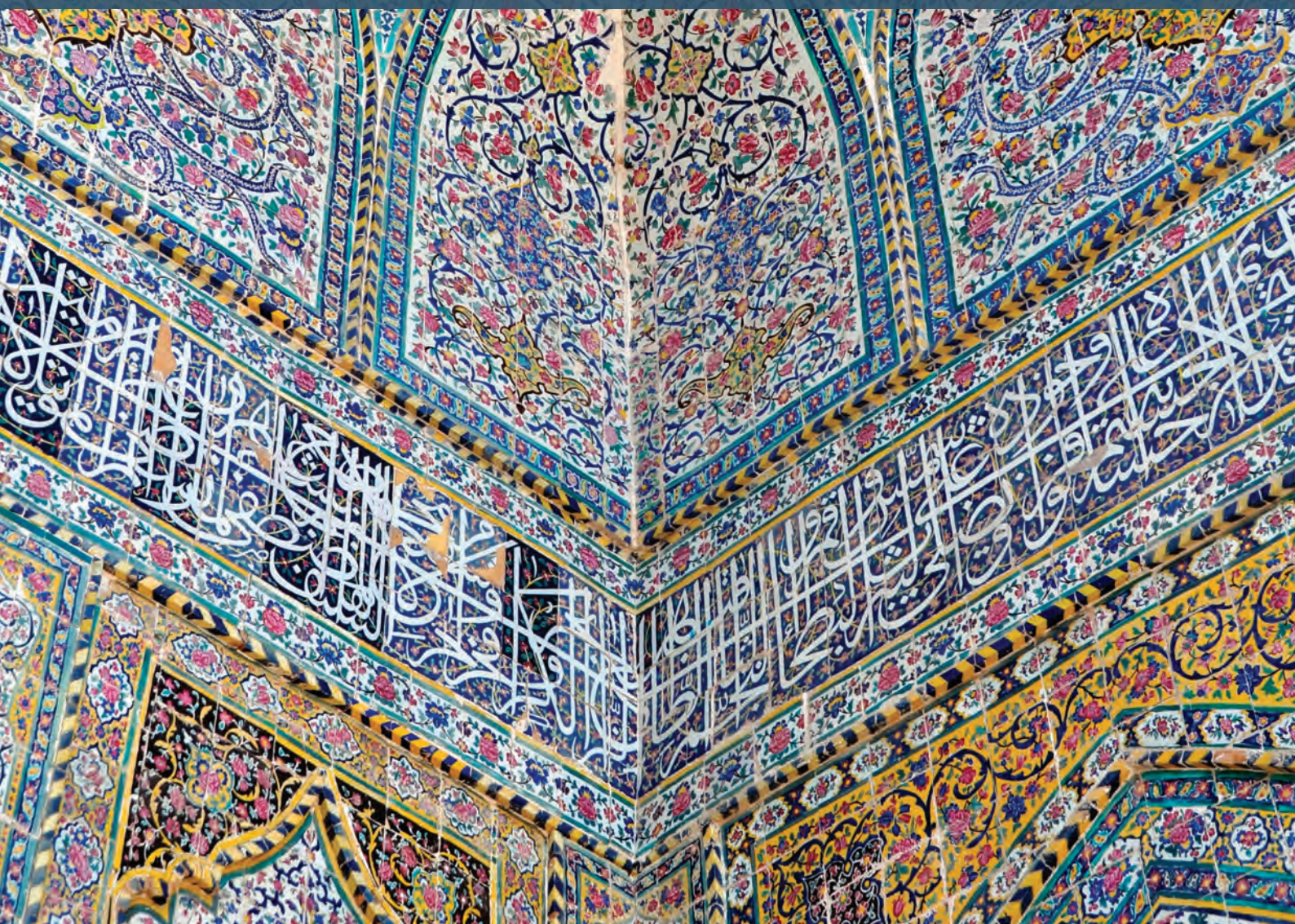


FTSE RESEARCH WHITE PAPER

FTSE Shariah Research

Targeting Lower Volatility Through
Ethical and Quantitative Screening
Minimum Volatility Shariah Index



BEIJING BOSTON DUBAI HONGKONG LONDON MILAN MUMBAI NEW YORK PARIS RIO DE JANEIRO SAN FRANCISCO SHANGHAI SYDNEY TOKYO TORONTO

About FTSE Group

FTSE is a global leader in indexing and analytical solutions. FTSE calculates thousands of unique indices that measure and benchmark markets and asset classes in more than 80 countries around the world. FTSE indices are used extensively by market participants worldwide for investment analysis, performance measurement, asset allocation and portfolio hedging. Many leading pension funds, asset managers, ETF providers and investment banks work with FTSE to benchmark their investment performance and use FTSE's indices to create world-class ETFs, index tracking funds, structured products and index derivatives. FTSE also provides many exchanges around the world with their domestic indices.

A core set of universal principles guides FTSE's index design and management: FTSE's transparent rules-based methodology is overseen by independent committees of leading market participants, focused on applying the highest industry standards in index design and governance. The foundation of FTSE's global, regional, country and sector indices is the FTSE Global Equity Index Series, which includes the flagship FTSE All-World Index.

FTSE is well known for index innovation and customer partnerships as it seeks to continually enhance the breadth, depth and reach of its offering.

FTSE is wholly owned by London Stock Exchange Group.

Introduction

Shariah equity indices combine both business screening, excluding companies involved in ineligible activities, as well as a financial screening. FTSE Shariah Global Equity indices have been created by partnering with Yasaar Ltd, an impartial consultancy and leading authority on Shariah, and have been certified as Shariah compliant through the issue of a Fatwa (Islamic legal opinion) by Yassar’s principals.

