

## An Analytical Study of Some Political and Economic Factors Affecting Egyptian Potatoes Exports

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**Abstract :** The research focused on studying some of the main political and economic factors affecting Egyptian potatoes exports. Main findings revealed that incidents of the 25<sup>th</sup> of January, 2011, led to several negative impacts, on top of which is the decline in potato exports quantity and value by 12.9% and 6.8% during the second study period (2012-2014) compared to the first study period (2008-2010), respectively, besides the emergence of many competing markets that outperform Egyptian potatoes in terms of comparative and competitive advantages, especially the Netherlands. Therefore, the research recommended benefiting from devaluation of the Egyptian Pound against the US\$ by increasing potatoes export volume and reducing the value of imports bill to reduce deficit in the Balance of Payments, in addition to recovery of domestic market. This of course requires collaboration between a number of parties including the Government of Egypt, farmers, extension agents, and Commercial Attaches in countries across the world, in order to improve the comparative and competitive advantages of Egyptian potatoes thus boost exports to foreign markets.

**Keywords :** Egyptian Potatoes, Comparative and Competitive Advantage, Political and Economic Factors.

### Introduction

Countries often face serious defects in the overall performance of their production sectors following revolutions and change in the political path, leading to negative impacts on the country's economic performance as a whole. Political unrest and lack of security in Egypt following incidents of the 25<sup>th</sup> of January, 2011, led to negative impacts on some of the strategic economic sectors in Egypt, including foreign trade sector that represents a great relative importance for Egypt's economy given the hard currency earnings it generates, which contribute to raising the country's balance of cash reserves. It is worth mentioning that Egypt's total exports value reached US\$ 28.6 billion in 2014, of which the values of agricultural and food exports accounted for 17.6% and 16.9%, respectively. Egyptian potatoes is one of the major export crops for both the country and the farmer due to the high revenues it generates compared to other crops, where potatoes exports value amounted to US\$ 326.8 million representing 6.5% and 6.8% of Egypt's total agricultural and food exports value in 2014, respectively.

## Research Problem

Egypt has lately been facing problems in exporting vegetables, especially potatoes. Foreign markets have been retreating from importing Egyptian potatoes leading to reduction in Egyptian potato exports estimated at 19.6% during the second study period (2012-2014) compared to the first study period (2008-2010)<sup>[1]</sup>. And despite the fact that recent increases in the value of US\$ against Egyptian pound encouraged many countries to import from Egypt, the problem of Egyptian potato exports originates from the fact that European countries, which are the main import markets for Egyptian vegetables, especially potatoes, have been suffering from economic recession and low economic growth rates. In addition, abolishing Governmental subsidy to farmers to purchase imported potato seeds resulted in repetitive use of potato tubers by farmers, which resulted in yielding potatoes unfit for export purposes. In addition, the Russian Supervisory Board issued a decree imposing temporary restrictions on importing Egyptian potatoes, and entirely preventing their entry to the Russian territories as of April 9<sup>th</sup>, 2015 due to the emergence of some brown rot cases.

## Research Objectives

The research mainly aims to study the main political and economic factors affecting Egyptian potato exports. Political factors in the context of this research refer to the factors that accompanied the 25<sup>th</sup> of January, 2011, and influenced Egyptian potato exports; whereas economic factors refer to the impacts main competing markets have on Egyptian potato exports. In addition, the research aims to shed light on the impacts of some economic decrees issued by some countries regarding Egyptian potato exports to their markets.

## Methodology and Sources of Data

The research mainly relied on descriptive statistics methods. As for the sources of data, the research relied on some electronic Websites including the United Nations and the Arab Organization for Agricultural Development, in addition to some relevant literature.

## Results & Discussion

### First: Evolution of Potato Exports over the Period 2008-2014

Studying the evolution of potato exports volume and value over the period 2008-2014 revealed that both increased until reaching a maximum of 684.658 thousand tons and US\$ 326.791 million in 2014, respectively, up 44.7% and 100% compared to 2008. As regards the export price of Egyptian potatoes, it ranged between a maximum of US\$ 676 per ton in 2009, and a minimum of US\$ 477 per ton in 2014, down 29.4%, as shown in Table (1).

