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An investigation on the exchange rate regime of Saudi Arabia and its impact on the economy

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***Abstract**: **Purpose**: the study aims at analyzing exchange rate system of Saudi Arabia and its influence on the other economic indicators such as economic growth, inflation and the rate of CPI. Moreover, it identifies the reasons for choosing such an exchange rate and weather a fixed or a flexible exchange rate is more effective in enhancing the economy.*

In short, the value of this paper is to answer the following key questions:

a) What are the various types exchange rate regimes that has been used in Saudi Arabia over the pastime?

b) What's the impact of the current exchange rate on the economy of Saudi Arabia?

c) Weather a fixed or a flexible exchange rate regime could be a better choice for the economy of Saudi Arabia.

***Methodology**: to carry out this study, thorough research and analyses of the previous literatures, firm's websites, and Expert reports regarding exchange regime was done. Moreover, this paper studied the relationship between the actual exchange rate and its impact on the economy's performance. Taken in mind that the price of oil is decreasing, the study illustrated how the current exchange rate will serve the economy in such a case. **Findings**: The overall findings show that the fixed exchange rate regime has served the economy of Saudi Arabia for the period 1986-2014. While the flexible exchange rate system, which used in the period of 1973-1986, has led to a depreciation in currency and an increase in the inflation rate. The reason for this, is that, since Saudi Arabia completely depends on oil, it has a no diverging economic cycle relative to the United States. Thus, the dollar peg is likely to serve the economy until Saudi Arabia becomes a meaningfully diversified economy, with exports denominated in a mix of currencies. Moreover, in the era of using a fixed exchange rate. **Limitations**: this study has some limitation such as, the span of the time was short, the scarcity of the studies in this Area, especially in the Arab region.*

***Keywords**:* Saudi Arabia, Exchange rate regime, SAR, USD, Economy.

INTRODUCTION :

Exchange rate is one of the most effective instruments in the macroeconomic policies. It defines the Price for which the currency of a country can be exchanged for another country's currency (Nayera Y. Solieman, 2018). Furthermore, exchange rate can be a Flexible exchange rate or a fixed exchange rate. Flexible exchange rate is determined by the foreign exchange market, or forex. It is decided by the mechanism of the market and the demand and supply. While in the fixed exchange rate systems, the country makes sure that its value against the dollar, or other important currencies, remain the same. It buys and sells large quantities of its currency, and the other currency, to maintain that fixed value.

Worth to mention, that The IMF member countries are free to adopt the exchange system they deem appropriate and based on the second amendment to the Articles of the IFAD Agreement. This agreement was ratified following the collapse of the Bretton Woods (1973) system (CVCE, 2016). However, most of the industrialized countries have abandoned the fixed-exchange system and appreciated their currencies, while developing countries have kept the fixed peg of their currencies either to the currency of a strong industrial country (such as the US dollar) or to a basket of currencies.

Now in details, in the fixed exchange systems rate, the local currency is pegged by law or by fixed rate to the currency of another country or a basket of currencies of the country principal trading partners or financiers. In these systems, the local currency is linked by law or by fixed rate to the currency of another country or a basket of currencies of its principal trading partners or financiers. However, there is room for deviation from this central fixed rate in order to rebalance the trade balance, where the exchange rate is allowed to move within a range of less than ± 1% around the central exchange rate. The choice of exchange rate regime and its impact on economic performance is probably one of the most controversial topics in macroeconomic policy. In order to make a sound recommendation for a country exchange rate policy, it is valuable to evaluate how well its exchange rate policies have operated in the past. This in turn requires determination of what policies a country actually followed.

Regarding Saudi Arabia exchange system, Since the collapse of the Bretton Woods system in 1973, The Saudi Arabia monetary policy has pigged the Saudi riyal to USD. At mid-1981, the riyal was loosely pegged (plus or minus 7.5 percent) with the IMF's SDR basket of currencies, but, since 1986 to the present time, it has been tightly pegged with the US dollar, at SAR 3.75/$. This paper investigates the various types of chosen exchange rate systems in Saudi Arabia over the past period. It illustrates the reasons of choosing them, the nature of the exchange rate system and the influence on the country's economy performance. Finally, it compares the economy performance of Saudi Arabia with other countries which used a different policy and different exchange rate systems. Yet this comparison is carried out to draw some conclusion from the GDP and other economic parameters of the chosen country.

