

# Effect of Housing Aggressions on The Agricultural Lands on The Jordanian Economic Development from the Perspective of Employees in Directorates of Agriculture

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**Abstract:** This research aims at investigating the effects of Housing aggressions on the agricultural lands on the Jordanian economy from the perspective of the employees in directorates of agriculture in Jordan.

To achieve objectives of the research, the researcher depended on the quantitative research method because of its suitability to conduct this kind of research and address the present phenomenon.

For data collection, the researcher has depended on two sources, secondary data was collected from review of previous related studies, Journals, reports and books.

While primary data was collected through the use of the questionnaire as the main instrument for data collection.

Data collected from the respondents was analyzed using (SPSS) software, statistical package for social sciences study population consisted of all employees at different managerial levels working in directorates of agriculture in the Hashemite Kingdom of Jordan, while the study sample individuals was determined by the simple random sampling technique to be (150) male and female employees, (100) males and (50) females.

Based on the results, the researcher introducing a number of suggestions and recommendations to directorates of agriculture:

- Necessity for Ministry of Agriculture through its directorates in the Kingdom to employ social media in raising the awareness about the serious harms caused by aggressions on the agricultural lands.
- Supporting the farmers to remain in the sector and protecting the agricultural lands.
- Necessity for issuing legislations and penalties against those who practice aggressions on the agricultural lands.

To better protect and preserve the agricultural lands for the benefits of all stakeholders and the Jordanian economy as a whole.

**Keywords:** Aggressions, Agricultural Lands, Directorates of Agriculture.

## 1. Introduction

Agricultural lands constitute the backbone of the agricultural sector which its significance reflects on the country's economic development.

From this stance, it is very important to protect the agricultural lands from any irresponsible practices by the population through their aggressions on the vital lands.

The growing populations in urban areas in Jordan are continuously changing the surrounding natural ecosystem and the landscape (Al-Kafahi, et al, 2018).

Jordan is a country with limited natural resources and witnessing rapid population growth rates and urban advancements towards the agricultural lands, spatial and temporal urban expansion no doubt will have the negative impacts on the agricultural lands.

The changes in the ecosystems are driven by the motives to exploit the agricultural lands in housing projects and complexes due to increasing human economic and industrial activities.

New developments in cities projects increase the fragmentation of agricultural lands, making agricultural units smaller, reduces the economic feasibilities of agricultural projects (Al-Bakri et al, 2013).

Agricultural lands serve as buffers zones between cities and natural habitants, a source of food, fiber, clean air, soil and water, reduce the impacts of urban system on the environment and wild life (Doogun, 2009).

### 1-1 Research Problem:

Research problem stems from the increasing rates of aggressions on the agricultural lands in the Hashemite Kingdom of Jordan, causing many negative consequences on the natural landscape, on the environment, on different stakeholders, and on the Jordanian economic development.

### 1-2 Research Questions:

From statement of the problem emerge the following questions:

1. What are the impacts of aggressions on the agricultural lands?

2. What are the responsibilities of Directorates of Agriculture in preventing aggressions on the agricultural lands?
3. What are the consequences of practicing aggressions on the agricultural lands on the Jordanian economic development?