FTSE’s Shariah Minimum Variance indices aim to lower volatility after the application of ethical and financial screening as well as a quantitative construction process. FTSE’s Minimum Variance index methodology, when applied to the FTSE Shariah Developed World index, creates a more balanced risk profile by overweighting stocks that reduce index volatility and underweighting stocks that increase risk.

FTSE’s Shariah Minimum Variance indices are an extension of FTSE Shariah indices incorporating an alternative weighting methodology that aims to capture equity returns with lower volatility. Historic results show that the index has delivered substantial reductions in volatility compared to the parent FTSE Shariah Index.

FTSE’s Shariah compliant family of equity indices combine FTSE’s high standards of benchmark index design and governance with a screening and selection process based on Islamic principles. The resultant indices allow market participants to track the evolution of equity markets in a style that is consistent with their underlying ethical principles. Users of the indices are secure in the knowledge that they are based on a transparent and rigorous structure and methodology.

Developing Shariah Indices

The development and evolution of FTSE's well-defined indices that are acceptable to a broad constituency of Islamic end users enables the indices to be used in the development of suitably aligned investment products. One of the main historic issues with Shariah compliant products has been their relatively high cost structure. Typically this has been associated with the time, resources and analysis required to derive the appropriate screening at a global level. However, the availability of widely accepted and transparent indices, may encourage the introduction of lower cost investment products with well defined exposures.

Historically, in line with their underlying parent indices, FTSE's Shariah indices have followed a traditional market capitalisation weighting methodology. In recent years, a number of quantitative alternative weighting methodologies have evolved, some of which focus on risk mitigation. FTSE's Minimum Variance methodology is designed to reduce volatility based on a constrained optimisation to minimise the expected index volatility.

The combination of FTSE's Shariah indices and its Minimum Variance methodology aims to deliver a two-fold approach to risk and ethical-based screening techniques. The Shariah methodology incorporates a financial screening that is designed to remove excessively geared companies. Minimum Variance uses only historic volatility and correlations to allow market participants to construct broad, diversified and investable portfolios. Market participants can benefit from the combination of these techniques to deliver a suitable index.

Shariah

Shariah is Islamic canon Law; it is derived from three primary sources: the Qur'an; the Hadith (sayings of the Prophet Muhammad (PBUH)); and the Sunnah (practice and traditions of the Prophet Muhammad (PBUH)), together with three secondary sources Qiyas (analogical deductions and reasoning), Ijma (consensus of Islamic scholars) and Ijtihad (legal reasoning). In Islam there are activities which are permissible which are called Halal and activities which are explicitly prohibited by the Qur'an or the Sunnah called Haram (unlawful).

The Shariah screening process

The key feature of FTSE's Shariah indices is the screening process whereby companies are analysed with respect to their involvement in non-compliant activities. FTSE and Yasaar Research Inc.'s screening process is managed in accordance with written guidelines relating to the Shariah. These guidelines have been set by Yasaar's Shariah Board who also monitor compliance. The Shariah guidelines can be grouped into two separate components – business activity and financial ratios.

Business Activity Screening

The main areas of business activity screening include conventional finance, alcohol, pork-related products, tobacco, weapons and entertainment. Whilst initial index design tended to adopt an absolute form of exclusion from any of these prohibited activities, recent methodology has tended to employ a 5% of total revenue based cutoff using these categories. FTSE / Yasaar's screening methodology is based on total sector exclusion, but inclusion of stocks in other sectors where, in aggregate, the proportion of non-compliant revenue is not more than 5% of the total.

Dividend purification

In order to mitigate the impact from the inclusion of income from either interest income or prohibited activities there is a process of dividend purification. This is designed to allow investors to deduct from their dividend income the appropriate amount that should then be given to charity. The percentage of the total index distributed dividend that is derived from Islamically-inappropriate sources is calculated by Yasaar and made available to end users of the indices. Dividend cleansing adjustments are not made within the Total Return Index.

Financial screening

The other main element of index methodology relates to the screening of stocks based on financial criteria. The aim of this screening is to address the issue of companies having excessive leverage or where a significant portion of income is from interest receipts. There are a number of different ratios calculated for the purpose of financial screening. However, one of the main differences amongst index providers is the use of market capitalisation as opposed to the total assets of a company. Ultimately using market capitalisation can lead to a more volatile

screening process, even when a twelve month average is used, whilst total assets bears a greater relationship to the underlying balance sheet criteria being analysed. FTSE uses total assets when considering the financial screenings for companies and applies a 33% cap on the threshold for factors such as total debt relative to total assets, cash and interest bearing securities over total assets. The threshold for the sum of a company's accounts receivable and cash over total assets is set at being less than 50%. Total interest and non compliant activities income should not exceed 5% of total revenue.

Yasaar Research Inc.'s Screening Principles

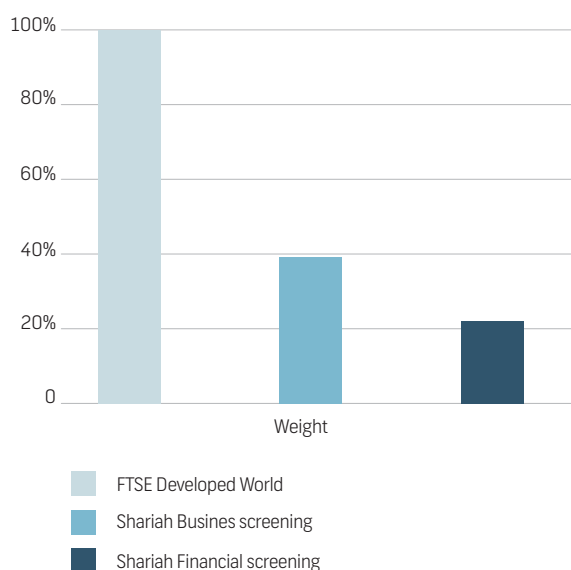
Conservative

A company must demonstrate Shariah compliance before it becomes part of the eligible universe, and if the data to establish Shariah compliance is unavailable, no assumptions regarding the Shariah status of a company will be made. In essence, all companies are non-compliant until proven otherwise.

