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Libyan Business Firm Attitudes towards Islamic Methods of Finance

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This paper investigates the attitudes of Libyan business firms towards Islamic methods of finance. A sample of 296 firms is surveyed using phone interviews during December 2007 and January 2008 to gather information on their awareness and perceptions of Islamic finance. The results indicate that most firms have knowledge about the existence of Islamic banking and finance, while more than two-thirds of respondents know the specific products of *Musharakah* (full-equity partnerships) and *Quard Hassan* (interest-free benevolent loans), often through personal informal lending. However, many respondents are uninformed regarding most other Islamic financing methods. Factor analysis is used to reduce the large number of explanatory variables used to determine business firm attitudes to just four determinants: namely, religion, profitability, business support, and unique services. Discriminant analysis shows that religion remains the primary motivation for the potential use of Islamic finance among business firms in Libya.

JEL classification: G21; L20; O16

Keywords: Islamic methods of finance; Islamic banking; business attitudes and perceptions.

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1. Introduction

Islamic finance – financial institutions, products and services designed to comply with the central tenets of *Sharia* (Islamic law) – is one of the most rapidly growing segments of the global finance industry. Starting with the Dubai Islamic Bank in 1975 (and operations in the United Arab Emirates, Egypt, the Cayman Islands, Sudan, Lebanon, the Bahamas, Bosnia, Bahrain and Pakistan), the number of Islamic financial institutions worldwide now exceeds 300, with operations in 75 countries and assets in excess of US\$400 billion (El-Qorchi, 2005).

Though initially concentrated in the Middle East (especially Bahrain) and South East Asia (particularly Malaysia), Islamic finance principles are now increasingly found elsewhere. This includes developing economies where the financial sector is almost entirely Islamic (Iran and Sudan) or where Islamic and ‘conventional’ financial systems coexist (Indonesia, Malaysia, Pakistan and the United Arab Emirates) (El-Qorchi, 2005). It also includes developed economies where a small number of Islamic financial institutions have been established and where large conventional providers have opened Islamic financing windows (as in Europe and the United States).

Importantly, while Islamic finance has been practiced for many centuries, it is only in the last thirty years that Islamic financial institutions (including banks) offering *Sharia*-compliant products and services have become more widespread and substantial. Indeed, even in Muslim countries it is only very recently that a full range of analogous Islamic finance products and services, particularly commercial products and services, have been offered in direct competition to conventional banks and other financial institutions. These products and services include, amongst others: *Mudarabah*, the provision of capital in partial equity partnerships; *Musharakah*, full equity partnerships, *Murabaha*, an instrument used for financing the purchase of goods; *Bai muajjal*, deferred payments on products; *Bai Salam*, advance sale contracts; *Istisna*, or manufacturing contracts; *Ijarah*, lease financing; and *Quard Hassan*, a system of benevolent loans.

Clearly, as Islamic products and services enter new markets an important consideration is the attitudes, perceptions and knowledge of market participants towards these new methods of finance (Gait and Worthington 2008). For business firms, these factors determine the extent to which they choose to patronize these alternative products and services. Key concerns then include the influence of religious persuasion and the relative costs and benefits of financing, including convenience and access. Moreover, for conventional financial institutions the presence of other financial institutions offering Islamic financial products and services may affect their competitive position and how they construct new marketing strategies. It may also influence their decision to introduce *Sharia*-compliant products and services themselves.

Libya provides an interesting context to examine these issues. First, while the majority of the population are Muslims, there are presently no Islamic financial institutions operating in Libya. Second, the Libyan government is increasingly moving towards the liberalisation and reform of the country’s financial system and part of this process foresees the contribution of Islamic financial institutions, products and services. Finally, there is no published work on the potential use of Islamic finance by Libyan commercial customers, and limited

international work generally. This purpose of this paper is then to provide the results of a survey of Libyan firms on their attitudes, perceptions and motivations towards Islamic methods of finance.

The paper is structured as follows. Section 2 provides a brief review of Islamic finance, including its sources, principles and products. Section 3 discusses the literature on the attitudes of firms towards Islamic finance. Section 4 presents the empirical methodology. Section 5 provides some descriptive statistics and Section 6 the empirical results. The final section concludes the paper.