**1-3 Importance of the Research:**

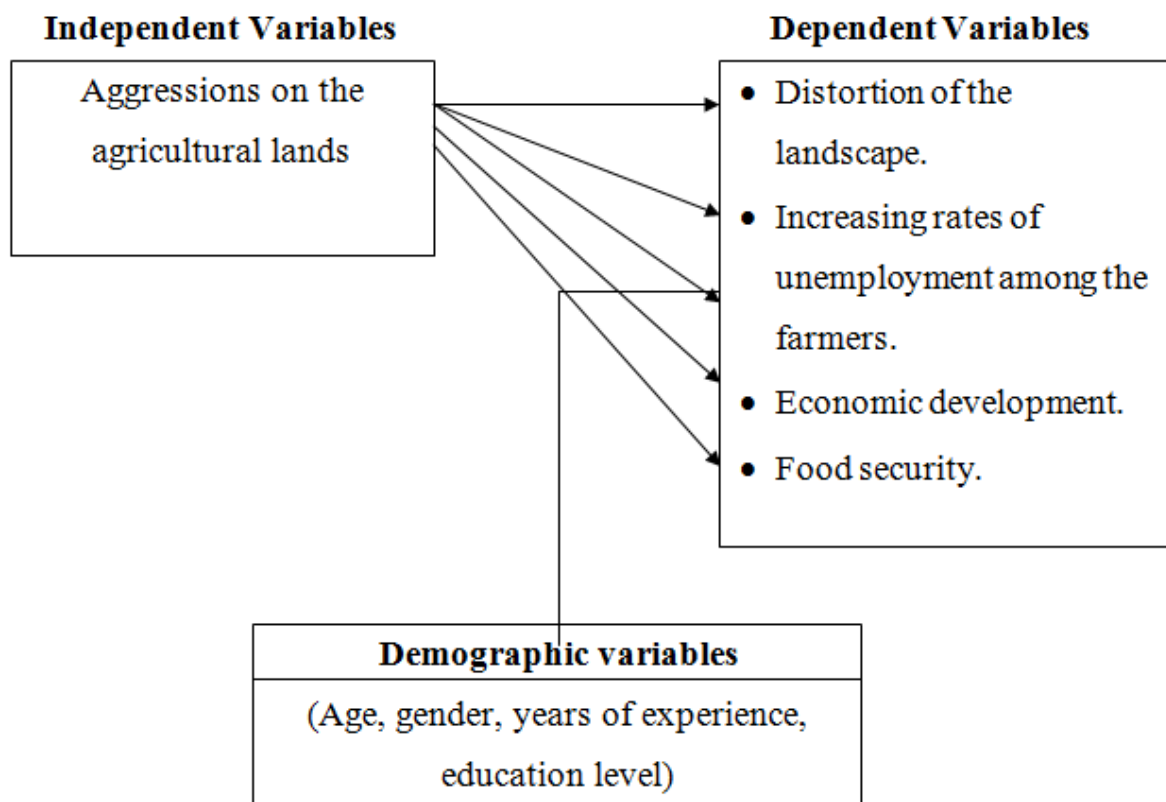
Importance of the research resides in the important role that agriculture plays in satisfying the consumers needs of agricultural products, and the contribution of this sector to the economic development through exporting agricultural products providing the general budget with foreign currencies to be used in different domains.

**1-4 Objectives of the Research:**

This research aims to achieve the following objectives:

- To shed the light on the effects of aggressions on the agricultural lands in the Hashemite Kingdom of Jordan.
- To indicate at the responsibilities of Directorates of Agriculture in preventing forms of aggressions on the agricultural lands.
- To illustrate the consequences of such aggressions on the Jordanian economy as a whole.

**1-5 Model of the Research:**



**1-6 Hypotheses of the Research:**

Ho: There are no effects with statistical significance at significance level ( $\alpha=0.05$ ) of aggressions on the agricultural lands on the dependent variable dimensions (Distortion of the landscape, increasing unemployment rates, economic development).

H1: There are no differences with statistical significance at significance level ( $\alpha=0.05$ ) of aggressions on the agricultural lands attribute to the employees demographic variables (Gender, age, years of experience, and educational level).

**1-7 Limitations of the Research:**

This research is limited to the following:

- It is limited to its topic “Effects of aggressions on the agricultural lands on the Jordanian economic developments”.
- It is limited to the employees at different managerial levels in Directorate of Agriculture in the Hashemite Kingdom of Jordan.

### 1-8 Delimitations of the Research:

Delimitations of the research represent in:

- Small sample size due to difficulties in reaching greater number of respondents because of Corona Pandemic and restrictions to enter the directorates of agriculture.
- Generalization of the results depends on reliability of the respondents answers to the questionnaire’s clauses

### 2. Literature Review:

In a study conducted by (Al-Bakri et al, 2013) entitled “**Impact of climate and land use changes on water and food security in Jordan**” aimed at investigating the impact of land use change on water resources and food security in Jordan, a country which is dominated by arid climate.

