Measuring the impact of country risks on foreign direct investment

A study in selected Arab countries for the period (2000-2014)

Assistant professor Dr. Hayder Younus Kadhim
Professor of financial markets at the University of Karbala - Iraq

2016

Abstract

The investment environment and foreign direct and indirect is of a great importance in the thoughts and writings of economists and even politicians in order to achieve the desired economic development, more countries has worked to grant encouraging facilities to those investments. The investment in economic development is important because it represents spending on new additions to the production of goods of various kinds.

The country risks has become a subject of great concern to the international finance during the past two decades, and the importance of their evaluation by the presence of many of the major ratings agencies for country risk and the most important is the International Country Risk Guide. The rating agencies used different methods to determine the country risk ratings, as It collects a set of qualitative and quantitative information as well as the identification of alternative standards of the economic , financial and political risk. Due to the rapid growth in international lending and foreign direct investment therefore, the country risk analysis has become very important for both international creditors and investors.

And the above came the idea of analyzing and measuring the impact of country risk on foreign direct investment in some Arab countries (UAE, Egypt and Libya) with an emphasis on Iraq.

First: Research Methodology

1-1 Research importance:

The country risks subject has a great deal of importance in the administrative and economic studies on both levels, local and international. It is so important for the competing ability in attracting the direct and indirect foreign investments and a main source to fund the investments in the economic sectors, productive and service, because of the rarity of the local resources. It has a direct influence on getting rid of joblessness, minimize the poverty ratio, raising the living level for a citizen and increasing the local product within the variety of the product base and the substitution for the resources and increasing the exports to achieve economic surplus in the total economic standards and then increasing the economic growth rate.

1-2 the research problem:

the search problem is restricted in the country risks and their reflections on the direct foreign investment because it is the true beginning for attracting the foreign investments and providing the fund for the productive and serviceable projects to enlarge the productive and serviceable base. The foreign investment provides opportunities to increase productivity, getting rid of joblessness, increase the income and fighting the poverty. The achievement of those goals depends on the availability of certain limits and elements to enable the

concerned country to increase the international competition to attract the direct foreign investments.

1-3 Research hypothesis:

The research hypotheses are summarized by the following:

1. There is correlation relation of statistical significant between the country risks and foreign direct investment.

2. There is impact relationship of statistical significant between the country risks and foreign direct investment.

3. The impact relationship concerning the country risks and direct foreign investment is varied from state to another.

1-4 Research goals :

This research aims to several targets including:

1. Clarifying what the country risks and how they are measured.

2. Analyzing the country risks and direct foreign investment in selected Arab countries.

3. measuring the impact and correlation relation between the country risks and the direct foreign investment in the sample countries.

4. Clarifying the variation or none variation the impact of the country risks in the direct foreign investment to the study sample.

1-5 Research sample and scope of the time:

A number of Arab countries are selected deliberately to be studied and to clarify the impact and the correlation relation and the difference in this relation from one country to another.

These countries are selected because Iraq has a special situation and needs to be studied individually, the United Arab Emirates have not experienced the change revolutions (The spring Arab revolutions as described), while Egypt and Libya have witnessed great changes after the Arab revolutions series. The variety of the income source is the reason behind selecting these countries. Some countries are depending on oil as a main source of income and others depend on the tourism and foreign aids.

So we selected that sample so that we could know the size of the impact and the relationship of the variables of research in a variety of different economies. As for the duration of the research ,it has started from (2000) to (2014) in spite of the many difficulties faced by the researchers to obtain data for the years 2013 and 2014.

Second: the country risks – conceptual topic

2-1 concept of country risks:

The last three decades produced a series of complications and crises in the financial and economic system in general, and among them is the risk ratios that the economic system or any of it's kinds may face . The risk concept has become one of the most important ones that thinkers and writers interested in to reduce it's probable impacts.

What increases complication is the increasing and fixing economic globalization and the movement of capital among the countries, and this activates the foreign investment. The direct foreign investment is raised from 13 Billion Dollars in 1970 to 58 Billion Dollars in

1985 and reached 1300 Billion Dollars in 2001 (Hauser , 2004 : 1) ,and for culminate to 1.6 trillion US dollars in the end of 2014. It is expected that the direct foreign investment will reach 1.7 trillion US dollars in 2015 and 1.8 trillion US dollars in 2016.