2. Islamic finance

Islamic finance is defined as a financial service or product principally implemented to comply with the main tenets of *Sharia* (or Islamic law). In turn, the main sources of *Sharia* are the *Holy Quran*, *Hadith*, *Sunna*, *Ijma*, *Qiyas* and *Ijtihad*. The *Holy Quran* is the book of revelation given to the Prophet Muhammad; *Hadith* is the narrative relating the deeds and utterances of Muhammad; *Sunna* refers to the habitual practice and behaviour of Muhammad during his lifetime; *Ijma* is the consensus among religion scholars about specific issues not envisaged in either the *Holy Quran* or the *Sunna*; *Qiyas* is the use of deduction by analogy to provide an opinion on a case not referred to in the *Quran* or the *Sunna* in comparison with another case referred to in the *Quran* and the *Sunna*; and *Ijtihad* represents a jurists' independent reasoning relating to the applicability of certain *Sharia* rules on cases not included in either the *Quran* or the *Sunna*.

In brief, the principles of Islamic finance are as follows: (i) the prohibition of *Riba* (usually interpreted as interest) and the removal of debt-based financing; (ii) the prohibition of *Gharar*, encompassing the full disclosure of information, removal of asymmetric information in contracts and the avoidance of risk-taking; (iii) the exclusion of financing and dealing in activities and commodities regarded as sinful or socially irresponsible (such as gambling, alcohol and pork); (iv) an emphasis on risk-sharing, where the provider of financial funds and the entrepreneur share business risk in return for a pre-determined share of profits and losses; (v) the desirability of materiality, a financial transaction needs to have 'material finality', that is a direct or indirect link to a real economic transaction; and (vi) consideration of justice, a financial transaction should not lead to the exploitation of any party to the transaction [see El-Gamal (2000), Warde (2000), Lewis and Algaoud (2001), Iqbal and Llewellyn (2002), Abdul-Gafoor (2003), Obaidullah (2005), Iqbal and Molyneux (2005) and Gait and Worthington (2009) for suitable introductions to Islamic finance]

In practical terms, these prohibitions and recommendations manifest themselves as the following commercial products and services: (i) *Mudarabah*, the provision of capital to a partial-equity partnership in return for a share of profits, but where the losses on funds lent are borne by the lender; (ii) *Musharakah*, full-equity partnerships where the provider of funds and the entrepreneur directly and wholly share in the business, (iii) *Murabaha*, an instrument used for financing the purchase of goods and services where the financial institution purchases these on behalf of the customer; (iv) *Bai muajjal*, deferred payments on products encompassed under *Murabaha*; (v) *Bai Salam*, advance or pre-paid sale contracts of goods and services; (vi) *Istisna*, or manufacturing contracts to cover work in progress and paid by the financial institution on behalf of the

customer; (vii) *Ijarah*, lease financing in the form of operating leases only; (viii) *Takaful* or Islamic insurance in the form of cooperative self-help schemes, and (ix) *Quard Hassan*, benevolent loans offered interest free.

Islamic products and services also increasingly manifest themselves as mutual funds underpinned by investments in *Sharia*-compliant equity or property, *Sukuk* (Islamic bonds), *Takaful* (Islamic insurance) and *Ijarah* (Islamic leasing) constructed with Islamic principles in mind. For example, a *Sharia*-compliant equity mutual fund would, through a process of sector screening and dividend 'purification', normally exclude: banking, insurance or any other interest-related activity; alcohol, tobacco, gambling, armaments; any activity related to pork; other activities deemed offensive to Islam; and any sectors or companies significantly affected by any of the above.

3. Literature review

While the attitudes of retail consumers towards Islamic financial institutions and products have been extensively studied by researchers in Muslim and non-Muslim countries alike—including Erol and El-Bdour (1989), Erol, Kaynak and El-Bdour (1990), Omer (1992), Haron, Ahmad and Planisek (1994), Metwally (1996), Gerrard and Cunningham (1997), Al-Sultan (1999), Hamid and Nordin (2001), Zainuddin, Jahyd and Ramayah (2004), Okumkus (2005), and Dusuki and Abdullah (2007)—relatively little inquiry has been made into the attitudes of business firms. In fact, only three studies comprise the extant literature.

