.94	4.03	4	80.6%	High	5

Source: Prepared by the researcher based on field study data, 2025.

Interpretation: The means range between 4.00 and 4.48, standard deviations from 0.54 to 1.03, and modes between 4 and 5. Based on the five-point Likert scale, the respondents mostly agree with the statements.

Table (5):
Chi-Square Test for Second Hypothesis Statements

No.	Statement	Chi-Square	T Value	Degrees of Freedom	Sig. Level	Table Value	Significance
1	Increasing number of insurance companies amid low awareness negatively affects underwriting.	70.166	21.564	1	.000	4.70	Accepted
2	"	48.265	44.502	1	.000	4.59	Accepted
3	"	72.397	26.217	1	.000	4.25	Accepted
4	"	75.783	23.679	1	.000	4.14	Accepted
5	"	50.291	43.810	1	.000	4.25	Accepted
6	"	75.783	23.679	1	.000	4.46	Accepted

Descriptive Statistics on Related Statements:

No.	Statement	Std. Dev.	Mean	Mode	Relative Importance	Agreement Level	Rank
1	Competition based on service quality positively impacts claims settlement.	0.87	4.32	5	86.4%	Very High	2
2	Applying integrated business reporting and audit standards should shift competition toward faster claim settlement to satisfy policyholders.	0.82	4.29	5	85.8%	Very High	3

No.	Statement	Std. Dev.	Mean	Mode	Relative Importance	Agreement Level	Rank
3	Price competition leads to lower compensation for policyholders.	0.97	3.09	3	61.8%	High	7
4	Fair and adequate compensation is the goal of insurance and helps companies maintain market standing.	0.55	4.61	5	92.2%	Very High	1
5	Sudan's economic situation and increasing competition affect claims due to policyholders.	0.99	3.51	4	70.2%	High	6
6	Harmful competition reduces profit margins.	0.84	4.12	4	82.4%	High	5
7	Harmful competition affects companies' ability to improve technical performance.	1.06	4.16	4	83.2%	High	4

Source: Prepared by the researcher based on field study data, 2025.

Interpretation: From Table (5), the Chi-Square values range between 48.265 and 75.783, and T-values between 21.564 and 44.502, with 1 degree of freedom and p-values of .000 for all statements. Since all p-values are below 0.05, the differences are statistically significant, supporting the hypothesis.

Hypothesis Three: "There is a statistically significant relationship between competition, financial sustainability, and the compensation due to the insured."
Through Table (5), it is observed that the descriptive statistics for the hypothesis statements, which state "There is a statistically significant relationship between competition, financial sustainability, and the compensation due to the insured," show that the means fall within the range of (3.09 – 4.61), with a standard deviation between (0.55 – 1.06), and the mode falls within the range of (3 – 4 – 5) for all statements. According to the five-point Likert scale, the respondents' answers indicate agreement.

Table (6)
Chi-Square Test for the Third Hypothesis Statements:

M	Statement	Chi-Square	T-value	Degrees of Freedom	Significance Level	Tabular Value	Significance
1	The reliance of competition on the quality of insurance services positively impacts the compensation due to the insured.	65.885	27.623	1	.000	5.07	Acceptance
2	The application of integrated business	62.347	28.977	1	.000	4.83	Acceptance

M	Statement	Chi-Square	T-value	Degrees of Freedom	Significance Level	Tabular Value	Significance
	reports should focus on prompt claims settlement to gain customer satisfaction.						
3	The competition between insurance companies based on price leads to a reduction in the compensation for the insured.	84.560	17.625	1	.000	4.96	Acceptance
4	Fair and adequate compensation is the goal of insurance and improves the company's position in the market, maintaining its competitive position.	47.026	45.994	1	.000	3.53	Acceptance
5	The economic situation in Sudan, coupled with increased competition, affects the compensation due to the insured.	77.238	19.662	1	.000	4.87	Acceptance
6	Harmful competition reduces profit margins.	72.131	27.166	1	.000	4.75	Acceptance
7	Harmful competition affects the ability of companies to continue improving their technical performance.	62.204	21.702	1	.000	3.89	Acceptance

Source: Prepared by the researcher from the field study, 2025.

From Table (6), the Chi-square test results for the hypothesis "There is a statistically significant relationship between competition, financial sustainability, and the compensation due to the insured" show that the calculated Chi-square values are (65.885 – 662.347 – 84.560 – 47.026 – 77.238 – 72.131 – 62.204) and the calculated T-values are (27.623 – 28.977 – 17.625 – 45.994 – 19.662 – 27.166 – 21.702). The tabular values range from (3.53 – 4.83) with degrees of freedom (1) and a significance level (Sig) of all statements at (.000). Comparing the Sig significance level with the allowed significance level of 0.05 shows that the Sig level is less than the threshold, which indicates statistically significant differences for the statements.