The idea of risk in general is not problematic in itself, but the difficulty arises when trying to develop a common and comprehensive definition for it (CLUSIF, 2009: 11), and the other problem is how to find a combination through which, it is possible to reduce the risk to its lowest level. Many intellectual and theoretical contributions are introduced in this regard, the most important is the investment. There are many definitions for the term risk and perhaps the most convenient definition is issued by (the Basel) for the Banking Supervision represented that the risk is the changes in the market value of the institution. this concept is considered as a large one and reflects the point of view which says that "risk management is working to achieve the optimum revenue through the budget between the level of earnings and the degree of risk. " In general, the financial experts define the risk as a probability that the financial institution may be exposed to unexpected and unplanned losses and / or variety in an expected revenue from an investment or a particular activity.

The country risk or the risk of a country , is considered as the main entrance, which is based upon by the institutions whether to enter a country or not and determine the level of acceptance of other risks based on the level of country risk.

The country risk can be defined as a potential losses arising from not keeping the promise because of political, economic or environmental or social events related to a specific country that make individuals or institutions unable to keep their promise towards others. The economic and political events may change and make continuous risk. This will make benefits for the country regardless of the institution qualifications(Stankeviciene , 2014 : 2).Or

can be defined as a risk to the investor when investing in countries outside the boundaries of the town and there is no investment in the local and the resulting set of differences in the economic, political and social structures and currencies(Freyag&et.al ,2015:4).

The country risk is represented in three basic elements that are the political stability, the level of economic stability, and the availability of natural resources and vulnerability to disaster, as the country risk increases the degree of uncertainty for institutions and private financial ones, and, therefore, is an important input for the study and risk assessment as a whole.

The date of country risks analysis began at the late sixties when (Avramovic) introduces a study in (1968) at the World Bank. Avramovic is the first person who studies continuously the factors that affect the balance of payments of the country - and therefore its ability to serve debts for the country(Nath, 2008: 5). He suggests a set of short-term and long-term indicators to assess the ability to serve the debt of the country. He considered short- term indicators , that are related to aspects of cash, an indicator of a country's ability to serve its foreign debts represented by (Nath, 2008: 6): -

1. The growth rate of export volume.
2. The proportion of debt service payments to exports.
3. The proportion of foreign cash reserves for revenues.

The long-term indicators, that were considered the basis for determining the circumstances in which economic growth is funded in part of foreign capital and thus providing continuous service of external debt, included (Nath, 2004: 6):

1. The growth rate of the total local production.

2. The ratio of investment of the total local production.

3. The ratio of exports to the total local production.

The rate of increase in prices before the first oil price shock(1973-1974)Most of the under- developing countries received foreign cash flows and investment on a long-term funding formula, most of them in easy conditions(Hallwood and Macdonald ,2007 :697). After the first oil price shock, the official institutions proved that they are insufficient to face the great foreign changes. The under- developing countries started the foreign fund and the trading banks have a great role in fulfilling the growing needs.

After the second oil price shock of 1979-1980, most countries which have large external debts have faced problems in debts repayment . Since then the country risk analysis process pay increasingly the attention of not only banks and international institutions, but also governments and the general public(Nath,2008:72).

It should be noted here that the official sources indicate that the country risks are associated highly with cash risks in the balance of payments. This is represented for the countries that have excessive external debt, and that burden was happened because the financial obligations are not matching with the financial revenues and therefore reflected in creating internal and external problems for the country (Bouchet and et.al., 2003 , 223).The country risks include many sub-risks involved in measuring the specific indicators of such risks, including political risks that became important for any investor, whether it is direct or indirect investment, in addition to the economic risks which is of great importance (Jones, 2010: 144).

2-2 The country risk indicators:

A lot of studies and ideas are introduced to measure the country risks, and a number of key indicators that measure those risks are presented. The indicators are made on the basis of some variables or determinants that affect overall economic activity in the country, including the political, economic and financial risks, and aspects of the economic freedom and the indicator of indebtedness and other important indicators that have relation with making indicators. The reason behind finding the investment environment is to prepare the appropriate data for investors and give them a wide range of features in the investment and business field in each country through depending on the country risk indicators. This will facilitate their decision-making process about investment and it's kind(Iarossi and et.al., 2007:155). The most important indicators that measure country risk are:

1. The composite indicator for the country risk (PRC)

This indicator is issued each month regularly by the Foundation (Political Risk Services) depending on the International Country Risk Guide (ICRG) since 1980. This indicator covers about 140 countries around the world , including 18 Arab countries. It is divided into three sub-indicators which are the political risk indicator (represents 50% of the value of the composite indicator) and economic risks (forming 25%) and financial risks (forming 25%), the higher the indicator is , the lower the risk degree(Karn&Karabiyik,2015:32) . This indicator is so important for all analysts and specialists in the financial institutions and the other specializations interested in economic investment. This indicator divides countries into five groups according to the degree of risk that are (Bodie and et. Al., 2013: 641):