**Table (1): Total Exports of Egyptian Potatoes over the Period 2008-2014**

<i>Year</i>	<i>Exports Volume (1000 Tons)</i>	<i>% Change</i>	<i>Exports Value (US\$ Million)</i>	<i>% Change</i>	<i>Price Per Ton</i>	<i>% Change</i>	<i>% Number of Markets</i>	<i>% Change</i>
<b>2008</b>	378.389	-	163.126	-	431	-	20	-
<b>2009</b>	215.078	43.2)(	145.406	(10.9)	676	56.8	22	6.9)(
<b>2010</b>	299.961	39.5	131.899	(9.3)	440	(34.9)	23	4.3
<b>Period's Avg.</b>	297.809		146.810		516		22	
<b>2012</b>	262.985	(12.3)	127.351	(3.4)	484	10	18	(18.8)
<b>2013</b>	427.907	62.7	205.898	61.7	481	(0.6)	16	(12.8)
<b>2014</b>	684.653	60.0	326.791	58.7	477	(0.8)	19	15
<b>Period's Avg.</b>	458.515	53.9	220.013	49.9	481	(6.8)	18	(19.6)

Figures between brackets are negative

Source: United Nations' Website

## **Second: Main Political Factors Affecting Egyptian Potato Exports**

To assess the impacts of the 25<sup>th</sup> of January, 2011, on Egyptian potato exports the research depended on comparing two study periods, the first covers the years 2008 to 2010, whereas the second covers the years 2012 to 2014. Thereafter, the research assessed the impacts of political factors influencing the volume and value of Egyptian potatoes exported to world markets by studying the exported quantities, export price per ton, and the number of importing markets.

### **- Impacts on Egyptian Potato Exports Volume and Value over the Two Study Periods**

Findings revealed that Egyptian potato exports penetrated 42 markets on average over the period 2008-2014. Total number of markets during the first study period amounted to 42, while reached 38 markets during the second study period, down 17.5% compared to the first period. The Italian, Greek, Russian, Lebanese, British, German, French, and Iraqi markets acquired the largest share of Egyptian potato exports, estimated at 272.141 thousand tons worth US\$ 131.969 million representing 91.4% and 89.9% of the average volume and value of Egyptian exports to the world during the first period, respectively; whereas the Italian, Greek, Russian, Lebanese, British, German, and UAE acquired the largest share of Egyptian potato exports, estimated at 397.9 thousand tons worth US\$ 189.233 million representing 86.8% and 86% of the average volume and value of Egyptian exports to the world during the second period, respectively. The resulting impacts, presented in Table (2), indicate the following:

#### **- Lower Imported Quantities and Export Price per Ton**

It is clear that quantities imported of Egyptian potatoes and export price per ton declined by 12.9% in 8 of the world potato importing markets during the second period (2012-2014), these are the markets of Italy, Kingdom of Saudi Arabia, Serbia, Greece, France, Yemen, China, And Switzerland. Declines ranged between a minimum of 8.2% in Italy, and a maximum of 92.3% in Switzerland. In addition, reductions in export price per ton ranged between a minimum of 2% in Switzerland, and a maximum of 59.3% in China, as shown in Table (2).

#### **- Lower Imported Quantities and Higher Export Price per Ton**

Findings revealed that quantities imported of Egyptian potatoes declined by 14.5% in 9 of the world potato importing markets during the second period (2012-2014), these are the markets of Iraq, Belgium, Kenya, the Netherlands, Croatia, Bulgaria, Ukraine, Mauritius, and Czech Republic. The decline in imported quantity recorded a maximum of 98.8% in the Belgian market, whereas the increase in export price per ton recorded a maximum of 81.7% in the Mauritian market, as shown in Table (2).

#### **- Higher Imported Quantities and Lower Export Price per Ton**

It was found that quantities imported of Egyptian potatoes increased by 19.4% in 12 of the world potato importing markets during the second period (2012-2014), these are the markets of Lebanon, Germany, United Arabs Emirates, Albania, Georgia, Qatar, Japan, the State of Palestine, Belarus, Bosnia & Herzegovina, Former Sudan, Syria, Spain, Denmark, and China & Hong Kong. The increase in imported quantity ranged between a maximum of 735% in China & Hong Kong, and a minimum of 27.1% in the Lebanese market. Reduction in export price per ton ranged between a minimum of 2.4% in the Lebanese market, and a maximum of 95.8 in former Sudan market, as shown in Table (2).