Hypothesis Four: "Competition affects reinsurance in Saudi insurance companies."

Table (7)
Descriptive Statistics for Responses of Study Sample Members on the Hypothesis Statements:

Statement	Standard Deviation	Mean	Mode	Relative Importance	Degree of Agreement	Rank
1	The market position of the insurance company affects its ability to obtain good reinsurance agreements.	0.83	4.35	5	87%	Very High
2	Insurance companies with a good competitive position can obtain good reinsurance offers.	0.56	4.48	5	89.6%	Very High
3	Companies with a good competitive position are those that meet their requirements for reinsurers to obtain agreements that match their activity size.	0.66	4.35	5	87%	Very High
4	New companies in the market, without a fixed market share and a strong competitive position, cannot obtain good reinsurance agreements.	0.91	3.96	4	79.2%	High
5	The competitive position of direct insurance companies affects optional reinsurance coverage more than agreements.	0.92	3.87	4	77.4%	High
6	Weak insurance companies in the market with poor competitive positions cannot obtain reinsurance coverage at an appropriate price.	0.91	4.19	5	83.8%	Very High
7	The lower the competitive position of direct insurance companies, the more their financial position is threatened, and reinsurance agreement prices increase.	0.91	4.19	5	83.8%	Very High

Source: Prepared by the researcher from the field study, 2025.

Through Table (7), the descriptive statistics for the hypothesis statements, which state "Competition affects reinsurance in Saudi insurance companies," show that the means fall within the range of (3.87 – 4.48), with a standard deviation between (0.56 – 0.91), and the mode falls within the range of (4 – 5) for all statements. According to the five-point Likert scale, the respondents' answers indicate agreement.

Table (8)
Chi-Square Test for the Fourth Hypothesis Statements:

M	Statement	Chi-Square	T-value	Degrees of Freedom	Significance Level	Tabular Value	Significance
1	The market position of the insurance company affects its ability to obtain good reinsurance agreements.	61.774	28.914	1	.000	4.34	Acceptance
2	Insurance companies with a good competitive position can obtain good reinsurance offers.	50.291	43.810	1	.000	4.20	Acceptance
3	Companies with a good competitive position are those that meet their requirements for reinsurers to obtain agreements that match their activity size.	58.528	36.697	1	.000	4.09	Acceptance
4	New companies in the market, without a fixed market share and a strong competitive position, cannot obtain good reinsurance agreements.	77.202	24.216	1	.000	5.19	Acceptance
5	The competitive position of direct insurance companies affects optional reinsurance coverage more than agreements.	77.650	23.385	1	.000	4.34	Acceptance
6	Weak insurance companies in the market with poor competitive positions cannot obtain reinsurance coverage at an appropriate price.	72.397	25.660	1	.000	4.60	Acceptance
7	The lower the competitive position of direct insurance companies, the more their financial position is threatened, and reinsurance agreement	72.397	25.660	1	.000	4.23	Acceptance

M	Statement	Chi-Square	T-value	Degrees of Freedom	Significance Level	Tabular Value	Significance
	prices increase.						

Source: Prepared by the researcher from the field study, 2025.

From Table (8), the Chi-square test results for the hypothesis "Competition affects reinsurance in Saudi insurance companies" show that the calculated Chi-square values are (61.774 – 50.291 – 58.528 – 77.202 – 77.650 – 72.397 – 72.397) and the calculated T-values are (28.914 – 43.810 – 36.697 – 24.216 – 23.385 – 25.660 – 25.660). The tabular values range from (4.09 – 4.60) with degrees of freedom (1) and a significance level (Sig) of all statements at (.000). Comparing the Sig significance level with the allowed significance level of 0.05 shows that the Sig level is less than the threshold, which indicates statistically significant differences for the statements.

Hypothesis Five: "There is a statistically significant relationship between competition, insurance company investments, and customer satisfaction."

Table (9)

Descriptive Statistics for Responses of Study Sample Members on the Hypothesis Statements:

Statement	Standard Deviation	Mean	Mode	Relative Importance	Degree of Agreement	Rank
1	Competition affects the premiums collected by insurance companies, which negatively impacts their investments.	0.87	3.90	4	87%	High
2	Insurance companies with a good competitive position can invest their money in various fields.	0.96	4.16	4	83.2%	High
3	Companies with weak competitive positions invest their funds in stocks, bonds, and deposits, yielding low profits.	0.97	3.70	4	74%	High
4	Insurance companies should invest their funds in various fields to improve the country's economic situation.	0.85	4.25	5	85%	Very High
5	Good and effective competition positively affects insurance investments and generates profits.	0.93	4.16	4	83.2%	High
6	The more insurance companies increase their investments, the more their financial position	0.55	4.35	5	87%	Very High

Statement	Standard Deviation	Mean	Mode	Relative Importance	Degree of Agreement	Rank
	improves, and customer confidence increases.					
7	Credibility and transparency enhance the competitive position of insurance companies and improve their investments in both the short and long term.	0.55	4.35	5	87%	Very High
8	Increased competition initially improves customer satisfaction but may lead to reduced quality in the long term due to cost-cutting.	0.98	3.96	4	79.2%	High
9	Increased competition may lead to market concentration in a few companies, affecting the diversity of services offered.	0.92	3.93	4	78.6%	High

Source: Prepared by the researcher from the field study, 2023.