-Indicator Degree (80-100 points) be of very low risk

-Indicator Degree (70 - 79.9 points) be of low risk

-Indicator Degree (60 - 69.9 points) be of moderate risk

-Indicator Degree (50 - 59.9 points) be of high risk

-Indicator Degree (0 - 49.9 points) be of very high risk

(**A**) **political risk**: it depends on a number of components (factors) to measure these risks and, as in the table below:

Table (1)

political risk (100 percentage points)

Sequence	Component	Points
1	degree of stability of the government	12
2	social and economic conditions	12
3	Investment Map	12
4	The existence of internal conflicts	12
5	The existence of external conflicts	12
6	Corruption	6
7	army's role in politics	6
8	the role of religion in politics	6
9	rule of law and order	6
10	racial unrest	6
11	credibility of democratic practices	6
12	bureaucratic quality	4
Total		100

Source: The Arab Foundation for Investment Guarantee and Export Credit, the investment climate in the Arab countries, the annual report 0.2011, p. 56.

B) the economic risks: it includes a number of components as in the table below:

Table (2)

economic risks (50 percentage points)

Sequence	Component	points
1	per capita income	5
2	Rate of the real economic growth	10
3	inflation rate	10
4	percentage of the budget surplus or deficit to total domestic product (TDP)	15
5	The ratio of the current account to the total domestic product (TDP)	10
Total		50

Source: The Arab Foundation for Investment Guarantee and Export Credit, the investment climate in the Arab countries, the annual report 0.2011, p. 56.

C- Financial risks: It also includes five components, as in the following:

Table (3)

financial risks (50 percentage points)

Sequence	Component	points
1	ratio of external debt to Total Domestic Product	10
2	ratio of external debt service to total exports of goods and services	10
3	ratio of the current account balance to the total exports of goods and services	15

4	Number of months of revenues covered by the State reserves	5
5	stability of exchange price	10
Total		50

Source: - The Arab Foundation for Investment Guarantee and Export Credit, the investment climate in the Arab countries, the annual report 0.2011, p. 56

- Bayati, Faris Rashid, economic development politically in the Arab world, unpublished doctoral thesis, Amman - Jordan, 2008, p 166.

And thus the composite indicator is measured by increasing the above-mentioned components to 100%. Whenever the indicator becomes high, country risk becomes low.

2. Euro money indicator for the Country Risk

This indicator is released twice per year, in order to measure the country's ability to fulfill its financial obligations, such as foreign debt servicing and repayment of the value of revenues. It includes 185 countries, including 20 Arab countries(Popa,2012:102) . When the indicator percentage becomes high, the country risk will be low. This indicator is made up of the following components:

Table (4)

components of Euro money indicator for the country risk

Sequence	Component	ratio (%)
1	sovereign risk	25
2	economic performance	25
3	debt indicators	10
4	Delays of external debt or rescheduled	10
5	credit rating of the country	10
6	bank credit availability	5
7	availability of financing for short-term	5
8	access to capital markets	5
9	discount rate at Waiver	5
Total		100%

Source: Bouchet, Michel Henry, Clark, Ephraim& Groslambert, Bertrand,((Country Risk Assessment A Guide to Global Investment Strategy)), John Wiley & Sons Ltd,2003:P103.

3. Dan & Brad street agency indicator for Country Risk

This indicator measures the country risk associated with international trade, the indicator includes 132 countries including 17 Arab countries. it dividend countries into five categories (low risk, slight, moderate, high and semi-high degree of risk) (CIPS Risk Index , 2014:2).

4. Institutional Investor Indicator for country evaluation

it is issued by the Institutional magazine's since 1998 twice a year, particularly in March and September, and is measured (composed of 100 percentage points) based on a survey aimed at senior economists and analysts at international banks and major financial companies. it covers 178 countries including 20 Arab countries, and this indicator gives degrees as follows:

- Low risk

- Moderate risk
- High risk
- very high risk

5. Coface indicator for the country risk

This indicator measures the risk of the ability of States to pay and reflects the short-term risk of not paying for companies working in these countries. It shows the vulnerability of the financial obligations of companies with total economic level, local political conditions, business environment and historical record of about 41 million companies worldwide. This indicator covers about 165 countries including 19 Arab countries. It classifies countries into two main groups:

Group I : investment-grade group (A), which subdivided into four branches (A1, A2, A3 and A4)

Group II: Group of speculative grade (B, C and D).