First, in a study of the Kuwaiti dual banking system where Islamic and conventional banks operate side-by-side Edris (1997) focused on the bank selection criteria used by business customers. Even though Kuwait is a predominately Muslim country, and Metwally (1996) and Al-Sultan (1999) showed the strong preference for Islamic methods of finance by Kuwaiti retail consumers, the majority of businesses were inclined to deal with conventional banks rather than Islamic banks. In addition, these business firms ranked the size of bank assets to be the primary factor in the bank selection process. On this basis, Edris (1997) suggested that business firms in Kuwait preferred to obtain financial services from banks that were large and reliable. In contrast, Islamic methods of finance were ranked fifth among the bank selection criteria. The study also found that most firms in Kuwait were multiple bank users because of their desire to employ the diverse services of several different banks, each with its own comparative advantage.

Second, Jalaluddin and Metwally (1999) surveyed 385 small businesses in Sydney about their opinions on the probability of applying profit/loss sharing as found in Islamic financing. Jalaluddin and Metwally (1999) concluded motivations other than religion may motivate small business firms to use Islamic-like financial services. These included the linking of financial and business risk, the lower cost of borrowing funds and a higher expected rate of return. Furthermore, the probability of applying profit/loss sharing by small firms positively depended on the level of business risk, the cost of borrowing and the rate of return. Many firms also saw the benefits of a more active post-financing role for management.

Finally, in Malaysia Ahamad and Haron (2002) surveyed 45 current corporate customers on their attitudes towards Islamic products and services. The major finding was that economic factors, such as profitability and

the quality of service, were more significant than any religious concerns. This could be because the majority of respondents were non-Muslims who believed that Islamic banks provided a desirable alternative to conventional finance, irrespective of any religious underpinnings. In fact, most respondents had a low level of knowledge about Islamic financial products, even though they were actively using them. They also suggest that Islamic financial institutions can provide products that are generally attractive to many (non-Muslim) business customers.

4. Sample methodology

A questionnaire was designed to collect data from a sample of Libyan business firms (available from the authors upon request in Arabic and English). To ensure speedy data collection, control of the sample, good flexibility, and reasonable cost, data was collected by filling the questionnaires through telephone interviews. Using $N = \pi(1 - \pi)Z^2 / E^2$, the optimal sample size (N) was selected using a 95 percent confidence level where Z is 1.96, the proportion (π) is 0.5 (the safest possible assumption), and the error or precision (E) is 0.05 (Waters 1994), such that $N = (0.5)(0.5)(1.96)^2 / (0.05)^2 = 384.16 \approx 385$. A focus group of 20 (pre-screened) respondents representing about 5% of the sample was first interviewed to ensure the effectiveness of the questionnaire before the full survey was undertaken.

The Chambers of Commerce and Industry in each of Libya's four largest cities (Tripoli, Benghazi, Misratah and Al Murgub) were contacted for the telephone numbers of all businesses. This yielded a population of 7,011 firms. Using a systematic sampling technique, the population (7,011) was divided by the optimal sample (385) to yield a sample interval of 18. A random number (6) between 1 and 18 was selected using a table of random numbers so that the sample consisted of elements 6, 24 (i.e. 6 + 18), 42 (i.e. 24 + 18), 60 (i.e. 42 + 18) and so on. Using the list of firms as a sampling frame, the firms were alphabetically ordered and phoned using the calculated elements. When the number attempted was not successful, the next number on the same page was dialled.

The respondents were requested in the first part of the questionnaire to indicate their knowledge about the existence of Islamic banks and their methods of finance. The second part of the questionnaire was used to discern the respondents' attitudes towards Islamic methods of finance. A seven-point scale from 1 to 7 was used where 1 is not important at all and 7 is very important for 18 statements that represent perceptions of Islamic methods of finance. The questionnaire also collected information on the characteristics of the firms, including firm size, organisational structure, ownership, and industry. Unfortunately, despite best efforts only 296 complete questionnaires were obtained. In nearly all cases, the incomplete questionnaires arose from missing information on the firm's economic profile, including total assets, liabilities and share capital (if applicable) because the firm's respondent either refused or was unable to respond. The incomplete questionnaires were removed from the sample. Descriptive analysis is used to examine the degree of awareness of Libyan business firms about Islamic methods of finance; factor analysis is used to identify the

main factors that motivate them to apply Islamic methods of finance and discriminant analysis is used to determine which of these factors account for the most impact on attitudes towards Islamic methods of finance.