#### **- Higher Imported Quantities and Higher Export Price per Ton**

Results showed that quantities imported of Egyptian potatoes increased by 6.5% in 4 of the world potato importing markets during the second period (2012-2014), these are the markets of Russia, Kuwait, Oman, and Bahrain. The increase in imported quantity and export price per ton recorded a maximum of 266.7% and 36.5% in the markets of Oman and Bahrain, respectively, as shown in Table (2).

### - Constant Imported Quantities and Lower Export Price per Ton

Quantities of Egyptian potatoes imported by the British market remained constant at 1.6% of the world total imports during the second period (2012-2014), whereas export price per ton declined by 9.6%, as shown in Table (2).

**Table (2): Implications of the January 25<sup>th</sup>, 2011 of on Egyptian Potato Exports**

Impact	Country	Quantity%	Price Per ton %	Country	Quantity%	Price Per ton %	Country	Quantity%	Price Per ton %
Lower Quantity and Price	Italy	8.2	5.1	Saudi Arabia	8.4	23.7	Serbia	78.7	25.2
	Greece	38.2	11.8	France	75.2	5.7	Yemen	82.9	43.4
	China	77.9	59.3	Switzerland	92.3	2.0	---	---	---
Lower Quantity and Higher Price	Iraq	90.8	8.9	Belgium	98.8	53.8	Kenya	90.2	64.5
	Netherlands	29.6	33.6	Croatia	97.9	42.5	Bulgaria	43.1	71.3
	Ukraine	70.6	12.1	Mauritius	72.5	81.7	Czech Rep	85.5	61.0
Higher Quantity and Lower Price	Lebanon	27.1	2.4	Germany	4.8	14.4	UAE	247.4	40.6
	Albania	50.0	27.1	Georgia	259.3	6.7	Qatar	187.9	20.2
	Japan	308.2	72.6	State of Palestine	120.2	40.5	Belarus	121.8	6.8
	Bosnia Herzegovina	68.6	23.5	Fmr Sudan	72.4	95.8	Syria	450.9	39.8
	Spain	101.8	19.9	Denmark	530.9	44.2	China, Hong Kong	735.0	51.7
	Malaysia	136.3	12.7	Singapore	730.0	15.6	Jordan	797.9	5.5
	Russia	186.4	15.4	Kuwait	715.2	26.2	Oman	266.7	4.3
Higher Quantity and Price	Bahrain	253.6	36.5	-	-	-	-	-	
Constant Quantity and Lower Price	United Kingdom	-	9.6	-	-	-	-	-	
Constant Quantity and Higher Price	Romania	-	16.5	Tunisia	-	26.6	-	-	
Constant Quantity and Price	Latvia	-	-	-	-	-	-	-	

Source: Calculated based on data collected from the United Nations' electronic Website

**Table (2), Continued**

Impact	Country	Impact	Country
Loosing Markets	Israel, Sierra Leone, Kazakhstan, Gambia, Thailand, Montenegro, Areas nes, Slovenia, Sweden, South Africa, Algeria, India, Poland, Iran, Hungary, Rep. of Moldova, Uruguay, Canada	Attracting Markets	Libya, Indonesia, TFYR of Macedonia, China, Azerbaijan, Djibouti, Panama, Afghanistan, Turkey, Cote d'Ivoire

Source: Calculated based on data collected from the United Nations' electronic Website

### - Constant Imported Quantities and Higher Export Price per Ton

Quantities of Egyptian potatoes imported by the Romania and Tunisia remained constant during the second period (2012-2014), whereas export price per ton increased by 16.5% and 26.6%, respectively, as shown in Table (2).

### - Constant Imported Quantities and Export Price per Ton

Findings revealed that quantities of Egyptian potatoes imported by Latvia and export price remained constant, where it kept absorbing 1.6% of the world potato importing markets during the second period (2012-2014), as shown in Table (2).

