Are Islamic Banks’ Non-bank Deposits Shock Resistant? A Comparison with Conventional Banks: Evidence from Bahrain

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**Abstract**

 First, the paper empirically examines the growth of nonbank deposit liabilities of the Islamic banks of Bahrain during the pre-global financial crisis (PREGFC) and the global financial crisis (GFC) to determine whether the global financial crisis (GFC) has had any impact on that growth. The paper finds that the mean of nonbank deposits growth for the Islamic banks during the PREGFC and GFC was 17 percent and 30 percent, respectively. The parametric tests—t-test, Welch F-test, and ANOVA—failed to reject the null hypothesis that there was no difference in nonbank deposit growth between the PREGFC and the GFC, suggesting that the global financial crisis had no impact on the Islamic banks’ nonbank deposit liabilities. Second, the paper compares the impact of GFC on nonbank deposit growth between Islamic banks and conventional banks. The result of the hypothesis test, mean difference, between the conventional banks and the Islamic banks during the pre GFC period showed significant difference between them, which suggest that the global financial crisis had a more negative impact on the conventional banks’ nonbank deposit growth than on that of the Islamic banks. Plausible reasons for Islamic banks’ shock resistance are explained.

Key words: Nonbank deposit, parametric test, Islamic Bank, Bahrain

 **JEL Classification**: C13, C23, C33, G21

**I Introduction**

From 2009 to 2011, conventional banks faced serious challenges from the U.S. subprime lending crisis and recession. The U.S. housing market collapsed, unemployment exceeded 10 percent, and the growth rate of the economy was negative. The most devastating effect was seen in the financial sector. One hundred forty banks went bust in 2009 and 157 banks were wiped out in 2010 (Time: January 2012). Such a large scale bank failure had not occurred in the financial history of the United States since the Great Depression (Samad, 2013).

During the same period (2009-2013), there was phenomenal growth in Islamic Banking. The deposits and assets of Islamic banks grew globally. According to the Ernest & Young firm’s estimates, “Islamic banking assets grew at an annual rate of 17.6% between 2009 and 2013 and will grow by an average of 19.7% to 2018” (Economist: September 13th -19th, 2014). Paul Koster, Chief Executive of DFSA said the Islamic finance industry was set to grow from $700 billion to $4 trillion by 2013, and despite the global financial crisis (GFC), Islamic banking was still projected to grow by 15-20 percent annually (Koster, 2009). Given the global credit crisis and fears of economic recession, Apps (2008) claimed that many investors reportedly considered the Islamic bank to be more reliable than conventional financing.

Given Ernest & Young’s claim that “Islamic banking asset grew at an annual rate of 17.6% between 2009 and 2013” when there were large bank failures in the U.S. and around the world, a natural hypothesis is that the nonbank deposits of Islamic banks are global shock insulated. In other words, Islamic banks nonbank deposits were shock resistant to the global financial crisis (GFC).

This paper empirically explores Bahrain’s Islamic banks’ total nonbank deposits to investigate the hypothesis that the GFC had no impact on the nonbank deposit growth of the Islamic bank vis-à-vis conventional banks.

Bahrain was chosen for two reasons. First, the growth of Islamic banking in Bahrain, in particular, has been remarkable, with average total deposits in this segment jumping from BD 1108.3 million in 2000-2006 to BD 5989.96 million in 2007-2013. The market share of Islamic banks correspondingly increased from 1.8 percent of total banking assets in 2000 to 13.3 percent in August 2012. Table 1 provides the comparison of nonbank deposit growth of the Islamic banks and the conventional banks during the PRGFC and the GFC.

Islamic banks provide a variety of financial products, including *Murabaha*, *Ijara*, *Mudaraba*, *Musharaka*, *Al Salam* and *Istitsna'a*, restricted and unrestricted investment accounts which have been appropriately modified to comply with Shari’a principle.