The third : Measuring and analyzing the impact of country risk on foreign direct investment

3-1 analysis of the reality of country risk and foreign direct investment in the research sample :

Analysis of the reality of country risk in the study sample of Arab States , The official reports and periodicals of country risks represent the main reason to analysts, researchers

and decision-makers about capacities and threats to their current and future investments. The following table represents a country risk to some Arab countries by using composite risk indicator for the period (2000 - 2014) :

Table (5)

the composite indicator of the risk of the country for selected Arab countries

Countries/ years	Iraq	UAE	Egypt	Libya
2000	47.5	81.5	69.8	70.0
2001	47.3	82.5	68.8	73.8
2002	44.0	81.8	67.5	70.0
2003	40.8	84.3	66.0	75.3
2004	23.5	84.3	69.3	77.3
2005	41.0	84.8	68.8	80.0
2006	49.0	84.8	68.8	81.5
2007	49.5	85.0	69.0	81.3
2008	51.5	83.8	67.3	81.8
2009	59.5	76.8	66.3	75.8
2010	58.3	81.3	65.3	80.5
2011	59.6	81.8	35.8	37.5
2012	59.8	82.3	36.3	30.8
2013	60.5	82.3	58.0	74.5
2014	63.0	84.0	57.8	60.8
The overall growth rate in the value of the indicator (%)	1.9%	0.2%	(1.3%) *	(0.94%)

Source: prepared by researchers relying on the following references

-UNCTAD, World Investment Report, 2014.

- Political Risk Services (PRS), manual report 2014 https://www.prsgroup.com/

Source(reference): The Arab Foundation for Investment Guarantee and Export Credit, the investment climate in the Arab countries, the various annual reports. (*)percentages in brackets are minus.

It is noted through the table (5) that there are large, clear fluctuations in country risk of the Arab countries of the study sample, especially in the Arab countries that have experienced revolutions and changed politically. The reason behind these fluctuations is the economic environment characterized by a lot of political and economic fluctuations which have risks and specifically the political risks. Many Arab countries have witnessed great changes in the structure of the political system, which they used to and adapted with for many decades. These shifts have had a clear and high price in the field of economy and in the identification of the main features of country risk and therefore the impact on foreign direct investment. The Arab countries have been affected by these changes either directly or indirectly.

Table (5)

shows the following in details:

1) **Iraq**: Iraq has witnessed considerable volatility in country risk due to the events in Iraq in 2003. the political, economic, social and financial shifts , that happened specifically in Iraq, produced new types of the political and economic systems that are not used before. This makes confusion in acclimatization process with the new reality and the modern data such as a market economy and opening up to all global sectors, especially the financial sector. The deterioration in country risk is noted since 2000 until 2003 (a very high degree of risk), due to the pressures and threats practiced on Iraq and the sanctions imposed on it

concerning the existence of the production of nuclear weapons. The country risk reached the lowest level in 2004 (23.5%) after the war on Iraq. The political and economic conditions began to improve after 2004 and in conjunction with the rise in world oil prices, and open new horizons for the Iraqi economy , the country risk indicator began to improve. The indicator is changed to the level or high degree of risk, and arrived in 2014 to (63%) and achieved a growth rate of (1.9%) during the study time. Iraq has become within the moderate level of risk, according to the composite country risk indicator.

2) **United Arab Emirates** : the United Arab Emirates have witnessed minor fluctuations in the composite country risk indicator. It has remained stable at a very low level except in 2009 (the rise in the composite indicator is because of the high financial risk due to the global financial crisis and the subsequent deterioration of the global level, particularly In light of the great openness and great interdependence between the financial and banking sector in the UAE with the global financial sector).

Emirates has seen this rate of growth and stability because of a large stability on the economic, political and financial level. It was and still a source for great attraction for direct foreign investment, and with a favorable climate to create investment opportunities, in addition to good legislation and laws that control the investment process inside and outside the country. This is reflected in the consolidation and the protection of foreign investment in order to serve the interests of the host countries or the guests, so we find that the overall growth rate, during the study, for country risks in United Arab Emirates is amounted to (0.2%), which indicates the stability in this country.