Consistent

By using a strict rules-based approach, the screening process is made objective and consistent across all regions. The use of a comprehensive global database ensures a consistent level of information is available on which to base screening.

Impact of Shariah Screening



Source: FTSE Group. Data as of September 2013

Auditable

The screening process is overseen and monitored by Yasaar's Shariah Board. The Shariah Board monitors, reviews and audits the screening process at regular intervals. Shariah compliant constituents are updated daily and audit trails or any changes to a company's Shariah status are available to the Board for review.

AAOIFI Accreditation

As a member of the Accounting and Auditing Organization for Islamic Financial Institutions, FTSE is committed to contributing to the development of Islamic Banking and Financial Services worldwide.

Islamic index exposure

As a result of these various screening processes the underlying Shariah compliant benchmark varies substantially from the base index. If one considers a broad developed market equity exposure, as represented by the FTSE Developed World index, then the differences due to the screening process are easily highlighted when comparing to the FTSE Developed World Shariah index.

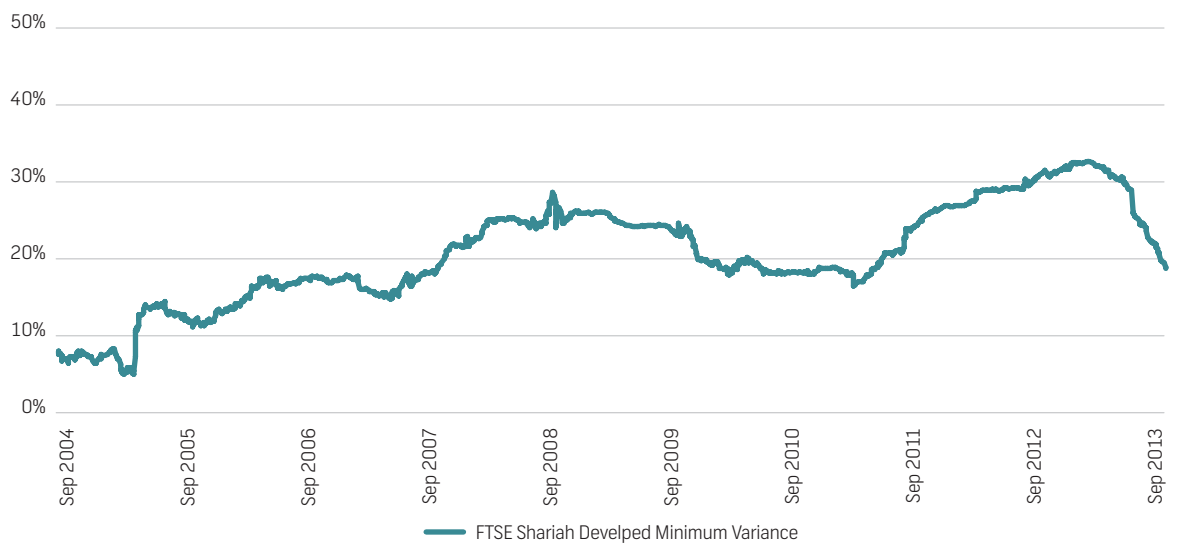
The initial screening relating to business activities excludes close to 40% of constituents by weight from the original FTSE Developed World index. Whilst the exclusion of Banks (26.7% weight of all excluded companies by weight), Insurance (11.6%) and Financial Services (8.5%) is to be expected, there are some other sector exclusions that are interesting to note. For example, close to 57% of automobile stocks, by weight, are also excluded, similarly just over 50% of beverage companies and 41% of food producers. Over 57% of food and drug retailers and close to 45% of general retailers are also removed due to business activities. Elsewhere in media, 79% of companies are excluded, as are over 81% of travel and leisure companies.

The financial screening impacts close to 23% of constituents and some sector impacts are substantial. Close to 62% of electricity companies and over 51% of gas, water and multi-utility companies are excluded. Perhaps unsurprisingly around 77% of REITs are also excluded on this basis. Additionally due to the focus on assets in the screening process, those industries that tend to have a low asset base are also subject to significant exclusions with close to 60% of software and computing services companies ineligible for the index.

FTSE Minimum Variance Shariah Index

The minimum variance indices target a more efficient outcome with respect to risk-adjusted returns through reductions in volatility. The methodology requires only historic volatility and correlations. Volatility reduction is achieved by applying a transparent rules-based approach to minimize historical variance subject to constraints on the weight of individual stocks within an index, and, at aggregate level on the weight of countries and industries represented in the index. Constraints are a necessary part of the process as they guard against excessive concentration, whilst also maintaining diversification which helps create a more stable covariance matrix. Constituents of the FTSE Shariah Developed Minimum Variance Index are selected from the corresponding underlying universe of the FTSE Shariah Global Equity Index Series at the time of the bi-annual review and aspects such as index reviews and company classification are governed by the FTSE Shariah Global Equity Index Series Ground Rules.