5. Descriptive statistics

Table 1 provides descriptive statistics of the sample. Columns 1 and 2 contain the response frequency and percentage of responses for all firms, columns 3 and 4 the frequencies and percentage of responses for firms that are potential users of Islamic methods of finance, and columns 5 and 6 the frequencies and percentage of responses for firms that not potential users of Islamic methods of finance. Columns 7 and 8 contain the statistics and p-values of tests for the equality of variances for potential users and non-users of Islamic methods of finance while columns 9 and 10 contain the test statistics and p-values of tests for equality of means for potential users and non-users.

In the sample, 214 firms (72.3%) indicated that they would be potential users of Islamic finance while 82 firms (27.7%) responded that they would not. Nevertheless, in terms of industry only in services is there a statistically significant difference in the proportion of potential users and non-users of Islamic finance, with a slightly higher likelihood of potential use (29.9%) than their share of industry grouping (26.3%). However, for business experience potential users are more likely to have less than 5 years experience, while businesses with more than 5 years experience are more likely to be non-users. For example, 3% of the sample has business experience less than 1 year, 29% 2–3 years and 41.3% 4–5 years while the proportion of prospective users are 4.2%, 39.3% and 48.1%, respectively. Similarly, while 26.7% of the overall sample has more than 5 years experience, only 8.4% of potential users have more than 5 years experience against 74.4% of potential non-users.

Table 1. Sample characteristics

		All firms (n = 296)		Potential user (n = 214)		Not a potential user (n = 82)		Equality of variances		Equality of means	
		Freq.	%	Freq.	%	Freq.	%	F-test	p-value	t-test	p-value
Industry	Trading	12	4.1	9	4.2	3	3.7	0.18	0.67	-0.21	0.83
	Manufacturing	50	16.9	33	15.5	17	20.7	4.46	0.04	1.03	0.30
	Importing and exporting	60	20.3	41	19.1	19	23.2	2.22	0.14	0.77	0.44
	Construction	66	22.3	49	22.9	17	20.7	0.66	0.42	-0.40	0.69
	Transport and storage	20	6.7	12	5.6	8	9.7	6.32	0.01	1.14	0.26
	Services	78	26.3	64	29.9	14	17.1	26.29	<0.01	-2.46	0.02
	Other	10	3.4	6	2.8	4	4.9	3.08	0.08	0.78	0.43
Business experience	Less than 1 year	9	3.0	9	4.2	–	–	15.65	<0.01	-3.06	<0.01
	2 to 3 years	86	29.0	84	39.3	2	2.4	779.08	<0.01	-9.79	<0.01
	4 to 5 years	122	41.3	103	48.1	19	23.2	83.63	<0.01	-4.30	<0.01
	More than 5 years	79	26.7	18	8.4	61	74.4	59.36	<0.01	12.67	<0.01
Total assets	Less than LYD50,000	2	0.8	2	0.9	–	–	3.13	0.08	-1.42	0.16
	LYD50,000 to 100,000	45	15.2	44	20.6	1	1.2	122.20	<0.01	-6.39	<0.01
	LYD101,000 to 300,000	95	32.1	93	43.5	2	2.4	1288.08	<0.01	-10.78	<0.01
	LYD301,000 to 500,000	83	28.0	64	29.9	19	23.2	3.30	0.07	-0.89	0.38
	More than LYD500,000	71	23.9	11	5.1	60	73.0	127.52	<0.01	12.67	<0.01
Total liabilities	Less than LYD50,000	96	32.4	88	41.1	8	9.7	262.26	<0.01	-6.65	<0.01
	LYD50,000 to 100,000	160	54.0	112	52.4	48	58.6	4.55	0.03	0.96	0.34
	LYD101,000 to 200,000	36	12.2	14	6.5	22	26.8	95.48	<0.01	3.90	<0.01
	LYD201,000 to 300,000	4	1.4	–	–	4	4.9	48.44	<0.01	2.04	0.04
	More than LYD300,000	–	–	–	–	–	–	–	–	–	–
Share capital	Less than LYD50,000	81	27.4	80	37.4	1	1.2	832.25	<0.01	-10.24	<0.01
	LYD50,000 to 100,000	116	39.2	105	49.1	11	13.5	243.73	<0.01	-6.98	<0.01
	LYD101,000 to 200,000	46	15.5	24	11.2	22	26.8	40.08	<0.01	2.90	<0.01
	LYD201,000 to 300,000	17	5.7	5	2.3	12	14.6	76.01	<0.01	3.03	<0.01
	More than LYD300,000	36	12.2	–	–	36	43.9	14079.5	<0.01	7.96	<0.01
Number of employees	Less than 5 employees	84	28.6	69	32.3	15	18.3	30.67	<0.01	-2.60	0.01
	5 to 10 employees	123	41.5	88	41.1	35	42.7	0.00	0.97	-0.02	0.98
	11 to 20 employees	76	25.6	52	24.3	24	29.3	2.79	0.10	0.85	0.40
	More than 20 employees	13	4.3	5	2.3	8	9.7	51.56	<0.01	2.53	0.01
Business organisation	Family business	10	3.4	8	3.7	2	2.4	1.24	0.27	-0.55	0.58
	Joint venture	155	52.4	87	40.7	68	83.0	91.20	<0.01	7.43	<0.01
	Partnership	131	44.2	119	55.6	12	14.6	159.92	<0.01	-7.41	<0.01
Number of owners	Less than 10 owners	90	30.4	82	38.3	8	9.7	206.17	<0.01	-6.09	<0.01
	10 to 20 owners	110	37.2	91	42.5	19	23.2	57.20	<0.01	-3.35	<0.01
	21 to 30 owners	21	7.1	16	7.5	5	6.1	0.69	0.41	-0.41	0.68
	More than 30 owners	75	25.3	25	11.7	50	61.0	91.06	<0.01	8.43	<0.01