Second, Bahrain is the world’s largest Islamic financial hub (Qorchi, 2005; Samad, 2005). Bahrain has rapidly become a global leader in Islamic finance in recent years. Currently, there are seven Islamic insurance companies (Takaful) and two Re-Takaful companies operating in the Kingdom. In addition, Bahrain is at the forefront of the market for Islamic securities (*sukuk*), including short-term government *sukuk* as well as leasing securities.

The survey of literature shows that there has been no empirical research on whether the global financial crisis had any impact on the growth of nonbank deposit liabilities of Islamic banks vis-à-vis conventional banks. There are claims (Koster, 2009) that the growth of Islamic banks will continue to grow. But there is no empirical evidence. So, the paper is motivated, firstly, to examine whether the nonbank private deposits growth of the Islamic banks was insulated from the global shock. Secondly, the paper examines the comparative impact of the GFC on the deposit growth of both the Islamic banks and the conventional banks to see whether there were differences of impact on them.

The paper applies parametric tests in determining whether the global financial crisis had any impact on the nonbank liabilities, deposits in particular, of Islamic banks’ vis-à-vis conventional banks.

Finding empirical support for the hypothesis that Islamic banks’ nonbank deposits remain unhurt and stabilized against the global financial shock as well as the result of comparative impact on the conventional banks vis-à-vis Islamic banks are important contributions of this paper to the banking literature as well as a lesson for the patron of the banks—the conventional banks and the Islamic banks.

This paper is organized as follows: Section II is a short survey of literature. Section III outlines the unique characteristics of Islamic bank products that differentiate them from conventional bank products and underlie shock resistance. Section IV describes the data, methodology, and model. Empirical results and conclusions follow in Section V.

**II Islamic Banking and Its Product Features**

Islamic banks are a different breed of financial institution. Islamic banking is an institution whose aims and business operations are guided by the Islamic religion rule called Shari’a. The features of Islamic financial institutions/ banks (IFI) are derived from it. In Islam, there is no separation of religion and everyday business-economic or state-political activities. First, all activities including the banking business are guided by the Islamic religion. Islam prohibits its followers from getting involved in certain harmful activities such as the production and consumption of alcohol or pork, gambling, and prostitution. As these activities are prohibited in Islam, Islamic banks do not engage in financing these activities. Second, the most unique feature of Islamic banking is the avoidance of riba (usury) in all financial transactions. This is because, the Quran, the Divine book of Islam, strongly prohibits riba in business transactions. The Quran says: ”whereas Allah permitted trading and forbidden riba” (2: 275). However, neither the Quran nor the Prophet of Islam defined what riba is[[1]](#footnote-1). At present, riba is interpreted as interest. Contemporary scholars of Shariah agree that the predetermined fixed rate of return is not permitted in Islamic banking business transactions.

 The prohibition of interest in business gives rise to the development of unique financial products by the Islamic banks. The unique features of Islamic banking can be understood from an examination of its prototype balance sheet. Like any bank’s balance sheet, the balance sheet of Islamic banks, assets and liabilities items in particular, provides a clear insight into Islamic banking. The major assets of Islamic banks consists of the following:
(i) *Musharakah*, (ii) *Muderabah*, (iii) *Murabahah*, (iv) *Bai Baithaman Jail’*, (v) *bai al-salam*, (vi) *Ijarah*, and (vii) *Istisna*.

 There are two types of the financing contracts of Islamic banks. They are equity type and debt type contracts. *Musharakah* (partnership) and *Muderabah* (trust financing) are equity type contracts (Hamwi & Aylward, 1999).

*Musharakah* is a partnership and joint venture contract between the Islamic bank and the investor where both parties provide capital and manage funds and projects. Profits or losses accruing from the venture are distributed based on the proportion of capital and pre-determined agreement. The key features of this contract are: (i) Profit and loss sharing (PLS), and (ii) avoiding fixed interest. Regarding the first point, both parties share profits or loss. Unlike conventional bank equity contracts where banks do not bear the risk of financing investments, Islamic banks share the risk of investment.