3) Egypt: The Egyptian economy depends on the major sources of financing the economy and the most important are tourism, agriculture, and flows from abroad (workers and grants and aid ... etc) and this is what makes country risks in all their three formations (political, economic and financial) balanced to some extent without significant development. The country risks remained ranging in moderate limits since the beginning of the study in 2000 to 2011 after a demonstrations of January 25^{th} , 2011 and the overthrow of the Egyptian regime. The composite indicator in 2011 was about (35.3 points) and the deterioration of the two years 2011 and 2012 or the degree is very high risk, according to specific levels of the composite indicator for the country risks. This happened because of the events that accompanied the change and the subsequent deterioration in the security situation and the state of pessimism in the Egyptian general economy. This ratio began to improve in 2013 and 2014 after the relative stability of the country and the presidential election to become at the high-risk area.

4) Libya: Oil is considered the main source for the State revenue . The composite indicator for the country risk has witnessed a great development during the period of the study until 2010.This indicator is rising from low risk level in 2000 up to a very low level of risk in 2005, taking advantage of the events and changes in the region and the world as a whole, such as the war in Iraq and rising world oil prices. It falls in 2011 and 2012 to a very low level and up to the very low level or degree of risk because of the events in Libya and the coup against the ruling regime's and the political, security and economic chaos that followed the transformation. But after stability in 2013 and the

occurrence of elections, the level of risk decreased and Libya stabilized relatively which was reflected in the composite indicator for the country risks to reach to the level of a moderate degree of risk in 2014.

3-2 Analysis of the reality of foreign direct investment in the Arab States study sample:

The direct foreign direct investment is considered as an essential foundation in the development of economic sectors if it is invested efficiently because it provides funding from outside the country which can be a great addition to the total domestic product. The foreign direct investment in the Arab countries(sample study) have witnessed fluctuation in the period of development during the study as follows:

Table (6)

Foreign direct investment (FDI) for selected Arab countries (million dollars)

Countries / years	Iraq	UAE	Egypt	Libya
2000	3.1	506	1235	141
2001	6.5	1184	510	133
2002	1.6	95	647	145
2003	1000	4256	237	143
2004	300	10004	2157	357
2005	515	10900	5376	1038
2006	383	12806	10043	2064
2007	972	14186	11578	3850
2008	1856	13724	9495	3180
2009	1598	4003	6386	3310

2010	**1396**	**5500**	**6386**	**1909**
2011	**2082**	**7679**	**483**	**506**
2012	**2549**	**9602**	**6881**	**1425**
2013	**2852**	**10488**	**5553**	**702**
2014 *	**3422**	**6752**	**11364**	**902**
The overall growth rate in the value of the indicator (%)	**100%**	**0.1%**	**(4%) ***	**(6.1%)**

Source: prepared by researchers relying on sources:

- The Arab Foundation for Investment Guarantee and Export Credit, the investment climate in the Arab countries, the various annual reports.

- UNCTAD, World Investment Report, 2014.

(*) Estimated data for 2014 based on data for eight months (September / October 2014) of quarterly bulletins and local sites such as the stock market in each country.

Through this table (6) it is noted the great fluctuation and variation in the amount of foreign cash flows invested in the Arab countries and showed two important things:

1) Most of the Arab countries, including the sample countries have been affected by the global financial crisis in 2007-2008 directly , particularly the countries that have the financial and banking sectors on a high degree of openness to the global financial sector, except Iraq which has been affected by the crisis, but in an indirect way. Iraq was affected by the decline in world oil prices, which was reflected on the Iraqi economy recently (more slowly than the rest of the Arab countries) and this led to the decline in

2009 and 2010.

Iraq is not affected by the global financial crisis for many reasons, the most important one is the weakness of the financial and banking sector and the lack of association or openness to the global financial sector. There are many reasons that led to the aggravation of the crisis and spread to most countries around the world (Fair, 2014,1-3) & (Brealey, 2011: 168).

2) The Arab countries have witnessed in the 2011 demonstrations and coups in political systems, which was reflected on the general situation in the Arab region as a whole, except some Arab countries which take the necessary arrangements to maintain their system such as the UAE, Oman, Kuwait and Morocco.

The significant decline in the size of flows for the foreign direct investment in countries such as Egypt and Libya. However, the flows raised again because of the improved security situation and rising optimism in the investment climate in the Arab countries.

3) Iraq is considered one of the world's countries that attract investment after 2003 as a result of the availability of investment opportunities on the one hand and the need of most of the economic sectors for development, especially the infrastructure on the other

hand. So Iraq is an important outlet for profits and a wide range of investment opportunities. But investors and owners of capital faced many obstacles, prominent among those are:

- The laws and legislation concerning investment in Iraq are not clear. The reason behind that is the inaccurate investment law in determining the key features of the

investment.