Notes: Tests of equality of variances and means are for the proportion of potential users and non-users of Islamic finance by variable. Levene's test of equality of variances determines whether the test for equality of means assumes equal or unequal variances. Significant test statistics and their p-values in bold.

In terms of total assets, liabilities and capital, potential users are clearly smaller than potential non-users. For instance, 20.6% of potential user firms have LYD50,000 to 300,000 in assets compared to just 1.2% of potential non-user firms (LYD/AUD0.94967). Likewise, 4.5% of potential users but only 2.4% of non-users have assets of LYD101,000 to 300,000, and only 5.1% of users have more than LYD500,000 in assets compared to 73.0% of non-users. A similar picture emerges with business size measured by the number of employees: 32.3% of potential users have five or fewer employees compared to 18.3% for firms that are not potential users. There are no significant differences in the proportion of users and non-users between 5 and 20 employees, but firms with more than 20 employees are nearly five times more likely to be non-users. The structure of the business organisation also varies, with potential non-users more likely to be joint ventures (83.0%) and less likely to be partnerships (14.6%) while firms that are potential users are typically partnerships (55.6%) and less likely to be joint ventures (40.7%). The numbers of owners in the business reflect this pattern: 80.8% of potential users but only 32.9% of non-users have fewer than 20 owners while 61.0% of potential non-users have more than 30 owners against only 11.7% of users.

6. Empirical results

Table 2 provides the frequencies and percentages of the sample for the awareness and past use responses of Libyan business firms concerning Islamic methods of finance. Similar to findings by Ahamad and Haron (2002) in their study of 45 Malaysian corporate bank customers, the results indicate that the majority of Libyan business firms are aware of Islamic banking and some Islamic methods of finance, but are generally unaware of many specific Islamic financing methods. For example, 88.5% of respondents have knowledge of Islamic banking, and *Musharakah* and *Quard Hassan* are known by 71.3% of respondents. Interestingly, *Musharakah* has been practiced by 72.3% of all respondents. However, most respondents are relatively uninformed of the other principal Islamic financing methods, including *Mudarabah*, *Morabahah*, *Bai muajjall* and *Istisna*.