LITERATURE REVIEW:

As a matter of fact, the exchange rate system has been a controversial issue among all the macroeconomics topics. (Dibool, 2002) in his paper , he investigated the real exchange rate changes of Saudi Arabia by decomposing it into the economic shocks. The findings show that, economic shocks helped to identify the movement of the exchange rate of Saudi Arabia. Furthermore, Oil played a major role in the movement of the real exchange rate. However, the study didn't take apart in analyzing the nature of exchange rate itself and how it contributes in affecting economy. (Kia, 2015) this study developed a model of the real exchange rate for oil-producing countries in the Middle East and North Africa (MENA) for the period 1985–2009.The results shed light that over the long run, money supply, domestic real gross domestic product (GDP), government expenditure, oil price, and the U.S. externally financed debt per GDP influence the real exchange rate. Over the short run, the changes in domestic real GDP, money supply, government expenditure, domestic and U.S. interest rates, as well as the U.S. debt per GDP, are the determinants of the real exchange rate in these countries. (Khan, 2008) , in this report the authors were arguing on the value and the nature of having a single currency for the gulf cooperation council (GCC).Moreover , what kind of exchange rate regime should be implemented for this single currency. The findings show that pegging the currency to a basket of currencies would more appropriate than any other choice. This conclusion came from the idea that, when inflation persist, the there is a further sharp depreciation of the dollar against other major currencies. this study offered a valuable understanding of choosing an exchange regime for GCC. However, The GCC didn't put the idea of having a single currency in practice, thus there is a need to evaluate the current regimes used in each country. (Gylfason, 2000) is pretty similar to our study, but from a European perspective. Gylfason investigated the Pros and cons of having a fixed or a flexible exchange rate. Moreover, the study gave a special attention to the exchange rate policy in some of the European countries such as Iceland and Norway. The study concludes tha,t the choice it depends on the time and circumstances. However, this paper is aiming at answering the following questions:

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c) Weather a fixed or a flexible exchange rate regime could be a better choice for the economy of Saudi Arabia.

DISCUSSION:

The characters of the exchange rate regime and the efficiency of the economy of Saudi Arabia between 1973-1986.

During the period of 1973-1980, the SAR experienced a remarkable appreciation. The USD dropped from the vale of SAR 3.56 to SAR 3.33 in 1973 and 1980 respectively (SAMA Annual Report Database, n.d.). This appreciation was due to the depreciation of the USD itself against SDR. Moreover, this period of time aligned with a tangible inflation in the non-oil sectors with the implicit price deflator for this sector growing at a compound annual rate of 21.1%. This inflation was primarily a demand-pull phenomenon, and the stronger riyal actually acted to attenuate it by helping to keep import prices low. However, the combination of the riyal appreciation and the high Saudi inflation rate meant that both the real bilateral exchange rate (against the US dollar) and the real effective exchange rate (trade-weighted) showed significant appreciation, creating a significantly over-valued currency during this period.

In contrast, The SAR attained a depreciation between 1981 and 1986. The value value of USD appreciated from SAR 3.33 in 1980 up to SAR 3.75 by the end of 1986. (SAMA Annual Report Database, n.d.). However, although some scientists said that this depreciation is due to the strength of the UD, the decline in the prices of the oil played key role in the depreciation of the value of SAR. Oil export revenues declined from SAR 375.3 billion in 1981 down to SAR 66.7 billion in 1986, a drop of 82.2 percent. (SAMA Annual Report Database, n.d.).

The inflation rate The lack of a firm dollar peg during the 1973-1986 period was accompanied by a volatile non-oil private sector inflation rate, which varied between an increase of 45.6 percent in 1976 to a 3.1 percent decline in 1986 (Khathlan, 2011). Real private sector economic growth was also quite erratic over the same period, ranging from a positive 26.9 percent in 1976 to a negative

8.5 percent in 1986. Certainly, flexible exchange rates do not appear to be a key to stability in either economic output or prices.