Regarding the second point, unlike conventional banks’ equity contracts where banks enjoy the fixed rate of return from investments, even when there are losses for the project, there is no predetermined rate of returns on investments for Islamic banks. Thus, PLS, avoiding of fixed interest, is a key feature of Islamic financing. Justice requires that both share the risk of business.

*Muderabah* is a trust financing contract between Islamic banks and investors where Islamic banks provide all funds for a project and investors provide physical labor and intellectual and management skills. Profits from the projects are distributed based on a pre-agreed (ratio) arrangement. However, in cases of losses, banks, the provider of funds (called rab al maal), will bear the losses of funds and the investor will bear the loss of his labor. The key feature of this contract is that there is no predetermined fixed rate of returns for bank and both parties share the risk of investment.

 The key features of the *Musharakha* and *Muderaba* contract are: (i) Profit and loss sharing (PLS), and (ii) no predetermined rate of return. In the first case, both parties share profits or losses. Unlike conventional bank equity contracts where banks do not bear the risk of financing investments, Islamic banks share the risk of investment. In the second case, unlike conventional banks’ equity contracts where banks enjoy the fixed rate of return from investments, even when there are losses for the project, there is no predetermined rate of return on investments for Islamic banks. Thus, PLS and avoiding fixed interest are key features of Islamic financing. Justice requires that both share the risk of business.

*Murabaha* financing is a debt type contract. The *Murabaha* mode of financing is based on a “mark-up” ’ arrangement in which goods or assets are purchased by the bank on behalf of a client, and are then sold to the client at a price equal to the cost of the items plus a profit margin. Under the *Murabaha* financing contract, a client wishing to buy goods or assets approaches an Islamic bank to buy them on his behalf. The Islamic bank then buys the product at the current market price, adds a profit margin to them, and then re-sells the products to the client. The key feature is that there is no fixed interest involved, although the critiques of Islamic banks do not admit it. They call the system a “back door for interest-based financing” (Chong and Liu, 2009).

*Bai Baithaman Ajil’* is a variant of the *Murabah* (cost plus) financing contract. The difference is that the delivery of goods is immediate but the payment of goods is deferred. The payment may be made in installments. However, the price of the product is agreed to by both parties at the time of the sale but does not include charges for the deferred payment.

*Bai al-salaam* is a forward sale contract where an entrepreneur sells some specific goods to the Islamic bank at a price agreed upon and paid at the time of contract but the delivery of goods is deferred for the future.

*Al-Ijera* is a lease financing contract and is similar to a conventional bank lease contract. Under this contract, the Islamic bank purchases an asset for a customer and then leases it out to him for a fixed period at a fixed rental charge agreed upon at the time of purchase. A key difference with conventional bank leases is that the lessor (i.e. the Islamic bank) retains the risk of property ownership. Note that Shariah permits fixed rental charges for the use of asset/property services.

*Istisna* is a financing contract under which a manufacturer or a producer produces specific goods for future delivery at a predetermined price.

The key feature of *Bai Baithaman Ajil’, bai al-salam, Ijarah, and Istisna*[[2]](#footnote-2) is that financing is fully securitized and asset based. Unlike conventional banks, Islamic banks retain ownership of the goods until full payment is made.

On the liability side, deposit accounts of Islamic banks are classified into three major categories. They are:(i) *Al wadiah* demand deposits, (ii) *Mudarabah/Al Wadiah* saving deposits,and(iii) *Muderabah* investment deposits.

 *Al Wadiah* demand deposits are current deposits and are similar to conventional banks’ current deposits that guarantee the safety of deposits and the payment of money on demand. However, the key difference with conventional banks’ demand deposits is that the depositors of *Al Wadiah* deposit contract are not entitled to a fixed rate of return for their deposits. That is, depositors are not eligible to any share of profits. However, banks, at their discretion, may give a part of their profits, called hibah, to depositors for attracting deposits.