Table 2. Awareness and practice of Islamic methods of finance

Variable	Knowledge and practice	All firms		Potential user		Not a potential user	
		Freq.	%	Freq.	%	Freq.	%
Knowledge of Islamic banking	Yes	262	88.5	206	78.6	56	21.4
	No	34	11.5	8	23.5	26	76.5
Knowledge of <i>Musharakah</i> and <i>Quard Hassan</i>	Yes	211	71.3	164	77.7	47	22.3
	No	25	8.4	23	92.0	2	8.0
Past practice of <i>Musharakah</i>	Yes	214	72.3	169	78.9	45	21.1
	No	33	11.1	8	24.2	25	75.6

Table 2 also clearly suggests that the majority of respondents who are aware of Islamic methods of finance are potential users. More particularly, 78.6% of the 262 respondents knowledgeable about the existence of Islamic banks are potential users, 77.7% of the 211 respondents aware of *Musharakah* and *Quard Hassan* are potential users, and 78.9% of the 214 respondents who have practiced *Musharakah* are potential users (excludes respondents that are unaware of *Musharakah*).

Respondents were also asked to indicate the degree of importance placed on for 18 statements that represent perceptions of the use of Islamic methods of finance on a seven-point Likert scale. Table 3 details the means and standard deviations of the variable scores. As shown, the primary motivation for Islamic methods of finance is that an Islamic bank may encourage business expansion (3.854) and that it would share business risk with the firm (3.817). In contrast, interest-free banking (3.199) and the provision of lease financing (*Ijarah*) (3.317) provide less motivation.

Table 3. Perceptions of Islamic methods of finance and rotated component matrix

Variable	Components					
	Mean	Std. dev.	1	2	3	4
Islamic bank's methods of finance are interest-free	3.199	1.676	.920	.276	.054	.083
Islamic bank provides products in accordance with <i>Sharia</i>	3.550	1.726	.895	.285	.078	.119
Deposits with Islamic bank would realise a higher variable rate of return	3.679	1.592	.335	.902	-.135	.090
Religious motivation for depositing with Islamic bank	3.628	1.921	.821	.321	-.080	.310
Cost of borrowing from Islamic bank depends on business outcomes	3.638	1.502	.428	.815	-.036	.165
Religious motivation for borrowing from Islamic bank	3.746	1.729	.822	.379	.212	.042
Islamic bank may invest according to profit sharing (<i>Musharakah</i>)	3.435	1.714	.264	.812	.009	.194
Islamic bank considers repayment of debt according to business conditions	3.641	1.800	.484	.576	.265	.290
Islamic bank lends money according to profit sharing (<i>Musharakah</i>)	3.753	1.656	.084	-.006	.277	.861
Islamic bank shares the risk of business	3.817	1.929	.463	.764	.249	.080
Profit/loss sharing method allows you to invest or borrow on a fair basis	3.422	1.092	-.065	.096	.520	.778
Islamic bank may support you in your business management	3.614	1.498	.122	-.034	.948	.216
Islamic bank would encourage business innovation	3.422	1.257	.081	.024	.937	.115
Islamic bank may encourage business expansion	3.854	1.130	-.059	.501	.624	.132
Islamic bank would help improve business efficiency	3.750	1.517	.108	-.046	.945	.214
Islamic bank provides lease financing (<i>Ijarah</i>)	3.317	1.270	.255	.282	-.021	.831
Islamic bank provides trade financing such as (<i>Morabahah</i>)	3.466	1.416	.329	.239	-.018	.851
Islamic bank provides industrial financing (<i>Istisna</i>)	3.516	1.325	.007	.119	.490	.812