Reduction in volatility compared to the FTSE Shariah Developed Index



Source: FTSE Group. Data as of September 2013

Advantages of a minimum variance approach

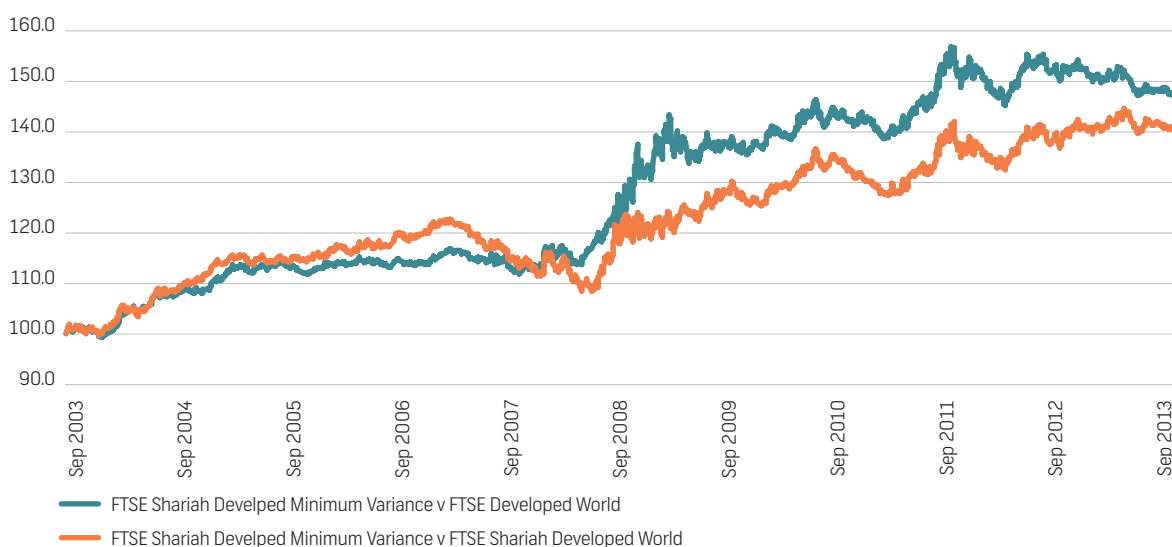
Minimum variance or volatility indices offer a potential improvement in respect to risk-adjusted returns. The methodology requires only historic volatility and correlations – expected returns play no role.

This is an appealing characteristic as expected returns are notoriously difficult to forecast and index outcomes are

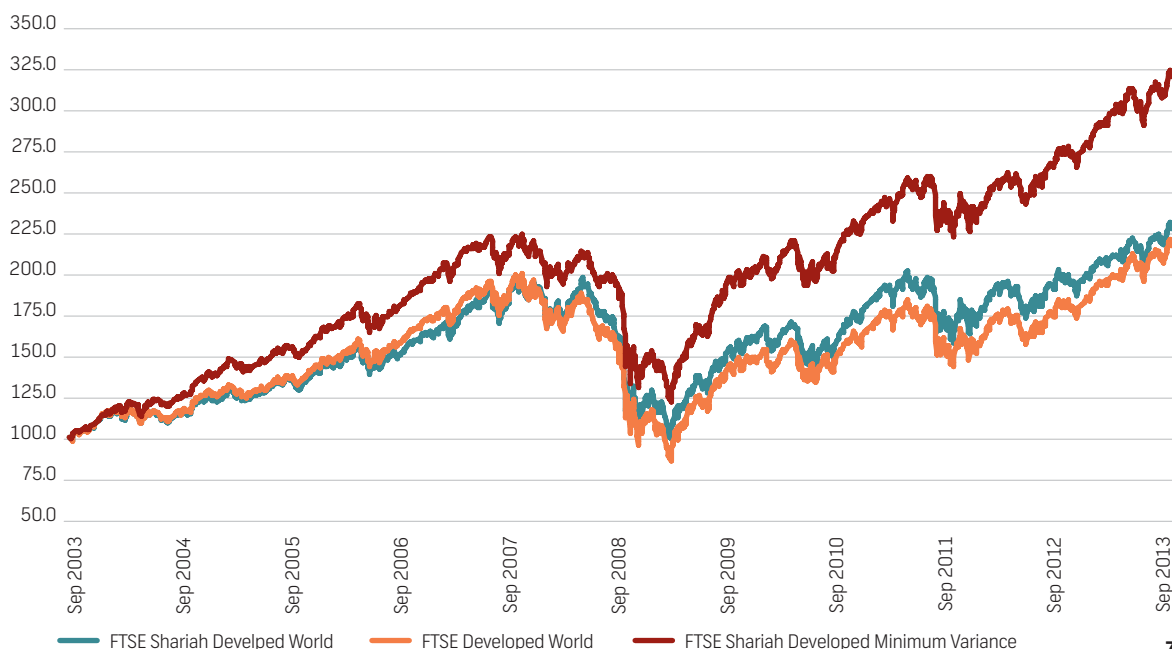
sensitive to errors in forecasts of expected returns. Conversely outcomes are relatively insensitive to errors in estimates of the covariance matrix.

Overall the benefits of this methodology have also been highlighted through a significant body of academic evidence that supports the existence of a low volatility effect.