### - Loosing Markets

Several potato importing markets refrained from importing Egyptian potatoes during the second period (2012-2014). Finding revealed that 18 of the world potato importing markets, representing 39.4% of the average number of world markets during the first study period, stopped importing Egyptian potatoes. These are Israel, Kazakhstan, Gambia, Thailand, Montenegro, Areas nes, Slovenia, Sweden, South Africa, Algeria, India, Poland, Iran, Hungary, Rep. of Moldova, Uruguay, and Canada, as shown in Table (2).

### - Attracting Markets

Results showed that Egypt managed to attract 10 new potato importing markets during the second period (2012-2014), which contributed to increasing the number of potato importing markets by 21.9% compared to the first period's average. These are Libya, Indonesia, TFYR of Macedonia, China, Azerbaijan, Djibouti, Panama, Afghanistan, Turkey, Cote d'Ivoire, as shown in Table (2).

### Third: Main Economic Factors Affecting Egyptian Potato Exports to World Markets

In order to identify the main factors affecting world markets' imports of Egyptian potatoes, it is necessary to study the countries competing Egypt in the world potato importing markets, where the research aims to identify the main country competing Egypt at the level of world markets importing Egyptian potatoes, in addition to studying some of the economic decrees issued by some countries regarding imports of Egyptian potatoes. Generally speaking, foreign markets compete to market a given commodity on the basis of possessing a comparative or competitive advantage, or both, in the production of this commodity. Comparative advantage refers to the country's ability to produce a commodity at a lower cost compared to other countries, in which case the country is said to have a comparative advantage in producing this commodity<sup>2, 4</sup>. On the other hand, competitive advantage refers to possessing an advantage over competitors gained by offering consumers greater value by means of better quality and lower prices compared to other countries<sup>5</sup>.

#### Such factors can be grouped as follows:

- The emergence of some competing countries that outperform Egypt in terms of possessing comparative advantages in potato production thus lower export prices per ton compared to Egyptian potatoes' export price. Such reductions in export price ranged between a minimum of 28.3% and a maximum of 70.8% for France; 0.5% and 38.6% for the Netherlands; 37.5% and 64.5% for Germany; 35.1% and 45.31% for Lebanon; and 7.2 %and 44.2% for China. The decline in export price per ton of potatoes exported by India, Sweden, Serbia, Armenia, Ukraine, Azerbaijan, Denmark, Swaziland, Poland, and Brazil amounted to 69.1%, 15.7%, 45.3%, 54.7%, 63.6%, 16.4%, 60.9%, 29.4%, 25.1%, 68.3%, and 6.8%, respectively. Such reductions resulted in many potato importing markets increasing their potato imports from these countries at the account of Egyptian potato imports. Results showed that the Russian Federation ranked on top of these markets, where it replaced 93% of the quantity imported from Egypt by imports from other countries, whereas the British market ranked last by replacing 21.8%, as shown in Table (3).
- The emergence of 7 competing markets that outperformed Egypt in terms of comparative advantage in potato production. Such comparative advantage contributed to raising the export price per ton in competing markets by amounts that ranged between 1.5% and 92.7% in the Dutch market, while ranged between 19.4% and 99.9% in the market of the USA. In addition, export price per ton of potatoes exported by competing countries, namely Cyprus, Belgium, United Arab Emirates, Lebanon, and Germany, increased by 24.4%, 63.6%, 17.9%, 62%, and 35.8%, respectively. This has resulted in driving an increasing number of markets completely away from the Egyptian market to import their requirements from competing markets.