Through Table (9), the descriptive statistics for the hypothesis statements, which state "There is a statistically significant relationship between competition, insurance company investments, and customer satisfaction," show that the means fall within the range of (3.70 – 4.35), with a standard deviation between (0.55 – 0.98), and the mode falls within the range of (4 – 5) for all statements. According to the five-point Likert scale, the respondents' answers indicate agreement.

Table (10)
Chi-Square Test for the Fifth Hypothesis Statements:

M	Statement	Chi-Square	T-value	Degrees of Freedom	Significance Level	Tabular Value	Significance
1	Competition affects the premiums collected by insurance companies, which negatively impacts their investments.	71.653	24.978	1	.000	4.98	Acceptance
2	Insurance companies with a good competitive position can invest their money in various fields.	73.077	23.900	1	.000	4.18	Acceptance
3	Companies with weak competitive positions invest their funds in stocks, bonds, and	75.196	21.233	1	.000	4.29	Acceptance

M	Statement	Chi-Square	T-value	Degrees of Freedom	Significance Level	Tabular Value	Significance
	deposits, yielding low profits.						
4	Insurance companies should invest their funds in various fields to improve the country's economic situation.	59.432	27.726	1	.000	4.48	Acceptance
5	Good and effective competition positively affects insurance investments and generates profits.	67.393	24.795	1	.000	4.85	Acceptance
6	The more insurance companies increase their investments, the more their financial position improves, and customer confidence increases.	49.216	44.032	1	.000	4.34	Acceptance
7	Credibility and transparency enhance the competitive position of insurance companies and improve their investments in both the short and long term.	49.216	22.482	1	.000	4.45	Acceptance
8	Increased competition initially improves customer satisfaction but may lead to reduced quality in the long term due to cost-cutting.	87.364	44.032	1	.000	4.15	Acceptance
9	Increased competition may lead to market concentration in a few companies, affecting the diversity of services offered.	93.000					

From Table (10) – Hypothesis Testing:
To test the validity of the hypothesis:
"There is a statistically significant relationship between competition, insurance companies' investments, and customer satisfaction", the Chi-square test was used for the statements of the hypothesis. The calculated Chi-square values were as follows:
(71.653 – 73.677 – 75.196 – 59.412 – 67.393 – 49.216 – 49.216 – 87.364 – 93.000)
The calculated (T) values were:

(24.987 – 23.500 – 21.233 – 27.726 – 24.795 – 44.032 – 22.487 – 44.032 – 23.596)
The tabular values ranged between (4.18 – 4.98), with 1 degree of freedom, and a significance level (Sig) of (.000) for all statements.
When comparing the significance level (Sig) with the permissible significance threshold (0.05), we find that Sig < 0.05, which indicates that there are statistically significant differences for the statements.

Study Results:

1. Competition among insurance companies is primarily based on pricing, known as price competition.
2. Harmful competition increases the nominal size of underwriting in insurance companies but limits innovation and development.
3. Harmful competition reduces the opportunity to obtain favorable reinsurance agreements for Sudanese insurance companies.
4. Harmful competition limits the volume of investments of Sudanese insurance companies.
5. Profit margins decline due to harmful competition, negatively affecting companies' financial capability and sustainability, exposing them to long-term financial risks.
6. Unethical and non-transparent harmful competition negatively impacts the technical performance of Sudanese insurance companies.

Study Recommendations:

1. Sudanese insurance companies should compete based on the quality of the insurance services they provide and focus on customer satisfaction instead of attracting clients through price-cutting.
2. Sudanese insurance companies should develop their services and focus on the types of risks that the country needs to address in order to promote the national economy.
3. Insurance companies should set prices based on risk magnitude and not personal relationships, as is common in the Sudanese market.
4. The Sudanese insurance sector should encourage fair and free competition that leads to sector development, rather than harmful competition that causes gradual deterioration.
5. Laws should be reviewed by the National Insurance Supervisory Authority to reduce harmful competition.
6. Sudanese insurance companies should collaborate with each other to exchange experiences, support innovation in insurance products and services, and avoid harmful price-based competition.
7. Develop effective technical performance evaluation systems to help companies measure the impact of harmful competition on their performance and take necessary actions for improvement.
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