The study focused on crop production under trends of anticipated climate change and population growth while at the same time there are different forms of aggressions on agricultural land it is clear that the misuse of agricultural lands led to lesser food production and food security to satisfy the population’s demands for vegetables and fruits.

Human population growth and lack of strict regulations on using the land were seen as major threat and challenges to the ecosystems in addition to unplanned land protection of cultivable lands in urban areas make the problem more serious (Chinas, 2013).

(Al-Bakri, Ajloni and Abu-Zanat, 2008) study entitled “**Incorporating land use mapping and participating in Jordan**” aimed to show that the fragile commons of land suffer from overgrazing of seasonal browse and over-pumping groundwater to irrigate vegetables and fruit trees, they found the inappropriate use of agricultural lands leads to negative impacts on agricultural products and food security.

Al-Tarawneh (2014) study entitled “**Sprawl on agricultural land: survey causes, effect, relationships with land use planning and environment**” showed that population growth drives higher demand for housing, infrastructure, roads, and commercial and industrial requirements in the urban areas, such requirements will lead to changes in the land forms and in the existing ecosystems.

Furthermore, the researcher indicates that the raise in the land prices encourage farmers and land owners to abandon their agricultural lands and agricultural activities.

Alsaaidh, Al-Hanabli and Tateishi (2011) study entitled “**Assessment of land use/ cover change and urban expansion of the central part of Jordan**” aimed to show that urban expansion became very common in developed and developing countries, while some countries have developed different policies and regulations to accommodate the need for land and reduces the impacts on environment and natural resources, this becomes more serious when regulations, policies and planning are weak and not effective to control, monitor and govern urban expansion.

### 3. Methodology and Procedures:

#### 3-1 Design of the Research:

This research depends on the descriptive analytical method to investigate effects of aggressions on agricultural lands on the Jordanian economic development.

#### 3-2 Instrument used in the Research:

The questionnaire has been used as the main instrument for collecting the primary data from the respondents.

#### 3-3 Instrument used in the Research:

Population of this present research consists of the employees in directorates of agriculture in Jordan from different managerial levels.

While the sample consisted of (150) male and female employees (50) females and (100) males.

**3-4 Data Collection Instruments:**

Data was collected for the purpose of this research using two sources:

**3-4-1 Secondary Data:** was obtained from the previous related studies, researches, articles and reports.

**3-4-2 Primary Data:** Primary data was collected using the questionnaire developed by the researcher to answer the study’s questions and to test its hypotheses.

**3-5 Scaling:**

All variables will be measured by using Likert’s Five-Points scale to find out the respondents opinions and perceptions regarding each clause in the questionnaire.

This scale ranges from, strongly agree= 5, agree= 4, neutral= 3, disagree= 2, and strongly disagree= 1.

**3-6 Methods Used for Data Analysis:**

1. The Statistical methods used in this research depend on (SPSS) software to extract the arithmetic means, frequencies and standard deviations.
2. Pearson correlation coefficient for measuring stability of the questionnaire.
3. Cronbach’s Alpha coefficient to measure reliability of the questionnaire.

**4. Data Analysis:**

**Results of the Study:**

The researcher is illustrating results of the research as follow:

**First: Results of the research and discussion:**

**First Hypothesis:**

There is no effect with statistical significance at significance level ( $\alpha=0.05$ ) of practicing aggressions on the agricultural lands on the Jordanian economic development.

To answer this hypothesis, the linear regression coefficient were extracted as seen in table (1).

**Table (1)** Coefficient of the linear regression analysis for practicing aggressions on the agricultural lands and their effect on the development of the Jordanian economy

The Model	Un-standard Coefficients		Standard Coefficients $\beta$	(t) value	Sig	R	R <sup>2</sup>	F (value)	Sig
	Regression coefficient	Standard error							
The fixed	1.574	0.1.3		15.319	0.000	0.902	0.313	9.68.62	0.000
Aggressions on the agricultural lands	0.678	0.022	0.902	31.123	0.000				

It is clear from table (1) that regression coefficients showed that (F) value reached (918.62), and this explanation is with statistical significance, so the is an effect with statistical significance at significance level ( $\alpha=0.05$ ) of aggressions on the agricultural lands on development of the Jordanian economy.