**Table (3): Main Markets Competing Egypt Due to Possessing a Comparative Advantage in Potato Production**

Competing Market	Markets Importing from the Competing Market	Total Imports		Percent of Imports from Competing Market		Reduction in Export Price per ton Relative to Export Price Per Ton of Egyptian Potatoes (%)
		Q (1000 tons)	V (Million US\$)	Q	V	
France	Italy	627.308	207.375	54.6	44.7	43.8
	Belgium	1587.260	345.713	62.0	50.7	70.8
	Romania	116.118	25.901	42.9	27.6	69.1
	Spain	623.505	201.908	69.4	52.2	28.3
Netherlands	Switzerland	40.161	24.289	33.5	23.1	38.6
	Serbia	24.235	9.025	36.5	42.9	0.5
	Yemen	2.521	2.372	91.4	93.1	6.2
	UK	272.112	136.030	21.8	22.9	11.1
	Germany	605.903	248.070	48.4	36.6	33.3
	Sierra Leone	1.001	0.427	72.6	77.9	3.9
	Iran	0.639	1.369	80.4	85.8	8.2
Germany	Netherlands	1674.903	307.806	65.1	53.6	63.6
	Bulgaria	34.045	8.673	31.7	20.8	64.5
	Czech Rep.	207.920	46.392	50.4	38.3	63.6
	Denmark	120.969	47.753	69.6	51.3	40.9
	Poland	190.288	58.574	24.3	23.4	37.5
Lebanon	United Arab Emirates	215.734	88.496	22.5	17.6	35.1
	Qatar	49.159	21.616	28.5	19.1	41.7
	Kuwait	117.947	45.773	38.8	28.6	45.3
China	Malaysia	193.752	77.731	58.4	58.6	7.4
	Singapore	45.752	24.576	42.9	30.5	9.7
	Thailand	53.137	24.057	42.8	25.2	44.2
Belgium	France	387.213	110.447	58.7	66.7	69.1
India	Mauritius	7.462	5.076	80.3	68.7	15.7
Sweden	Latvia	11.071	3.806	26.3	19.9	45.3
Serbia	Albania	15.746	5.669	69.6	40.2	54.7
Armenia	Georgia	30.478	7.032	35.4	41.7	63.6
Ukraine	Belarus	16.298	8.890	31.5	22.1	16.4
Azerbaijan	Russian Federation	38.141	7.724	93.0	85.4	60.9
Denmark	Sweden	57.858	26.983	59.1	42.8	29.4
Swaziland	South Africa	0.363	0.120	65.8	70.8	25.6
Poland	Rep. of Moldova	26.185	5.192	50.2	38.7	68.3
Brazil	Uruguay	15.109	6.249	64.3	55.4	25.4

Source: Calculated based on data collected from the United Nations' electronic Website

As clear from Table (4), the Netherlands replaced 100% of its imports of Egyptian potatoes by imports from competing countries. Findings also revealed that the Netherlands is on top of the countries competing Egypt in terms of potato exports to world markets, where it possesses both comparative and competitive advantages in potato production, which contributed to attracting 18 foreign markets representing 33% of the average number of markets importing from Egypt during the second period (2012-2014).

**Table (4): Main Markets Competing Egypt Due to Possessing a Competitive Advantage in Potato Production**

Competing Market	Import Market	Total Imports		Percent of Imports from Competing Market		Increase in Export Price (%)
		Q (1000 tons)	V (Million US\$)	Q	V	
Cyprus	Greece	129.338	65.871	23.2	24.6	24.4
Netherlands	Saudi Arabia	33.432	20.931	58.7	66.7	92.7
	Ukraine	21.840	12.377	55.6	52.4	7.0
	Croatia	20.742	13.892	31.4	41.6	24.3
	Kenya	0.076	0.098	100	100	57.5
	Lebanon	87.761	52.621	27.4	35.6	64.6
	Bosnia Herzegovina	17.970	7.991	42.7	53.3	32.1
	Sudan	7.855	5.880	68.7	75.7	15.9
	Syria	25.430	10.815	41.7	20.5	76.4
	Libya	0.156	0.088	64.1	69.0	26.6
	Algeria	123.579	88.266	70.9	72.3	52.6
	Hungary	29.266	10.315	20.6	28.4	1.5
	Montenegro	9.512	3.091	13.5	32.1	61.8
Belgium	Ghana	2.062	0.777	67.2	70.1	63.6
USA	Japan	19.982	10.242	99.9	99.8	80.0
	China & Hong Kong	12.969	47.753	52.8	54.9	65.1
	Canada	153.773	76.888	99.9	99.9	4.8
UAE	Oman	65.638	30.249	16.2	19.4	17.9
Lebanon	Bahrain	21.877	16.700	34.3	39.3	62.0
Germany	Slovenia	27.089	13.942	13.7	17.2	35.8