Factor analysis is performed on the explanatory variables with the goal of data reduction. The data in the correlation matrix (not shown) indicates high correlations among the explanatory variables significant at the 0.01 level. This justifies the appropriateness of factor analysis to reduce these highly correlated variables to a smaller more manageable number of factors. However, investigation indicates that the coefficients on the diagonals of the anti-image correlation matrix are greater than 0.5 for each variable. Therefore, there is no need to eliminate any of the variables. Bartlett's test of sphericity is used to test the null hypothesis that the explanatory variables are uncorrelated in the population. The test statistic (7583.466) and p-value (<0.01) reject the null. The Kaiser-Meyer-Olkin measure of sampling adequacy is also calculated. A value of 0.839 is obtained, meaning that all of the partial correlation coefficients are small compared to the ordinary correlation coefficients. This also indicates that it's reasonable to proceed with factor analysis. The 18 explanatory variables can be reduced to just four factors with eigenvalues greater than 1. These factors account for about 86.62% of the total variance.

Table 3 includes the factors and their coefficients from the rotated factor matrix obtained by the varimax procedure. Factor 1 has large coefficients (> 0.5) on four variables in bold in column 1. These are (i) Islamic bank's methods of finance are interest-free, (ii) Islamic bank provides Islamic methods of finance in accordance with *Sharia*, (iii) religious motivation for depositing with Islamic bank, and (iv) religious motivation for borrowing from Islamic bank. We refer to this factor as "Religion" as these perceptions link most closely with compliance with Islamic religious principles.

Factor 2 has large coefficients on five variables in bold in column 2. These are (i) deposits with Islamic banks realise a higher variable rate of return, (ii) Islamic bank's cost of borrowing depends on the outcomes of the business, (iii) Islamic bank may invest according to profit-sharing (*Mudarabah*), (iv) Islamic bank would consider repayment of debt according to business conditions, and (v) Islamic bank shares the risk of business. As these perceptions generally suggest the intention of firms to increase profits and reduce losses they are referred to as "Profitability". Factor 3 has large coefficients on four variables in bold in column 3. These are; (i) Islamic bank may support your business management, (ii) Islamic bank would encourage business innovation, (iii) Islamic bank may encourage business expansion, and (iv) Islamic bank would help improve business efficiency. As these motivations relate to business operations they are labelled "Business Support". Finally, factor 4 has large coefficients on five variables in bold in column 4. These motivations are, (i) Islamic bank lends money according to profit/loss sharing method (*Musharakah*), (ii) Profit/loss sharing method allows you to invest or borrow on a fair basis, (iii) Islamic bank provides lease financing (*Ijarah*), (iv) Islamic bank provides trade financing methods such as (*Morabahah*), and (v) Islamic bank provides industrial financing (*Istisna*). As these variables indicate new methods of finance not offered by the conventional banking system they are referred to as "Unique Services".

These factor scores (Religion, Profitability, Business Support, and Unique Services) are suitable for use in subsequent multivariate analysis. Firms are divided into two groups: namely, firms that are potential users of Islamic methods of finance and firms that are not potential users of Islamic methods of finance. The mean and standard deviation of the factor scores for these firm groups and all firms (not shown) suggest that the two groups are most widely separated in terms of the value of factor scores 1 (Religion) and 2 (Profitability) while the differences are smallest for factor scores 3 (Business Support) and 4 (Unique services).

Wilks' Lambda (p-value in brackets) is the proportion of variance not explained by differences between the groups: Religion 0.596 (<0.01), Profitability 0.693 (<0.01), Business Support 0.924 (<0.01), and Unique Services 0.965 (<0.01). Because all of these values are less than 1, most of the observed variability in the factor scores can be attributed to the differences between the groups. The polled within-group correlation matrix also indicates relatively low (negative) correlations between the factor scores (Religion and Profitability, -0.548; Religion and Business Support, -0.237; Religion and Unique Services, -0.156; Profitability and Business Support, -0.191; Profitability and Unique Services, -0.126; and Business Support and Unique Services, -0.055).