*Mudarabah* saving deposits of the Islamic bank are similar to conventional banks’ saving deposits. The key feature of this account is the guarantee of safety andpayment. Since this is afixed deposit, banks guarantee the payments of some profits, if there is any, but banks do promise any fixed rate or amount.

Unlike the *Al Wadiah* demand deposits and the *Mudarabah/Al Wadiah* saving deposits, the *Muderabah* investment deposit is a profit and loss sharing deposit. *Muderabah* investment depositors share the risk of investing their funds with banks. Depositors get profits or losses based on agreements. Usually the rate of returns is higher than of *Al Wadiah* demand deposits and *Mudarabah/Al Wadiah* saving deposits. The key feature of this liability contract is that Islamic banks guarantee neither the safety of depositors’ capital nor any return on deposits. In this sense, Islamic banks’ *Muderabah* investment deposits are more risky than those of conventional banks’ fixed deposits. Additionally, the profit and loss sharing under this contract (*Muderabah* investment deposit) is not symmetric. Under this contract, banks share profits but share no losses. Depositors bear all losses (Chong & Liu, 2009).

To sum up, the key features of Islamic banks discussed above, profit and loss (PLS) mode of business, fully securitized financing, and the control of ownership of assets until complete payment is made, may provide Islamic banks insulation from the global financial shock but this idea needs to be explored.

**III Survey of Literature**

The resurgence of Islamic values and the growth of Islamic banking led to great interest and rapid growth of Islamic banking literature. The extent of past scholarly research on Islamic banking includes Khan (1983), Mannan (1968), Iqbal and Mirakhor (1987), and Ahmad (1984). These authors discuss the theoretical development of institutional issues and concepts, including Arabic concepts, and principles that are subject to interpretation.

Khan (1986) provided an important theoretical model of Islamic banking and compared the model with conventional banking. He argued that Islamic banks “treat deposits as shares and accordingly do not guarantee their nominal value” (p. 19). Since profit and loss is equity, account depositors would be treated like shareholders of a bank and, therefore, “no official reserve requirement would be necessary for these investment deposits” (p.20-21). Chapra (1982) and Siddiqi (1983) argued for Islamic banking as the primary alternative to interest based conventional banking. They also argued that Islamic bank was an efficient way to obtain economic growth without getting involved interest.

Khan (1983) provided a good description of the development of Islamic banks in Egypt, Kuwait, UAE and Pakistan. Kazarian (1993) compared two Egyptian Islamic banks with Egyptian conventional banks, taking ratios of long term financing and found that the two Islamic banks occupied the third position in Egypt during 1979-1990. Aggarwal and Yousef (2000) examined Islamic banks’ mode of operations and found that the profit and loss sharing mode of Islamic banks was minimal and the agency problem of Islamic banks was more severe. Samad, Gardner, and Cook (2005) studied the Bahrain and Malaysia Islamic banking finances and found that the *Muderabah* and *Musharak*, the distinct mode of Islamic banks that distinguished Islamic banks from the conventional banks, accounted for less than 4 percent of total financings. Debt type financing such as *Murabah* and *Ijarah* appeared to be most popular and dominant of all other modes of financing.

Samad (2004) compared the performance of Islamic banks and conventional commercial banks of Bahrain with respect to (a) profitability, (b) liquidity, and (c) capital management. Eleven financial ratios were compared for the period 1991-2001 which showed that there was no difference in profitability and liquidity performance between Islamic and conventional banks. Fayed (2013) compared the profitability, liquidity, credit risk, and solvency performance of three Egyptian Islamic banks with six conventional banks during 2008-2010 and found evidence of the superiority of the conventional banks’ performance over Islamic banks.
Chong and Liu (2009) examined Malaysian Islamic banks and found that the profit and loss sharing mode of finance was minimal. The growth of Islamic banking was largely driven by the Islamic resurgence rather than by an advantage of the profit and loss sharing mode of production.