It is possible to explain that through the aggression on the agricultural lands reduce the area of these lands, and the farming process, which reflects in reduction in output of agriculture, and on development of the Jordanian economy which greatly depends on agriculture.

Results of the second Hypothesis which states “there are no differences with statistical significance at significance level ( $\alpha=0.05$ ) of the aggressions on the agricultural lands on development of the Jordanian economy attribute to demographic variables.

**- Age:**

To answer this hypothesis uni-variance analysis was conducted according to table (2).

**Table (2)** Results of the uni-variance analysis for the difference in mean of the study sample individual's answer attribute to gender

Source of the variance	Sum of the squares	Freedom degrees	Mean squares	(F) value	Significance
Between the groups	9.14	3	3.06	13.33	0.000
Inside the groups	79.46	146	0.25		
Total	88.59	149			

Table (2) shows that (F) statistical value reached (13.33) which is un-significant at level ( $\alpha=0.05$ ), so there are no differences with statistical significance at significance level ( $\alpha=0.05$ ) of the aggressions on the agricultural lands on development of the Jordanian economy attribute to gender.

It is possible to explain that the study sample individuals perceive the importance of the agricultural sector, and that the aggressions on the agricultural lands reduce the area of the farming lands and the agricultural output which provides the Jordanian economy with high portion of revenues to the country, and affecting development of this sector.

**Income:**

To answer this hypothesis, the uni-variance analysis was conducted according to table (3).

**Table (3)** Results of the uni-variance analysis for the difference in mean of the study sample individual's answer attribute to income

Source of the variance	Sum of the squares	Freedom degrees	Mean squares	(F) value	Significance
Between the groups	1.18	3	0.40	1.29	0.28
Inside the groups	105.99	146	0.32		
Total	107.17	149			

It is clear from table (3) that (F) statistical value reached (1.29) which is un-significance at significance level ( $\alpha=0.05$ ), so there are no differences with statistical significance at significance level ( $\alpha=0.05$ ) of the aggressions on the agricultural lands on development of the Jordanian economy.

This can be explained through that the study sample individuals, regardless of their incomes perceive that the agricultural sector is one of the most important sectors to the Jordanian economy, and that the agricultural development is a major issue in the development of the Jordanian economy which greatly depends on the agriculture.

**Educational level:**

To answer this hypothesis, the uni-variance analysis was conducted according to table (4).

**Table (4)** Results of the uni-variance analysis of the difference in the aggressions on the agricultural lands on development of the Jordanian economy attribute to educational level

Source of the variance	Sum of the squares	Freedom degrees	Mean squares	(F) value	Significance
Between the groups	1.224	3	0.410	1.350	0.259
Inside the groups	104.982	146	0.305		
Total	106.156	149			

Table (4) shows that (F) statistical value reached (1.350) which is un-significant at significance level ( $\alpha=0.05$ ), so there are no differences with statistical significance at significance level ( $\alpha=0.05$ ) of the aggressions on the agricultural lands on developing the Jordanian economy attribute to the educational level.

It is possible to explain that through the study sample individuals regardless of their educational levels perceive importance of agriculture and the agricultural economy in achieving productivity and profitability contribute to support and develop the economy in Jordan.

## 5. Conclusion and Recommendations:

### First: Conclusions:

The study reached the following conclusions:

1. There is an effect with statistical significance at significance level ( $\alpha=0.05$ ) of the agricultural aggressions on development of the Jordanian economy.
2. There are no differences with statistical significance at significance level ( $\alpha=0.05$ ) of the aggressions on the agricultural lands on development of the Jordanian economy attribute to gender, income, and educational level.

### Second: Recommendations:

In the light of the results, the researcher recommend the follow:

- Necessity for Ministry of Agriculture through its directorates in the Kingdom to employ social media in raising the awareness about the serious harms caused by aggressions on the agricultural lands.
- Supporting the farmers to remain in the sector and protecting the agricultural lands.
- Necessity for issuing legislations and penalties against those who practice aggressions on the agricultural lands.

Conducting more studies concerning the aggressions on the agricultural lands and connecting them with other variable.

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