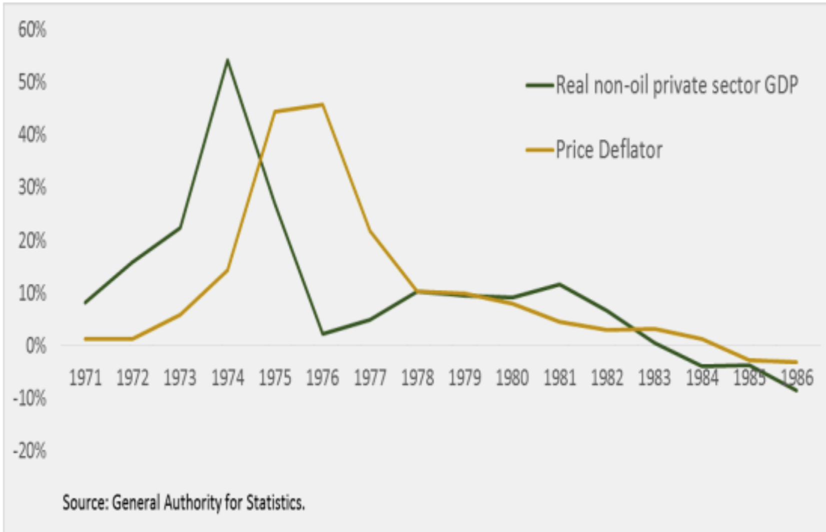

Figure 1 Real -private sector GDP and the inflation in the period of 1971 and 1986.

The characters of the exchange rate regime and the efficiency of the economy of Saudi Arabia after 1986.

Since 1986, the riyal has been pegged tightly to the US dollar, through two major conflicts (the Gulf Wars of 1990-1991 and 2003-2004) and two major declines in oil prices (1993-2000, and 2013 to the present time) separated by a major oil price boom (sassoon, 2016). Despite these enormous changes in national income, the Saudi riyal came under pressure only twice during this period – in late 1993-early 1994 and in late 1998-early 1999.12 In each of these instances, the spot value of the riyal decreased by only 1/10th of one percent (i.e., the value of the dollar increased from 3.750 to 3.754) at its lowest. This lack of movement, despite the speculators' efforts, was due to modest interventions by the Saudi Arabian Monetary Agency (SAMA) in the forward market, amounting to $655 million in 1993 and $820 million in 1998; both of these interventions resulted in a net profit on the forward contracts when they were liquidated.

This tight peg with the dollar coincided with a much-improved set of economic results. Between 1986 and 2015, the annual inflation rate in the non-oil private sector has varied between -3.6% and 6.8%, considerably less volatile than during the 1973- 1986 period. The years with negative inflation rates were primarily due to declines in export prices of petrochemical, which tend to move in tandem with oil prices. Private sector economic growth has also been considerably smoother; for example, real GDP growth has been positive for 28 consecutive years through 2015.

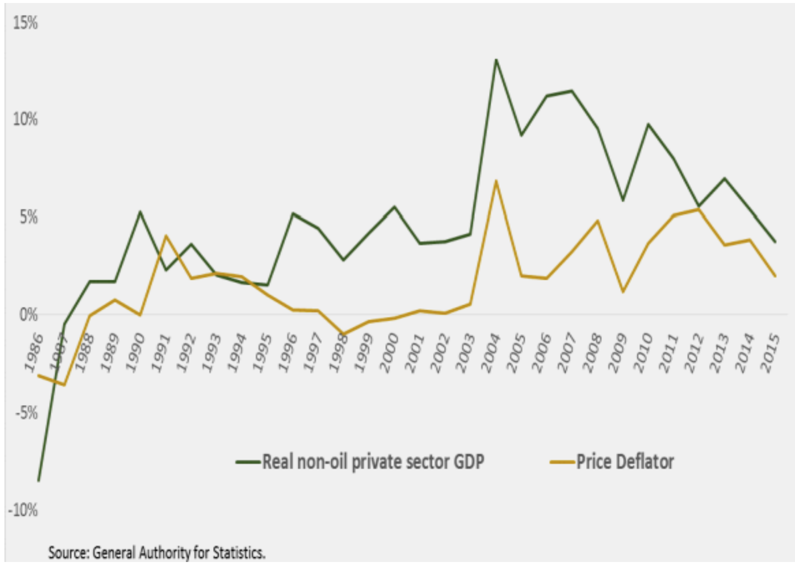

Figure 2 Real private sector GDP and the inflation rate after 1986.

Weather a fixed or a flexible exchange rate regime could be a better choice for the economy of Saudi Arabia?