FTSE Shariah Developed Minimum Variance Relative Performance Comparisons



FTSE Shariah Minimum Variance and Developed World Performance



The impact of the Minimum Variance approach on the FTSE Shariah Developed index

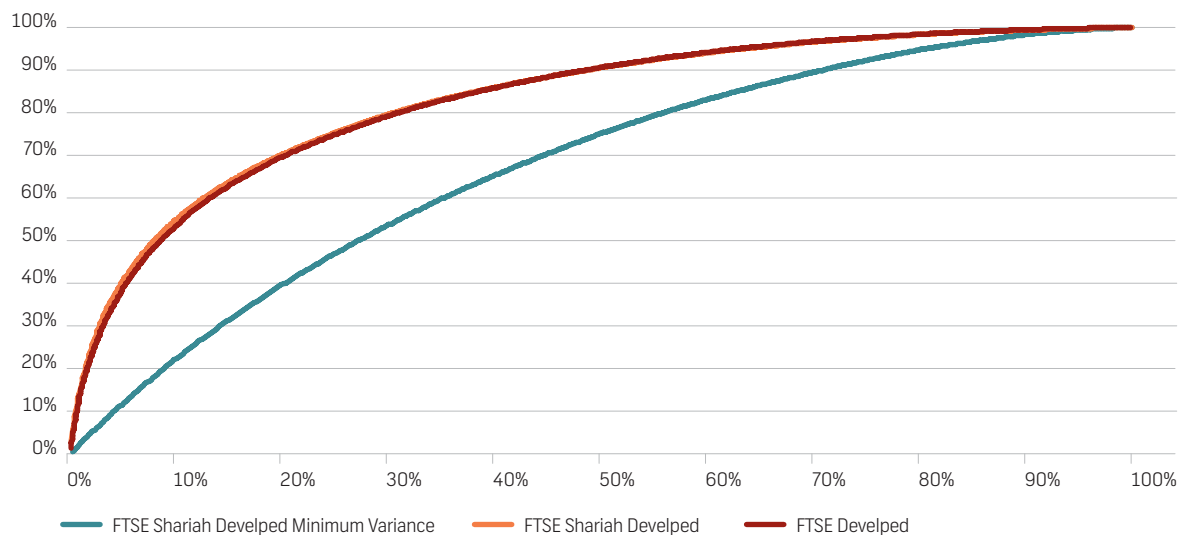
The initial point to note is that the screening process from the FTSE Developed World index to the FTSE Shariah Developed World index has a significant impact on industry structure based on both the business and financial screening. The number of constituents is reduced from around 2,050 to just 960. The Minimum Variance optimisation approach reduces this still further to just over 620 constituents.

Although the Minimum Variance methodology reduces the number of stocks it significantly increases the diversification of the index. This is achieved through the constraints applied during the optimisation process. The Lorenz curves for the three indices, FTSE Developed World, FTSE Shariah Developed and FTSE Shariah Developed Minimum Variance shows the differences in the cumulative distribution of stock weights. The flatter the curve, the more evenly distributed the weights. The initial parent index, the FTSE Shariah Developed index, is slightly more concentrated than the FTSE Developed World index due to its market cap weighted scheme and the removal of a significant number of constituents.

Another by-product of the optimisation process and its constraints is not just the wider diversification of the Shariah Minimum Variance index but also a significant size bias. The parent Shariah index comprises a weight of 81.9% in Large Cap stocks and this is very similar to the underlying FTSE Developed World weight of 81.7%. However, the Shariah Minimum Variance has a weight of only 49% in Large cap stocks. The weight of 51% in mid-cap is achieved even though the optimisation constraints include a limit on individual stock weights relative to the parent index.

The core element of the Shariah screening process is based on business activity and this drives the bulk of the sector differences. Understandably, the most substantial sector change relates to Financials where the weight in the Shariah index falls to 1.02% versus 21.6% in the unscreened World benchmark. However, the Minimum Variance version of the index has a weight of 3.74% in Financials with 3.19% of this in the Real Estate supersector. Other significant changes occur within Oil and Gas where the cap weighted Shariah index has a weight of over 17% compared to the weight of 8.94% in parent FTSE Developed World index. On the other hand the Shariah Minimum Variance index has a substantially lower weight of 4.35% in Oil and Gas. Other supersectors such as Chemicals and Basic Resources also have lower weights in the Minimum Variance version of the index.

Comparison of Index Diversification



Source: FTSE Group. Data as of September 2013

Relative Comparison of Industry Weights



Source: FTSE Group.
Data as of September 2013

Comparison of Supersector Weights

Supersector	FTSE Developed World Weights		
	Mkt Cap	Shariah	Shariah MinVar
Oil & Gas	8.94%	17.05%	4.35%
Chemicals	3.14%	5.87%	3.57%
Basic Resources	2.57%	4.34%	1.94%
Construction & Materials	1.16%	2.16%	3.50%
Industrial Goods & Services	11.57%	12.45%	11.26%
Automobiles & Parts	3.23%	2.85%	1.60%
Food & Beverage	4.95%	5.27%	9.13%
Personal & Household Goods	5.62%	6.93%	9.30%
Health Care	10.04%	16.52%	16.63%
Retail	5.41%	5.41%	11.28%
Media	3.04%	1.13%	2.10%
Travel & Leisure	2.40%	0.38%	2.55%
Telecommunications	3.46%	3.44%	3.56%
Utilities	3.35%	3.14%	7.10%
Banks	10.52%	0.00%	0.00%
Insurance	4.88%	0.00%	0.00%
Real Estate	2.73%	0.78%	3.19%
Financial Services	3.46%	0.24%	0.55%
Technology	9.52%	12.06%	8.39%

Source: FTSE Group.
Data as of September 2013

The Shariah Minimum Variance index maintains the overweight position in Health Care at 16.63% compared to 10% in the FTSE Developed World index. Other significantly changed supersector weights include Retail with a weight of close to 11.3% in the Minimum Variance index compared to 5.41% in the parent Shariah index. Food and Beverage has a weight of over 9% compared to just over 5% in the parent Shariah index, whilst the weight of Utilities rises from just over 3% to 7.1%.

The screening and minimum variance process includes a certain element of country level constraints that are designed to retain diversification. It is interesting to note that the USA has a slightly higher weight of 52.3% in the parent Shariah index compared to the Developed World index, whilst the Shariah Minimum Variance reduces this

weight to 44%. Other countries where the Shariah Minimum Variance index has a substantially lower weight than the parent Shariah index include the UK (5.24% v 8.87%), France (1.81% v 5.00%) and Germany (1.36% v 4.41%). Conversely there are substantial overweights at a country level in Japan (15.15% v 9.19%), South Korea (7.55% v 2.59%), Hong Kong (5.47% v 0.60%) and Singapore (3.49% v 0.57%).