Cevik and Charap (2011) examined the empirical behavior of conventional bank deposit rates and the rate of return of Islamic banks in Malaysia and Turkey and found that there was long run co-integration between the series.

 Samad (2013) investigated whether the global financial crisis (GFC) has had an impact on the efficiency of Islamic banks by using the time varying Stochastic Frontier function on the Islamic banks of 16 countries. The efficiencies of Islamic banks were estimated using the Cobb-Douglas production function which showed that the global financial crisis had had no impact on banks’ efficiency. Mean efficiencies between the pre global financial crisis and the post global crisis were estimated at 39 and 38 percent respectively and the difference was not statistically significant.

The survey of literature shows that there is no study dealing with the Islamic banks’ immunity to global shock on deposits mobilizations.

**IV Data and methodology
Data**Data of non-bank deposits (non-bank liabilities) of the Islamic and the conventional banks of Bahrain during 2001-2013 were yearly and were obtained from the central bank of Bahrain. The author calculated the growth of nonbank deposits. A descriptive statistics of the nonbank deposit growth of the Islamic banks and the conventional banks during 2001- 2013 is provided in Table 1.

Table 1
Comparison of Nonbank Deposit Growth[[3]](#footnote-3) Rate Between Conventional Banks and Islamic Banks During 2000-2013\*

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | Mean | Median | Maximum | Minimum | S.D. | Jarque Bera |
| Conventional Banks | 0.12 | 0.09 | 0.39 | 0.02 | 0.10 | 7.67(0.02) |
| Islamic Banks | 0.24 | 0.13 | 0.78 | 0.02 | 0.23 | 3.13(0.13) |

\*( )= indicates probabilities of jarque Bera.

 Table 1 shows the phenomenal growth rate of Islamic banks’ nonbank deposit mobilizations. The average growth rate of nonbank deposit mobilizations for Islamic banking was 24 percent during 2000 -2013. On the other hand, the growth rate of the conventional banks’ nonbank deposit mobilization was 12 percent (i.e. half that of the Islamic banks) during 2000 -2003. Although the minimum growth rate of nonbank deposits was the same (2 percent) for the conventional and the Islamic banks, the maximum growth of the Islamic banks (78 percent) was higher than that of the conventional banks. Similarly, the median growth rate of the nonbank deposits of the Islamic banks was higher than that of the conventional banks. The probability of Jarque Bera associated with the deposit growth of the Islamic banks suggests that the growth series of the Islamic banks is normally distributed as opposed to the non-normal distribution of the conventional banks.

**Methodology**

Two periods, the pre global financial crisis (PREGFC) and the global financial crisis (GFCP), were investigated in determining the impact of the global financial crisis on the nonbank deposit growth. The period 2000-2007 was considered the pre-global financial crisis period (PREGFC) and the period 2008-2013 was considered the global financial crisis period (GFCP).

 The growth of nonbank deposit liabilities of the conventional banks and the Islamic banks during the PREGFC and GFC are presented in Table 2 for deriving the appropriateness of statistical test method.

Table 2
Nonbank Deposit Growth of Islamic Banks and Conventional Banks During the PREGFC\* and GFC

|  |  |  |
| --- | --- | --- |
|  | Conventional Banks | Islamic Banks |
|  | PREGFC | GFC | PREGFC | GFC |
| Mean | 0.15 | 0.08 | 0.18 | 0.30 |
| Median | 0.10 | 0.07 | 0.12 | 0.21 |
| Maximum | 0.39 | 0.18 | 0.43 | 0.78 |
| Minimum | 0.03 | 0.02 | 0.02 | 0.06 |
| Jarque Bera(probability) | 1.32(0.51) | 0.83(0.65) | 1.28(0.52) | 1.06(0.58) |

\*PREGFC= Pre Global Financial Crisis, GFC= Global Financial Crisis

A comparison of the nonbank deposits growth of the Islamic banks and the conventional banks during PREGFC and GFC periods shows differences. (1) The growth of nonbank deposits of the conventional banks declined from 15 percent to 8 percent during the GFC. (2) The growth of nonbank deposits of the Islamic banks increased during the GFC from 18 percent to 30 percent. (3) The probability of the Jarque Bera suggests that both series (conventional banks’ nonbank deposits and Islamic banks’ nonbank deposits) are normally distributed. The null hypothesis of non-normal distribution is rejected. The implication of normal distribution of both series suggests the appropriateness of parametric tests such as t-test, ANOVA and Welch F-test. Non-parametric tests such Kruskal Wallis and the Wilcoxon rank test are not required.