Although it seems obvious that there is a positive association between the pegged exchange rate and economic performance in the case of Saudi Arabia, the economic literature on this relationship for emerging and developing countries in general has been mixed. There are theoretical arguments on both sides of the issue. Factors favoring flexible exchange rates include the possibility that they could cushion price distortions and the misallocation of resources (.e.g., high unemployment) in the event of real shocks. On the side of pegged exchange rates is the argument that they can reduce relative price volatility, resulting in higher trade and investment and leading to lower real interest rates and faster growth. A credible fixed exchange rate regime can contribute to a predictable and disciplined monetary policy and can reduce the possibility of exchange rate speculation, leading to stronger economic growth.

The empirical evidence concerning this relationship in emerging and developing economies is mixed. One of the more comprehensive studies, by Levy-Yeyati and Sturzenegger (2004), showed a strong and positive relationship between exchange rate flexibility, economic growth, and lack of volatility – i.e., more flexible exchange rate regimes were associated with faster and smoother-growing economies. It is interesting to note that this relationship only applied to the emerging and developing nations – there was no strong relationship in either direction for developed economies.15 However, the study had a major weakness in that it did not consider a country's natural resource base, particularly one that was denominated in US dollars, as a factor in the analysis.

If we look at the arguments for a more flexible currency, it becomes apparent that most of them do not apply in the case of Saudi Arabia. The possibility of real shocks causing high real exchange rates is not particularly disturbing, since an overvalued riyal is not likely to harm the Kingdom's exports, which are denominated in dollars. In addition, the Saudi economy is not particularly sensitive to high real interest rates that might accompany these shocks. Furthermore, a strong exchange rate would reduce the cost of imports, which would act to keep inflation low.

Concerning the current regime and with comparison to other countries' policy The inflation rates in the Kingdom's trading partners have been declining over the last five years. For example, the euro zone has recorded negative figures during recent months; and other countries have recorded low rates except for India. However, even India has witnessed a recent fall in inflation rates as compared to those registered in earlier years. Figure 3 (Ryadh M. Alkhareif, 2016) shows the inflation rates in the Kingdom's major trading partners (excluding the US).

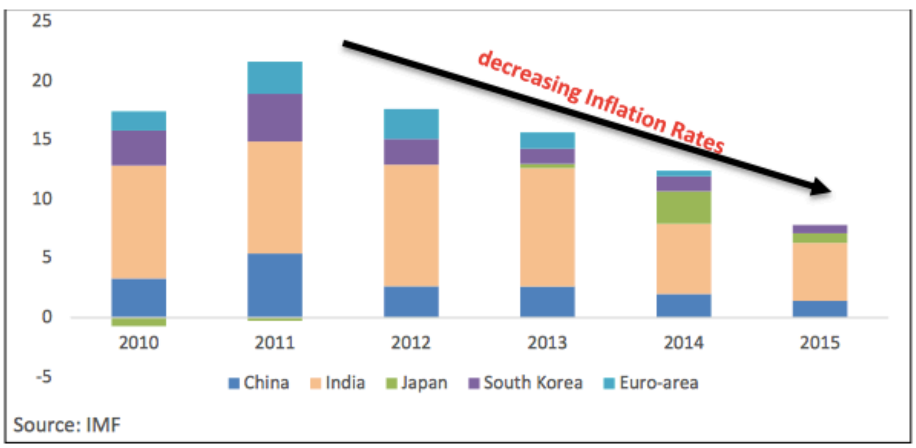

Figure 3 Inflation rates in the Kingdom's Major Trading partners.

The literature has offered many reasons to think that exchange rate policy may impact economic performance. Flexible exchange rates may lead to better performance because they provide better insulation and adjustment to external shocks. On the other hand, fixed exchange rates may offer less uncertainty about the future which has a positive impact on investment, and therefore growth. In both cases, exchange rate stability may lead to better outcomes. However, a stable exchange rate at the wrong level may pump up inflation beyond the desired level. With high inflation, exports become pricey (although this does not apply to oil exports, as their price is set in the world market) and the cost of investment increases, which affects growth negatively. Therefore, historical data about GDP growth and inflation levels, together with their volatilities, can be used to assess whether the exchange rate is set properly or not. Good exchange rate regimes should contribute positively to stability and hence growth.

In this section, a comparative analysis has been performed between Saudi Arabia and the G20 countries, using the compound annual growth rate (CAGR) of real GDP and CPI over the period (1986-2014).