In terms of its key characteristics the FTSE Shariah Developed Minimum Variance index has exhibited lower volatility relative to its parent index. This has typically occurred during periods of the most significant increases in volatility. Over the past five years the average volatility reduction has been 24.4%.

Comparison of Country Weights

Country	FTSE Developed World Weights				
	Mkt Cap	Shariah	Shariah MinVar	Shariah v Mkt Cap	Shariah Min Var v Shariah
USA	51.69%	52.25%	44.04%	0.56%	-8.21%
Japan	9.67%	9.19%	15.15%	-0.49%	5.97%
UK	9.00%	8.87%	5.24%	-0.13%	-3.63%
France	3.93%	5.00%	1.81%	1.07%	-3.19%
Canada	3.82%	3.29%	3.63%	-0.54%	0.34%
Switzerland	3.75%	4.30%	3.17%	0.55%	-1.13%
Germany	3.62%	4.41%	1.36%	0.80%	-3.05%
Australia	3.43%	2.42%	4.33%	-1.01%	1.90%
South Korea	1.92%	2.59%	7.55%	0.67%	4.96%
Hong Kong	1.52%	0.60%	5.47%	-0.93%	4.88%
Sweden	1.32%	1.56%	0.29%	0.23%	-1.27%
Spain	1.31%	0.79%	0.42%	-0.51%	-0.38%
Netherlands	1.20%	1.45%	0.71%	0.25%	-0.74%
Italy	0.91%	0.91%	0.26%	-0.01%	-0.65%
Singapore	0.66%	0.57%	3.49%	-0.09%	2.91%
Belgium	0.47%	0.21%	0.49%	-0.26%	0.28%
Denmark	0.49%	0.60%	1.18%	0.11%	0.58%
Norway	0.32%	0.30%	0.06%	-0.02%	-0.24%
Finland	0.35%	0.42%	0.08%	0.07%	-0.34%
Other	0.61%	0.27%	1.28%	-0.34%	1.01%

Summary:

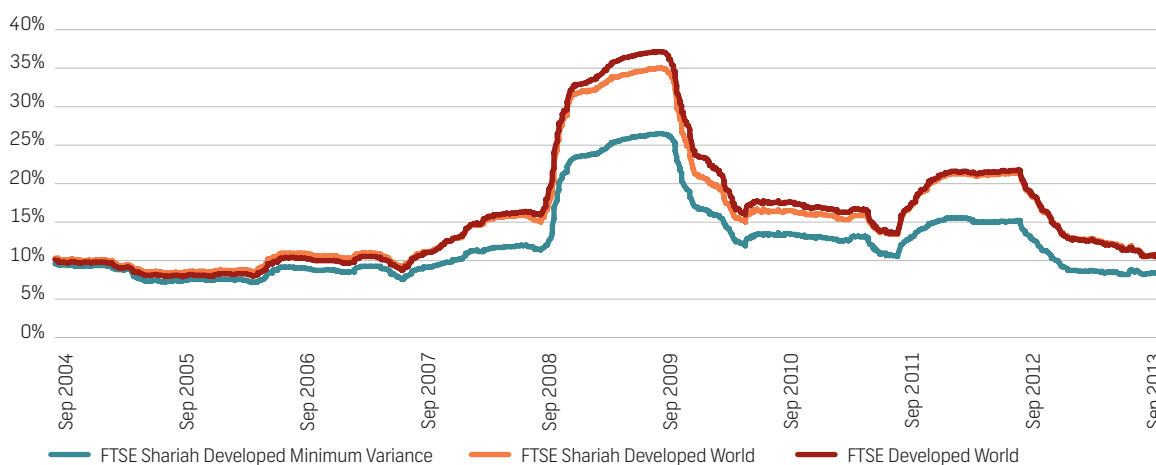
Shariah equity indices combine both business screening, excluding companies involved in ineligible activities, as well as a financial screening. FTSE Shariah Global Equity indices have been created by partnering with Yasaar Ltd, an impartial consultancy and leading authority on Shariah, and have been certified as Shariah compliant through the issue of a Fatwa (Islamic legal opinion) by Yassar's principals.

FTSE's Shariah Minimum Variance indices aim to lower volatility after the application of ethical and financial screening as well as a quantitative construction process.

FTSE's Minimum Variance index methodology, when applied to the FTSE Shariah Developed World index, creates a more balanced risk profile by overweighting stocks that reduce index volatility and underweighting stocks that increase risk.

FTSE's Shariah Minimum Variance indices are an extension of FTSE Shariah indices incorporating an alternative weighting methodology that aims to capture equity returns with lower volatility. Historic results show that the index has delivered substantial reductions in volatility compared to the parent FTSE Shariah Index.

Comparison of 1 Year Realised Volatility



Source: FTSE Group.
Data as of September 2013

Reduction in volatility compared to the FTSE Shariah Developed Index



Source: FTSE Group.
Data as of September 2013

Past performance is no guarantee of future results. Returns shown may reflect hypothetical historical performance. Please see back page for important legal disclosures.

Overview of Index Rules for the FTSE Shariah Global Equity Index Series

The FTSE Shariah Global Equity Index Series includes large and mid cap companies included in the FTSE Global Equity Index Series (GEIS). The FTSE Shariah Global Equity Index Series has been certified as Shariah-compliant through the issue of a Fatwa (Islamic legal opinion).

Criteria for inclusion in the index

Eligible securities

Yasaar is responsible for ensuring that all constituents and potential constituents are screened quarterly to determine their Shariah status.

Companies will be included in the indices if they are current GEIS index constituents and they are also considered to be Shariah compliant.

Shares, investability weightings and treatment of secondary lines of stock are the same as for the FTSE Global Equity Index Series.

Shariah Criteria

Companies involved in non permitted business sectors are excluded from the index.