- Most of the cities of Iraq is witnessing apparent fluctuation in the security situation, in addition to political conflicts between influential parties in the supreme authority.

- Overlap and interlock powers and implementation mechanisms between the center and the provinces and between investment body and government ministries which hinder investment and development processes.

3-3 measuring the impact of country risk on foreign direct investment in the research sample:

A) Establishing standard template:

Linear Regression is to clarify the relationship between the dependent variable and the independent variable by installing data in a linear equation. The dependent variable is usually referred to by the outcome or is symbolized by the Y. Independent variable is the interpreting variable or X, which we doubt that it contributes in the result. The reason behind making the linear regression sample is to find the curve (straight line, parabola, etc.) that best fits the data, and close proximity to the relationship between the real (X and Y)(Huang, 2014:1). The establishment of the standard template is the main pivot in the measurement of the relationship between certain variables in certain circumstances, depending on the research methodology and in accordance with the current data, the overall shape of the template will be in the form of a simple regression equation between the dependent and independent variable as follows (Seltman, 2014: 213-217):

Y = f (X) ..... (1)

Linear Regression:

• Yi: Outcome of Dependent Variable (response)

• Xi: Level of the Independent (predictor) variable

• $\beta_0 + \beta_1 X_i$: Linear (systematic) relation between Yi and Xi

• β_0 : Mean of Y when X = 0 (Y-intercept)

• β_1 : Change in mean of Y when X increases by 1 (slope)

• ε_i : Random error term

And therefore it can clarify the relationship through the following parameters:

- (X) represents the independent variable and country risk is expressed in the composite indicator.

- (Y) is the dependent variable which represent the foreign direct investment (FDI) in the Arab countries.

B) The correlation direction and it's economic impact :

The measurement process will be in one way which is the impact of country risk on flows of foreign direct investment. It is an inverse relationship between these two economic variables. The logic of economic theory is summarized as when the country risk indicators are higher in any country, pessimism and extreme caution from investors and owners of capital are spreading for inside or outside investment taking into consideration any potential losses . This is reflected in the decline of foreign direct investment in the country.

C) Measuring the correlation between country risk and foreign direct investment in the research sample:

Based on the search data and after conducting statistical tests through SPSS program, it is noted that there are irregular values within the time series of data in Egypt and Libya , through a simple statistical treatments, these values were pruning statistically and conclude the following.

Testing the first hypothesis of the search

- Nonexistence Hypothesis (H_0): there is no correlation of statistical significance between the country risks and the foreign direct investment.
- Existence Hypothesis (H_1): there is correlation of statistical significance between the country risks and the foreign direct investment.

Table (7)

the results of correlation between the variables in the sample countries

The dependent variable / The independent Variable	Foreign direct investment (FDI)			
	Iraq	United Arab Emirates	Egypt	Libya
Composite indicator of country risk				
correlation	0.74	0.57	0.09	0.49
Value (t) calculated	3.94	2.52	0.33	1.1
Value (t) Tabulated at the abstract level (5%)	1.762	1.762	1.762	1.762
P-Value	0.002	0.026	0.75	0.03
Decision	Significant	Significant	Non Significant	Significant

It is noted from the table of the statistical results for the correlation between variables (country risk and foreign direct investment), that there is a statistical correlation between them in the (t) sample for search for Iraq , the United Arab Emirates and Libya .This is showed by the value of (t) calculated and correlation value in comparison with Tabulated value which is (1.762) in addition to the (P.Value), which be lower than 5% in Iraq, the UAE and Libya, which shows that the function is incorporeal as a whole. The results were not incorporeal for Egypt because of the events that happened in the country during the duration of the study, especially the years (2008, 2009 and 2011) as a result of the global financial crisis and political events in 2011 in the core changes of the political system in some Arab countries .

In general, we can say that there is a correlation of statistical significant between the research variables, which proves the hypothesis of the first search.

D) Measuring the effect relationship between country risk and foreign direct investment in the research sample:

Testing the second hypothesis of the search

- Nonexistence Hypothesis (H_0): there is no correlation of statistical significance between the country risks and the foreign direct investment.
- Existence Hypothesis (H_1): there is correlation of statistical significance between the country risks and the foreign direct investment.