 Three hypotheses were tested. **First**, the deposit growth of Islamic banks between the PREGFC and GFC was tested to see whether the global financial crisis had has an impact on the nonbank deposits of Islamic banking in Bahrain. That is, the null hypothesis was tested against the alternative hypothesis.

Null hypothesis, H0:  µDepPREGFC = µDepGFC (1)
 Alternative hypothesis Ha : µDepPREGFC ≠ µDepGFC

There is no difference in nonbank deposit growth mobilizations of Islamic banks between the PRECFC and the GFC whereµDepPREGFC = mean of nonbank deposit growth during the pre global financial crisis and µDepGFC =mean of nonbank deposit growth during the global financial crisis.

Alternative hypothesis, Ha : µDepPREGFC ≠ µDepGFC : There is a difference in nonbank deposit growth mobilizations of Islamic banks between the pre global financial crisis and the post global financial crisis period.

The rejection of the null hypothesis (H0:  µDepositpreGFC = µDepositpostGFC) that there is no difference in deposit growth mobilization concludes that the global financial crisis had an impact on the deposit growth mobilizations of Islamic banks. On the other hand, if the null hypothesis cannot be rejected, it can be concluded that deposit mobilizations are the same between the two periods which suggests that the global financial shock has had no impact on Islamic banks deposit mobilizations. The deposits of Islamic banking of Bahrain are insulated from the global financial crisis.

**Second**, the PREGFC and the GFC nonbank deposit growth of the conventional banks and the Islamic banks was tested to determine whether there were differences in impact of the global financial crisis on the convention banks and the Islamic banks.

The null hypothesis and the alternative hypothesis for the pre global financial crisis were:

H0:  µCONBKDepPREGFC  - µISBKDepPREGFC = 0 (2)

Ha:  µCONBKDepPREGFC  - µISBKDepPREGFC  ≠ 0

Where µCONBKDepPREGFC = mean of nonbank deposit of the conventional banks during the global financial crisis period. µISBKDepPREGFC = mean of nonbank deposit of the Islamic banks during the global financial crisis period.

The failure to reject the null hypothesis suggests that there was no difference in the growth of nonbank deposit mobilizations between the conventional banks and the Islamic banks.

**Third,** the impact of the global financial crisis on the nonbank deposit growth of the Islamic banks and the conventional banks was tested by the parametric test as:

H0:  µCONBKDepGFC - µISBKDepGFC =0 (3)

Ha:  µCONBKDepGFC - µISBKDepGFC  ≠ 0

The failure to reject the alternative hypothesis indicates that there was a difference in the nonbank deposit growth between the conventional banks and the Islamic banks during the GFC. The GFC had an impact on the deposit growth.

If the mean difference is negative and statistically significant, it suggests that the nonbank deposit growth of the conventional banks was adversely affected by the GFC compared to that of the Islamic banks.

**V Empirical results and conclusions**

The results of the empirical tests for the nonbank deposit growth of Islamic banks between the pre-global financial crisis and the global financial crisis are presented in Table 3.