Source: Calculated based on data collected from the United Nations' electronic Website

#### - Major Implications of the Russian Decree Issued For Imposing Temporary Restrictions on Potato Imports from Egypt and Temporary Banning their Entry to the Russian Market <sup>[5, 6]</sup>

In 2014, the quantity and valued of Egyptian potatoes imported by the Russian Federation from Egypt amounted to 313 thousand tons, and US\$ 148.4 million, respectively, which accounted for 45.7% and 45.4% of the total quantity and value of Egyptian potato exports to the world markets, respectively <sup>(1)</sup>. The issued decree is expected to result in increasing supply of Egyptian potatoes for both foreign and domestic markets, which in turn will lead to reductions in both export and domestic prices of potatoes for easier marketing of the crop. As a result, revenues earned by potato producers shall decline, and some of them may be subject to incurring losses. Consequently, some of them might refrain from cultivating the crop in following season, in which case Egyptian potato supply will decline leading to higher domestic and export prices, which is not in favor of Egyptian potatoes as it is expected to negatively influence its competitive advantage in foreign markets.

#### Main Findings and Recommendations

Research findings revealed that political unrest associated with the 25<sup>th</sup> of January, 2011, resulted in economic instability that led to several negative impacts on Egyptian agricultural exports, of which potatoes is a major one. It was found that foreign markets importing Egyptian potatoes during the second study period (2012-2014) have declined by 12.9% compared to the first study period (2008-2010), whereas export price per ton declined by 6.8%. In addition, some import markets have reduced the quantity imported of Egyptian potatoes, while some others completely stopped importing the crop.

Studying the competing markets revealed the emergence of some competing markets that possess comparative advantage in potato production, and others that possess competitive advantage. It was also found that the Netherlands is on top of the markets competing Egyptian potatoes, where it outperforms Egypt in terms of comparative and competitive advantages in potatoes production and marketing.

Based on that, the research recommends benefiting from the positive impacts of devaluing the Egyptian Pound in exporting more of the traditional export crops like potatoes, etc., which represent values to be reckoned with in the Balance of Agricultural Trade, in addition to reducing imports. It is worth mentioning

that the Central Bank of Egypt devalued the currency by 13% to LE 8.85 in mid-March, 2016, which is expected to offer potato exporters and producers satisfactory prices, in addition to reducing the volume of Egyptian imports of different commodities in favor of domestic products<sup>7, 8,9,10,11,12,13,14,15</sup>.

The research also recommends that the Government adopts farmers' support policy, especially where export crops are concerned in order to guarantee their quality standards as they directly contribute to increasing foreign trade activity thus earnings of hard currencies necessary to increase foreign-exchange reserves the same obtained by<sup>16,17,18,19,20</sup>. Generally speaking, adopting farmers' support policy, either directly by the Government, or by establishing a farmers' support fund, shall stop farmers refraining from cultivating strategic crops in case exposed to financial losses due to encountering many conditions beyond their control under risk and uncertainty our results agree with<sup>21,22,23,24</sup>.

It is also recommended to activate the role of agricultural extension, which has been neglected for a long time, in addition to activating the role of Commercial Attaches in all countries, where they can study the quantities and quality standards required by the markets of each country, and organize exhibitions for promoting Egyptian commodities and opening new market windows. The success of Commercial Attache requires that both farmers and officials abide to providing commodities that satisfy the required quality standards. It is also necessary to activate the role of agricultural quarantine by performing regular inspection on the commodities headed for exports and make sure they get the safety and health certificate required by foreign markets. Finally, it is recommended that officials study carefully the implication of the decrees banning exports of some commodities before issuing, where sometimes they lead to subjecting farmers to huge losses due to accumulation of their products and inability to market them, even in domestic markets, which forces them to get rid of the crop by mixing in the soil, and refraining to plant it the next season, resulting in supply shortage and higher prices, especially in domestic market, the consequences of which are incurred by Egyptian consumers.

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