Table (8)

Results of effect relationship between research variables in the sample countries

The dependent variable / Independent Variable	direct foreign investment (FDI)			
	Iraq	United Arab Emirates	Egypt	Libya
Composite indicator of country risk				
β1	77.8	1311.9	30.5	23.2
Value (f) Calculated	15.54	6.33	0.12	1.2
Value (f) Tabulated at the abstract level (1%)	4.67	4.67	4.67	4.67
Interpretation coefficient (R^2)	54%	53%	10%	51%

Decision	**Significant**	**Significant**	**Non Significant**	**Significant**

It is noted, through the results table of measuring the impact of country risk on foreign direct investment in the research sample countries, that there is a significant effect of incorporeal function for the country Risk (X) on foreign direct investment (Y). This effect is indicated in the calculated indicators of (f) value and the coefficient of determination (R2) . It is found that changes that have affected foreign direct investment in (Iraq and the United Arab Emirates and Libya) is due by (54% and 53% and 51% respectively) because of country risk and the remaining percentages to get to the factors affecting foreign direct investment are due to other factors not included on the form. (f) calculated value was incorporeal in Iraq and the UAE compared with Tabulated value which is (4.67), (f) value was about (15.54 and 6.33) respectively, while the tabulated value was not passed in the cases of Egypt and Libya.

Hence it can be said that there is an impact of country risk on foreign direct investment in the sample countries, so nonexistence hypothesis is refused and existence one is accepted, and the hypothesis of the second search is correct.

E) A comparative study of the impact of country risk on foreign direct investment between the sample countries:

Table (9)

compared to the impact of research in the sample countries variables

The dependent variable / Independent variable	direct foreign investment (FDI)			
	Iraq	United Arab Emirates	Egypt	Libya
Composite indicator of country risk				
Value (f) Calculated	15.54	6.33	0.12	1.2
P. Value	0.002	0.026	0.75	0.03
Sequence	The first	the second	Fourth	third

It is noted that there is a great difference between the impact of country risk on foreign direct investment in each country of the Arab countries through the comparison between the values of (f) and values (P. Value) and this is due to several factors including:

1. Political stability and the security situation.
2. The growth and stability in the financial indicators.
3. The growth and stability in the economic indicators in the country.
4. available resources and types in each country (in term of investment size, such as the oil sector needs a large investment).
5. laws and regulations governing investment in general and foreign investment in particular.

From the above, it can be proved that the hypothesis of the third research concerning the impact of country risk on foreign direct investment in the sample countries, is correct.

Conclusions :

1. The country risk indicator in the sample Arab countries has witnessed a large and clear the fluctuations, and especially in the Arab countries that have experienced popular movements (revolutions). The reason behind such fluctuations is the Arab economic environment characterized by a lot of instability in the economic frame with risks especially the political risks .

2. Arab countries have affected by political changes and the financial crisis in 2007, 2008 and 2011, which was reflected clearly in the identification of the main features of country risk and thus the influence on public investment climate and foreign direct investment. The Arab countries have been affected by these changes either directly or indirectly.

3. The country risk levels in the sample countries are varied, according to the composite indicator for the country risks, but this level reached in 2014 to the following:

- Iraq: within the moderate level of risk

- UAE: within a very low level of risk

- Egypt: within the high risk level

- Libya: within a moderate risk level

4. Most of the Arab countries, including the sample countries have been affected by the global financial crisis in 2007-2008 directly , particularly the countries that have the financial and banking sectors on a high degree of openness to the global

financial sector, except for Iraq which has been affected by the crisis in an indirect way, as it was affected by the decline in world oil prices, which was reflected on the Iraqi economy.

5. The size of foreign direct investment(FDI) in the Arab countries – the sample countries – is influenced by the financial crisis in 2011 after the popular movement and demonstrations in some Arab countries.

6. There is a correlation with statistical significant the template of the search sample concerning Iraq and the United Arab Emirates and Libya. This is indicated by the link value and the value of calculated (t) in addition to the value (P.Value), which fell 5% in the case of Iraq, the UAE and Libya, which demonstrates the function as a whole is incorporeal. The results were not incorporeal in Egypt because of the defect and the events that accompanied the country during the duration of the study, especially the years (2008, 2009 and 2011) and the core changes of the political system in some Arab countries .

7. There is an effect with incorporeal function of the country risk (X) on the foreign direct investment (Y), and this effect is embodied in the value of (f) calculated indicators and the coefficient of determination (R2). It is found that changes that have affected foreign direct investment in (Iraq and the United Arab Emirates and Libya) are (54%, 53% and 51% respectively) because of the country risks. The remaining percentages of the factors affecting foreign direct investment are because other factors are not included in the model.