Box's *M* (F-statistic = 42.590, p-value = <0.01) rejects the null hypothesis that the covariance matrices are equal. The eigenvalue (4.643) is large and accounts for 100% of the explained variance. The canonical correlation is another measure of the degree of association between the discriminant scores and the groups. The canonical correlation of the discriminant function is about 0.91. The square of this coefficient shows that 82.8% of the variance of the dependent variable (potential use of

Islamic methods of finance) is explained or accounted for by this model. Wilks' lambda associated with the discriminant function is 0.178. This is the ratio of the within-groups sum of squares to the total sum of squares. This can be transformed to a chi-square value of 504.801, which is statistically significant at the 0.01 level with degrees of freedom equal to the number of factor scores. Therefore, it is acceptable to reject the null hypothesis that respondents who are potential users have the same average discriminant function score in the population.

Table 4. Classification results

Classification		Predicted group membership		Total
	Groups	Potential users	Not potential users	Potential users
Number	Potential users	79	3	82
	Not potential users	3	211	214
Percentage of group	Potential users	96.3	3.7	100.0
	Not potential users	1.4	98.6	100.0

The absolute magnitude of the standardized canonical discriminant function coefficients clearly indicate that Religion (1.284), Profitability (1.207) and Business Support (0.695) are the most important in discriminating between the two groups of Libyan business firms: that is, potential and non potential users of Islamic finance. More particularly, religion is the primary motivation for the potential use of Islamic methods of finance among Libyan business firms. Accordingly, religious factors have a significant influence on Libyan business firms' attitudes towards the potential use of Islamic methods of finance. However, religion is not the only factor determining the potential user of Islamic methods of finance, and that rather more temporal concerns for profitability, business support and unique services also have a role to play. This contrasts with Jalaluddin and Metwally (1999) and Ahamad and Haron (2002) where religion was not the primary motivation for Islamic finance. The classification results in Table 4 show that attitudes held by business firms toward Islamic methods of finance are crucial in predicting potential usage, with 96.3 percent of potential users and 98.6% of not potential users being correctly classified.

7. Concluding remarks

This study establishes that while commercial Islamic finance is not yet formally practiced in Libya, most businesses have some knowledge about Islamic methods of finance. We can partly attribute this awareness to both knowledge of developments in other Muslim countries and to the fact that many commercial products and services offered by Islamic financial institutions bear close relation to informal financing and business arrangements already practiced among Muslims. These include *Musharakah* (full equity business partnerships) and *Quard Hassan* (interest-free loans), with the latter practiced personally by about one-fifth of all business respondents. However, many other Islamic

financing methods that are difficult to practice on an individual basis, such as *Mudarabah*, *Morabahah*, *Bai muajjal* and *Istisna*, are relatively unknown. The study also suggests that most business firms in Libya are potential users of Islamic methods of finance. However, those firms most disposed towards the use of Islamic methods of finance generally have less business experience, are smaller in terms of assets and the number of employees, have lower levels of outstanding debt, and fewer owners. In fact, only 5.1% of potential user firms have assets in excess of LYD500,000 compared to 73.0% of firms that are not potential users, and no potential user has liabilities exceeding LYD200,000. This would immediately suggest that Islamic finance can potentially play a major role in business financing, but primarily for small and medium-sized enterprises. There appears to be no predisposition towards the use of Islamic finance for any industry, with the exception of services.

We narrow the motivations for potential business users of Islamic finance to just four factors: religion, profitability, business support and unique services. Somewhat unexpectedly, religion is the principal motivation, followed by profitability, business support and unique services. With the planned introduction of Islamic financial institutions in Libya, there is clearly little they can do about the religious persuasion of potential customers (though they can ensure that potential and current business customers are fully informed about the compliance of their products and services with *Sharia*) but can focus on the benefits of Islamic finance for profitability, business support and the provision of unique services. The risk-sharing services offered by Islamic financial institutions appear to be a particularly attractive feature, especially for smaller firms.

From a business perspective, a number of directions for further research are indicated. First, little is still known about the opportunity cost of Islamic methods of finance. For example, while profit-sharing agreements avoid prohibitions on interest, what is the implied cost to firms choosing this source of finance relative to a conventional business loan or securitised asset? Data would need to be gathered from a range of Islamic financial institutions on their commercial arrangements to provide sound generalisations. Second, what interaction, if any, is there between Islamic financing by the firm and its own investment decisions? Once again, this would require examination of the agreements set in place between Islamic financial institutions and their customers to consider the business asset impact of any implied or explicit covenants or guarantees.

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