Non permitted business sectors are:

- Conventional Finance (non-Islamic Banking, Finance and Insurance etc.)
- Alcohol
- Pork related products and non-halal food production, packaging and processing or any other activity related to pork and non-halal food
- Entertainment (Casinos, Gambling, Cinema, Music, Pornography and Hotels)
- Tobacco
- Weapons, arms and defence manufacturing

This list is not exhaustive and is provided as a basic guidance to the broad principles involved.

After companies have been screened by their business sector activity, the remaining companies are further examined on their finances to ensure that those companies are Shariah compliant.

Only those companies that pass the following financial ratios will be considered Shariah compliant:

- a) Debt is less than 33% of total assets
- b) Cash and Interest bearing items are less than 33% of total assets
- c) Accounts receivable and cash are less than 50% of total assets
- d) Total interest and non compliant activities income should not exceed 5% of total revenue

Appropriate purification of dividends at 5%. This ratio calculates the recommended purification amount to be paid by the investor.

Review of constituents

The FTSE Shariah Global Equity Index Series will be reviewed in accordance with the Global Equity Series (GEIS) Ground Rules.

FTSE Shariah Global Equity Index Series Shariah screening will be reassessed quarterly in March, June, September and December in line with the quarterly screening from Yasaar. The Shariah screening process uses data as at the last working day of February, May, August and November taking into account new companies entering the FTSE Global Equity Index Series at the periodic review and implemented on the working day after the third Friday of March, June, September and December.

Index maintenance

Additions - If a Large and Mid cap constituent is added to the FTSE Global Equity Index Series (GEIS), it will become eligible for inclusion in the relevant FTSE Global Shariah Indices subject to Shariah screening at the next periodic review. The inclusion to the FTSE Shariah Global Equity Index Series will not be concurrent with its inclusion to the FTSE Global Equity Index Series (GEIS).

Deletion - If a constituent ceases to be a Large and Mid Cap constituent of the FTSE Global Equity Index Series (GEIS), it will be removed from the relevant index. The removal will be concurrent with its removal from the FTSE Global Equity Index Series (GEIS). If a constituent ceases to meet the Shariah eligibility criteria, it will be removed from the FTSE Shariah Global Equity Index Series at the quarterly Shariah screening review.

Other FTSE Shariah Indices

The FTSE Shariah index range covers all regions across both developed and emerging markets to create a comprehensive Shariah indexing solution. FTSE also works with exchange partners and asset class specialists to provide Shariah-compliant versions of headline indices.

FTSE Bursa Malaysia Hijrah Shariah Index

The index comprises the 30 largest constituents of the FTSE Bursa Malaysia EMAS Shariah Index which meet international standards of Shariah compliance, as screened by Yasaar Research Inc. and the Malaysian Securities Commission Shariah Advisory Council (SAC). The index is designed to act as the basis of tradable products.

FTSE/JSE Shariah Index Series

The FTSE/JSE Shariah Index Series is designed to represent the performance of the Shariah-compliant constituents of the FTSE/JSE All-Share and FTSE/JSE Top 40 Indices, providing Islamic market participants with a liquid and transparent means to access the South African equity market.

FTSE NASDAQ Dubai Shariah Index Series

FTSE Group and NASDAQ Dubai launched the FTSE NASDAQ Dubai Shariah Index Series, the first set of Shariah-compliant country indices for the Gulf Cooperation Council (GCC) region in 2006. The index series is designed to represent the performance of the largest and most liquid Shariah-compliant companies from Kuwait and Qatar.

FTSE SET Shariah Index

The FTSE SET Shariah Index represents the performance of the Shariah-compliant stocks within the benchmark FTSE SET All-Share Index Series, providing Islamic market participants with a means of tracking the performance of the Thai stock market.

FTSE SGX Shariah Index Series

The FTSE SGX Shariah Index Series is designed to represent the performance of Shariah-compliant companies from the following Asia-Pacific markets: Japan, Singapore, Taiwan, Korea and Hong Kong.

The index is calculated in real-time, published in US Dollars (USD) and is expected to be used as the basis of index-linked funds, ETFs and over-the-counter (OTC) products.

FTSE TWSE Taiwan Shariah Index

The FTSE TWSE Taiwan Shariah Index consists of the large and mid cap Taiwanese companies listed on the Taiwan Stock Exchange. The index is designed to be used as the foundation of Shariah-compliant investment products.

FTSE Custom Indices

Should market participants require a unique Shariah index to meet specific needs, FTSE can create a custom index which draws upon its screened universe to provide tailored market or security coverage.

Islamic Asset Management – Developing the Equity Class

Over the last thirty years the contemporary Islamic banking and finance industry has grown rapidly and now comprises of over one trillion dollars of assets. This growth has been accompanied by demands for appropriate asset management. The primary requirement here is access to all relevant asset classes to enable Islamic asset managers to deliver like-for-like risk-return outcomes to that achieved by their conventional counterparts.

A lot of progress has been made in developing all asset classes within the framework of the Shariah over the last three decades. Thus, for example, Sukuks have been developed to provide for the requirement of the “bond” class for secure and liquid investment requirements. Appropriate structures have been developed for investment in real estate. Progress has been made in developing a number of alternative assets like private equity.

Within this framework the equity class was recognised as a key requirement. Development of modalities for investment in equities within the parameters of the Shariah presented a number of challenges. Like their counterparts in ethical, SRI (Socially Responsible Investments), ESG (Environmental, Sustainability and Governance) oriented funds; investment in keeping with the requirements of the Shariah requires screening of the potential investible universe.

This meant screening the constituents of any potential investment universe for compliance with Shariah criteria. These mainly relate to restricting investment in permissible activities. Thus investments in companies dealing mainly in alcohol, tobacco, gambling, arms manufacturing amongst others would not be permissible. Similarly, investments in companies providing interest-based services would also be screened out. This would rule out most banks, insurance companies and other financial institutions.