Table 3

Test for Equality of Means for Islamic Banks’ Nonbank Deposits etween the PRGFC and the GFC Periods

|  |  |  |  |
| --- | --- | --- | --- |
| Test for Equality of Means Between Series

|  |
| --- |
| Sample: 2000 2013 |
| Included observations: 14 |

 |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Method | df | Value | Probability |
|  |  |  |  |  |
|  |  |  |  |  |
| t-test | 11 | 1.112740 | 0.2895 |
| Satterthwaite-Welch t-test\* | 9.228964 | 1.168105 | 0.2721 |
| Anova F-test | (1, 11) | 1.238189 | 0.2895 |
| Welch F-test\* | (1, 9.22896) | 1.364470 | 0.2721 |
|  |  |  |  |  |
|  |  |  |  |  |
| \*Test allows for unequal cell variances |  |
|  |  |  |  |  |
| Analysis of Variance |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Source of Variation | df | Sum of Sq. | Mean Sq. |
|  |  |  |  |  |
|  |  |  |  |  |
| Between | 1 | 0.064326 | 0.064326 |
| Within | 11 | 0.571471 | 0.051952 |
|  |  |  |  |  |
|  |  |  |  |  |
| Total | 12 | 0.635797 | 0.052983 |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Category Statistics |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  | Std. Err. |
| Variable | Count | Mean | Std. Dev. | of Mean |
| ISBKPREDEPG | 7 | 0.308346 | 0.279277 | 0.105557 |
| ISBKPOSTDEPG | 6 | 0.167242 | 0.143872 | 0.058736 |
| All | 13 | 0.243221 | 0.230181 | 0.063841 |
|  |  |  |  |  |

 An examination of Table 3 shows the mean nonbank private deposit mobilizations of the Islamic banks between the pre-global financial crisis and post-global financial crisis were 30.8 percent and 16.7 percent respectively. The large probability value (0.65) associated with the t-test, ANOVA F-test, and Welch –F test fails to reject the full hypothesis, suggesting that there was no significant difference in the nonbank deposit growth between the two periods. The failure to reject the null hypothesis confirms that the global financial crisis has had no impact on the deposit mobilizations of Islamic banks.

 The results of the comparison for nonbank deposit growth between Islamic banking and conventional banking during the PREGFC and the GFC are presented in Tables 4 and 5.

Table 4
 Equality Test for Nonbank Deposit Growth Between Islamic Banks and Conventional Banks During the PREFC

|  |  |  |
| --- | --- | --- |
| Sample: 2000 2013 |  |  |
| Included observations: 14 |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Method | df | Value | Probability |
|  |  |  |  |  |
|  |  |  |  |  |
| t-test | 12 | -1.321311 | 0.2110 |
| Satterthwaite-Welch t-test\* | 8.341764 | -1.321311 | 0.2215 |
| Anova F-test | (1, 12) | 1.745862 | 0.2110 |
| Welch F-test\* | (1, 8.34176) | 1.745862 | 0.2215 |
|  |  |  |  |  |
|  |  |  |  |  |
| \*Test allows for unequal cell variances |  |
|  |  |  |  |  |
| Analysis of Variance |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Source of Variation | df | Sum of Sq. | Mean Sq. |
|  |  |  |  |  |
|  |  |  |  |  |
| Between | 1 | 0.081920 | 0.081920 |
| Within | 12 | 0.563069 | 0.046922 |
|  |  |  |  |  |
|  |  |  |  |  |
| Total | 13 | 0.644989 | 0.049615 |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Category Statistics |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  | Std. Err. |
| Variable | Count | Mean | Std. Dev. | of Mean |
| CONBKPREDEP | 7 | 0.155357 | 0.125893 | 0.047583 |
| ISBKPREDEP | 7 | 0.308346 | 0.279277 | 0.105557 |
| All | 14 | 0.231851 | 0.222743 | 0.059531 |
|  |  |  |  |  |

 Results of t-test, ANOVA, Welch-test, and Welch F-test fails to reject the null hypothesis that there was no difference in the nonbank deposit growth between the conventional and the Islamic banks during the PREGFC period.

The result mean difference test, not reported, confirms the same result.