8. The impact of the country risks on foreign direct investment is different in each country of the Arab countries through the comparison between the values of (f) and (P.Value) and this is due to several factors including:

- Political stability and the security situation

- Growth and stability in the financial indicators

- Stability and development in the economic indicators in the country

- The available resources in each country and its kinds (in terms of the investment size, such as the oil sector which needs a large) investment.
- Laws and regulations governing investment in general and foreign investment in particular.

References:

1- Bayati, Faris Rashid, economic development politically in the Arab world, unpublished doctoral thesis, Amman - Jordan, 2008.

2- Bodie ,Zvi , Kane ,Alex and Marcus ,Alan J. ," Essential of investment " , 9th Ed. ,Global edition ,McGraw-Hill Irwin ,2013 .

3- Bouchet, Michel Henry , Clark, Ephraim and Groslambert, Bertrand, " Country Risk Assessment A Guide to Global Investment Strategy" , John Wiley & Sons Ltd, England , 2003 .

4- Brealey, Richard A. , Myers, Stewart C. and Allen , Franklin ,"Principles of Corporate Finance", 10th Ed., McGraw-Hill Companies , Inc, Americas, New York,2011 .

5- CLUSIF , Club De La Security , Information on Francis ,"Risk Management : concepts and methods " , 2009 .(www.clusif.asso.fr) .

6- Fair , Ray C., " The Financial Crisis and Macroeconomic Activity: 2008-2013" , Cowles Foundation for research in economics Yale University ,2014 . http://cowles.econ.yale.edu/.

7- *Freytag* , *Andreas* , *Gernot Pehnelt* and *Wolfgang Schultze,* " What did 40 Years of Country Risk Assessment Research do for Entrepreneurial Investors", 2015 .

8- Hollywood ,C Paul and Ronald McDonald, " international money and finance, Dar-Almareek for publication and distribution, localization, Dr. Mahmoud Hassan Hosni and review Dr. Wanes Faraj, Saudi Arabia , 2007.

9- Hauser , Frank ," Country Risk andForeign Direct Investments in Transition Countries" , is a thesis Doctorate in Economic Sciences - University of Munich – Germany, 2004 .

10- Huang , Ning ," Scenarios Where Utilizing a Spline Model in Developing a Regression Model Is Appropriate", University of Southern California, papers14/1760, 2014 . (http:www//support.sas.com)

11- Iarossi, Giuseppe, Federica Saliola, and Giovanni Tanzillo , "Business Climate, Productivity and Competitiveness in Armenia: 2002-2005." Armenian Journal of Public Policy 2 (2) , 2007 .

12- Jones , Charles P. ,"Investments: Principles and Concepts ", 11th Ed. , John Wiley &Son Pte. Ltd. , 2010 .

13- Nath , Hiranya K. , "Country Risk Analysis: A Survey of the Quantitative Methods",Sam Houston State University ,Department of Economics and International Business, Working Paper Series, No.SHSU-ECO-WP08-04.

14- ----------, Country Risk Analysis: A Survey. Summer Graduate Research Workshop, Southern Methodist University, Dallas, 2004 .

15- UNCTAD , World Investment Report , 2014 .

16- Seltman, Howard J.," Experimental Design and Analysis" , e book ,2014 . (http:www.stat.cmu.edu) .

17- Stankeviciene, Jelena , Sviderske , Tatjana and Miecinskiene , Algita , " Comparison of Country Risk, Sustainability and Economic Safety Indices", Vilnius Gediminas Technical University, 2014 .(http://www.btp.vgtu.lt) .

18- Kara ,Esen and Karabiyik Lale," The Effect of Country Risk on stock prices : An Application in Borsa Istanbul", Suleyman Demirel University The Journal of Faculty of Economics and Administrative Sciences , Vol.20, No.1, 2015 .

19- Popa , Suzana ," The influence of the country risk rating on the foreign direct investment inflows in Romania", International Journal of Economic Sciences ,Vol. I (No. 2) , 2012 .

20- Political Risk Services(PRS), Annual Report 2014. (https://www.prsgroup.com/).

21- Arab Foundation Investment Guarantee Corporation and Export Credit, the investment climatein the Arab countries, the annual report of the year2000 to- 2013.

22- CIPS Risk Index (CIPS) : A Global Retrospective , Powered by dun & brad street , 2014.