Country	CAGR		Standard Deviation (S.D.)	
	GDP	CPI	S.D. of Real GDP Growth Rate	S.D. of Inflation
Saudi Arabia	4.0	1.4	3.6	2.5
Germany	1.8	1.9	2.2	1.2
Australia	3.2	3.3	1.3	2.3
Canada	2.4	3.2	1.8	1.4
France	1.8	2.0	1.6	1.2
Argentina	3.0	4.8	5.7	6.7
India	6.5	7.7	2.2	2.9
China	9.7	7.5	2.6	6.6
Japan	1.6	0.5	2.5	1.2
UK	2.2	2.8	2.0	1.7
Euro Area	1.4	2.0	1.8	0.8
U.S.A.	2.6	2.8	1.7	1.1
Indonesia	5.4	9.7	4.0	9.8
Italy	1.0	3.2	2.0	1.7
Korea	5.9	4.1	3.9	2.2
South Africa	2.5	8.2	2.0	4.3
Mexico	2.7	16.6	3.0	32.7
Turkey	4.1	40.0	4.6	32.0
Russia	1.8	45.0	6.3	192.2
Brazil	2.6	113.1	2.6	760.2

Figure 4 Compound Annual Growth Rate (CAGR) of Real GDP and CPI

One interesting analytical statistic is the difference between real GDP growth and inflation. A positive difference is an indication of better economic performance. For Saudi Arabia, the CAGR of real GDP was 2.6 percentage points greater than the CAGR of CPI (figure 4). In other words, its economic growth was considerably higher than its inflation rate. This is an indication that the pegged exchange rate regime has prevented strong growth from leading to higher inflation. Three other countries in the G-20 – China, Japan, and Korea – also showed positive differences; however, the Saudi differential was the largest.

To illustrate this phenomena, we can look at the following figure (5):

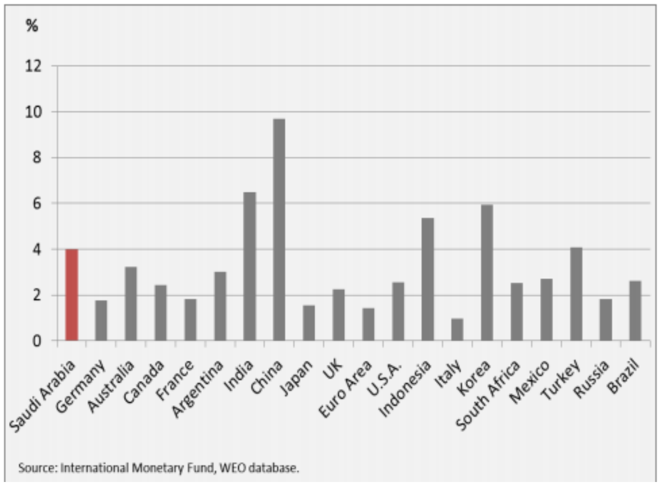

Figure 5Compound Annual Growth Rate (CAGR) of Real GDP

From the figure (6), we see that, in sharp contrast to the low inflation rates of Saudi Arabia and the major developed nations, the inflation rates for Mexico, Turkey, and Russia were in the double digit range. Brazil's average inflation over the 28-year period was 113.1 percent, a reflection of the hyperinflation in the late 1980s and 1990s, with inflation peaking at 2948 percent in 1990. Obviously, this has skewed the analysis somewhat. In fact, it should be noted that the current inflation rates for all of the high inflation countries in this analysis are considerably lower than the average CAGRs over the 28year period. For example, Brazil's 2014 inflation was 6.3 percent, Russia's was 7.8 percent, Turkey's was 8.9 percent, and Mexico's was 4.0 percent.

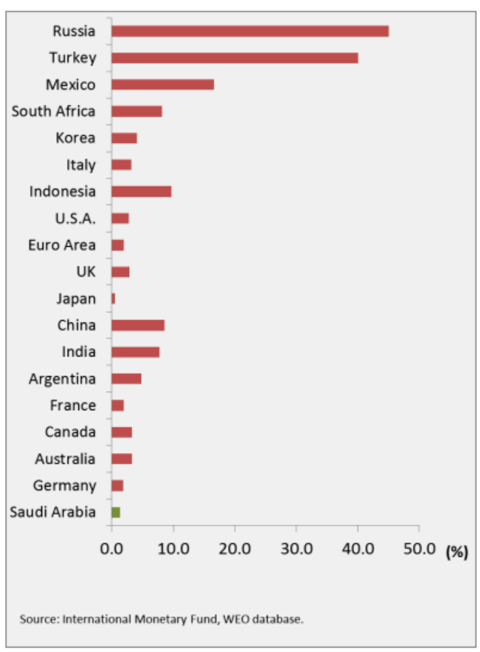

Figure 6 Inflation – Compound Annual Growth Rate (CAGR) of CPI

CONCLUSION:

To conclude, the study overviewed the historical performance of the economy of Saudi Arabia aligned with implementing different exchange rate systems for the period 1973 -2014. The overall findings show that the fixed exchange rate regime has served the economy of Saudi Arabia for the period 1986-2014. While the flexible exchange rate system, which used in the period of 1973-1986, has led to a depreciation in currency and an increase in the inflation rate. However, there are some arguments regarding the different usage of the exchange rate systems and its effect on the economy. In general, Flexible exchange rates may lead to better performance because they provide better insulation and adjustment to external shocks. On the other hand, fixed exchange rates may offer less uncertainty about the future which has a positive impact on investment, and therefore growth. However, in the case of Saudi Arabia, Fixed exchange rate has served the economy more better than the flexible regime for some reasons. First, Saudi Arabia doesn't have a diverging economy since, oil is considered as the main exports of Saudi Arabia. Furthermore, a flexible exchange rate could be a better choice in a case of continuation of the depreciation of the dollar, an unacceptably high US inflation rate (which was the case in the late 1970s), or a diverging economic cycle relative to the United States. What is sure is that in a changing environment, a forward looking monitoring framework will be essential for pursuing the appropriate exchange regime. The decision for one or the other exchange rate regime depends ultimately on the structure of the economy as well as the policy objectives.

To sum up, fixed exchange rate regime is severing Saudi Arabia more the a flexible exchange rate regime for the these reasons. Oil is the main source for the economy and there wasn't a continuation depreciation of the dollar, no an unacceptably high US inflation rate (which was the case in the late 1970s) and there is no diverging economic cycle relative to the United States.

However, In the near future, the dollar peg is likely to serve the economy until Saudi Arabia becomes a meaningfully diversified economy, with exports denominated in a mix of currencies.

Bibliography

CVCE, 2016. *The collapse of the Bretton Woods System,* s.l.: s.n.

Dibool, E. A. A. a. S., 2002. Sources of Real Exchange Rate Movements in Saudi Arabia. *JOURNAL OF ECONOMICS AND FINANCE,* Volume 26.

Gylfason, T., 2000. Fix or flex? Alternative exchange rate regimes in an era of global capital mobility. *North American Journal of Economics and Finance.*

Khan, M. S., 2008. *The GCC Monetary Union—Choice of Exchange Rate Regime ,* s.l.: s.n.

Khathlan, K. A., 2011. Inflation in the Kingdom of Saudi Arabia: The bound test analysis. *African Journal of Business Management,* 11, Volume 5(24), pp. 10156-10162.

Kia, K. E. a. A., 2015. Determinants of the Real Exchange Rate in Oil-Producing Countries of the Middle East and North Africa: A Panel Data Investigation. *Emerging Markets Finance & Trade,* p. 842–855.

Nayera Y. Solieman, E.-N. M., 2018. Effect of the Egyptian pound exchange rate liberation on the prices of some food commoditie. *Middle East Journal of Agriculture Research,* 4, Volume 07, pp. 227-234.

Ryadh M. Alkhareif, A. B. A. S. A., 2016. *Exchange Rates Pass-Through in Saudi Arabia,* s.l.: s.n.

SAMA Annual Report Database, T. 8.-1., n.d. s.l.: s.n.

sassoon, J., 2016. *Iraq, Oil prices and economic management..* s.l., s.n.

Ito, T., & Sato, K. (2006). “Exchange Rate Changes and Inflation in Post-Crisis Asian Economies: VAR Analysis of the Exchange Rate Pass-Through(No. w12395)”. National Bureau of Economic Research.

Maka, E. D. (2013). “Asymmetric Pass-Through of Exchange Rate Changes to CPI Inflation in Ghana”. *International Journal*, *2*(5).

Campa, J. M. & Goldberg, L. S. (2005). “Exchange Rate Pass-Through into Import Prices”. *Review of Economics and Statistics*, *87*(4), 679-690.

Levy-Yeyati and Sturzenegger “To Float or to Fix: Evidence on the Impact of Exchange Rate Regimes on Growth”, ‚American Economic Review, vol. 93, #4, 2004, pp.1173-4.