Table 4
 Equality Test for Nonbank Deposit Growth Between Islamic Banks and Conventional Banks During the PREFC

Two-sample t test with equal variances

------------------------------------------------------------------------------

Variable | Obs Mean Std. Err. Std. Dev. [95% Conf. Interval]

---------+--------------------------------------------------------------------

GFCCONBKDEP | 6 .0860256 .0226575 .0554993 .0277827 .1442685

GFCISBKDEP | 6 .1672416 .0587357 .1438724 .0162567 .3182264

---------+--------------------------------------------------------------------

combined | 12 .1266336 .0324137 .1122843 .0552916 .1979756

---------+--------------------------------------------------------------------

 diff | -.081216 .0629543 -.2214868 .0590549

------------------------------------------------------------------------------

 diff = mean(CONBKPOSTDEPG) - mean(ISBKPOSTDEPG) t = -1.2901

Ho: diff = 0 degrees of freedom = 10

 Ha: diff < 0 Ha: diff != 0 Ha: diff > 0

 Pr(T < t) = 0.1030 Pr(|T| > |t|) = 0.2261 Pr(T > t) = 0.8870

 The mean difference test for the nonbank deposit growth between the conventional banks and the Islamic banks suggests that the mean growth of nonbank deposits of conventional banks was significantly less than that of the Islamic banks at the significant level of 10 percent. The result suggests that the global financial crisis had a more adverse impact on the deposit growth of the conventional banks than on that of the Islamic banks.

 There are many plausible reasons why the Islamic banks’ nonbank deposit growth was stable and shock resistant. First, the customers of the Islamic banks are devout Muslims. They are not concerned about the interest income. Since interest, currently called riba, is prohibited, the devout Muslims do not look for any alternative banking. So, the fluctuation of interest caused by the global financial crisis did not bother them and had no impact on the nonbank liabilities of the Islamic banks.

 Second, the Islamic banks’ unique mode of production—profits and loss sharing—in *Muderaba* deposit mobilizations minimizes asymmetric information and adverse selection. Unlike in conventional banking, Islamic banks have full access to project information and project management, which minimizes moral hazard and adverse selection.

**Conclusions**

 The paper examined the nonbank deposit growth of the Islamic banks and the conventional banks during the pre-global financial crisis (200-2007) and the global financial crisis period (2008-2013) of Bahrain to determine whether the global financial crisis had, first, any impact on the Islamic banks’ nonbank liabilities and, second, whether there was any difference of impact between the Islamic banks’ and the conventional banks’ nonbank deposit growth.

Results of the t-test, ANOVA, Welch-test, and Welch F-test failed to reject the null hypothesis that there was no difference in the nonbank deposit growth of the Islamic banks between the PREGFC and the GFC. The result suggests that the GFC had no impact on the nonbank deposit growth of Islamic banks.

The results of the t-test, ANOVA, and Welch t-test (Table 4) suggest that there was no significant difference in nonbank deposit growth between the conventional banks and the Islamic banks during the PRGFC. However, the result of mean difference test (Table 5) of the impact of GFC between the conventional banks and the Islamic banks showed that the mean difference is statistically significant. The result suggests that the GFC had a more significant adverse impact on the conventional banks’ nonbank deposit growth than on the Islamic banks.

 Islamic bank customers’ devotedness to Shariah principles, their disregard to interest, and the banks’ unique mode—profits and loss sharing—in nonbank deposit mobilizations provide plausible explanations why the Islamic banks’ nonbank deposits were stable and shock resistant.

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1. Umar b. al-Khattab said, “There are three things:. If God’s Messenger had explained them clearly, it would have been dearer to me than the world and what it contains: (These are) *kalalah*, *riba*, and *khilafah*.” (*Sunan Ibn Majah*, Book of Inheritance, Vol. 4, #2727). [↑](#footnote-ref-1)
2. See Samad, Gardner, and Cook (2005) and Chong and Liu (2009) for definition and features. [↑](#footnote-ref-2)
3. Growth rate of nonbank deposit is estimated= (Depositt –Depositt-1)/Depositt-1 [↑](#footnote-ref-3)