In addition, companies with gearing levels of over a third would be screened out. This is one of the key distinguishing features of Shariah screened portfolios vis-à-vis their other faith, ethical, SRI and ESG counter parts.

Finally, any companies having more than five percent of their revenues derived from non-permissible activities would also be excluded.

The resultant universe of investible stocks is much smaller than that available to conventional funds managers. Typically, the Shariah screened universe is less than a third of that available to fund managers. Islamic fund managers, thus have a formidable challenge in delivering comparable investment returns.

Studies are beginning to show that over the last decade Islamic asset managers have not suffered from a Shariah “penalty” due to the smaller investible universe and can deliver adequate performance with a Shariah screened universe. [1]

As the requirement for Islamic fund management increases a need is felt to develop more consistent strategies which would allow for comparable performance to conventional fund management. In this regard, an opportunity has presented itself to investigate investment in Shariah screened minimum variance portfolios to see if the restrictions on leverage in Islamic portfolios can be utilised to their best advantage. The early results tend to show the desired balance between risk and return compared to that achieved by standard Shariah screened portfolios. If these results stand the test of time Minimum Variance Shariah screened portfolios can attract many more fund managers who have requirements to invest in accordance with the tenets of the Shariah. This may include several sovereign wealth funds exploring Shariah complainant investment strategies in response to demands from their respective constituencies.

M Iqbal Asaria, Yasaar Ltd



[1] Kamso, Noripah: *Investing in Islamic Funds – A Practitioner’s Perspective*, 2013, John Wiley & Sons

Glossary of Islamic banking and financial terms

Al Ajr

A commission, fees or wages levied for services.

Amana/Amanah

Reliability or trustworthiness. Important value of Islamic society in mutual dealings. It also refers to deposits in trust. A person may hold property in trust for another, sometimes by implication of a contract.

Al Wadia

Resale of goods at a discount to the original cost.

Al Wakala

Absolute power of attorney.

Al Rahn Al

Arrangement where a valuable asset is placed as collateral for a debt. The collateral is disposable in the event of a default. Pawn Broking.

Al Wadiah

Safe keeping.

Awkaf/Awqaf

A religious foundation set up to assist the poor and needy.

Bai Muajjal (Deferred Payment Contract)

A contract involving the sale of goods on a deferred payment basis.

The bank or provider of capital buys the goods (assets) on behalf of the business owner. The bank then sells the goods to the client at an agreed price, which will include a mark-up since the bank needs to make a profit. The business owner can pay the total balance at an agreed future date or pay by instalments over a pre-agreed period.

This is similar to a Murabaha contract since it is also a credit sale.

Bai al Dayn Debt financing

The provision of financial resources required for production, commerce and services by way of sale/purchase of trade documents and papers. Bai al-Dayn is a short-term facility with a maturity of not more than a year. Only documents evidencing debts arising from bona fide commercial transactions can be traded.

Bai al Salam

This term refers to advance payment for goods which are to be delivered later. Normally, no sale can be affected unless the goods are in existence at the time of the bargain. But this type of sale forms an exception to the general rule provided the goods are defined and the date of delivery is fixed. One of the conditions of this type of contract is advance payment; the parties cannot reserve their option of rescinding it but the option of revoking it on account of a defect in the subject matter is allowed. It is usually applied in the agricultural sector where the bank advances money for various inputs to receive a share in the crop, which the bank sells in the market.

Bai Bithaman Ajil

This contract refers to the sale of goods on a deferred payment basis. Equipment or goods requested by the client are bought by the bank which subsequently sells the goods to the client at an agreed price which includes the bank's mark-up (profit). The client may be allowed to settle payment by instalments within a pre-agreed period, or in a lump sum. Similar to a Murabaha contract, but with payment on a deferred basis.

Baitul Mal

Treasury.

Fatwah

A religious decree.

Fiqh

Islamic jurisprudence. The science of the Shariah. It is an important source of Islamic economics.

Gharar Lit

Uncertainty, hazard, chance or risk. Technically, sale of a thing which is not present at hand; or the sale of a thing whose consequence or outcome is not known; or a sale involving risk or hazard in which one does not know whether it will come to be or not, such as fish in water or a bird in the air. Deception through ignorance by one or more parties to a contract. There are several types of gharar, all of which are haram. The following are some examples:

- Selling goods that the seller is unable to deliver
- Selling known or unknown goods against an unknown price
- Selling goods without proper description
- Selling goods without specifying the price
- Making a contract conditional on an unknown event
- Selling goods on the basis of false description
- Selling goods without allowing the buyer to properly examine the goods

The root Gharar denotes deception. Bay' al-Gharar is an exchange in which there is an element of deception either through ignorance of the goods, the price, or through faulty description of the goods.

Bay' al-Gharar is an exchange in which one or both parties stand to be deceived through ignorance of an essential element of exchange. Gambling is a form of Gharar because the gambler is ignorant of the result of his gamble.

Halal

That which is permissible. In Islam there are activities, professions, contracts and transactions which are explicitly prohibited (haram) by the Qur'an or the Sunnah. Barring them, all other activities, professions, contracts, and transactions etc. are halal. An activity may be economically sound but may not be allowed in the Islamic society if it is not permitted by the Shariah.

Hawala

Lit: bill of exchange, promissory note, cheque or draft. Technically, a debtor passes on the responsibility of payment of his debt to a third party who owes the former as debt. Thus the responsibility of payment is ultimately shifted to a third party. Hawala is a mechanism for settling international accounts, by book transfers.

Haram

Unlawful.

Ijara (Leasing)

A contract where the bank or financier buys and leases equipment or other assets to the business owner for a fee. The duration of the lease as well as the fee are set in advance. The bank remains the owner of the assets. This type of contract is a classical Islamic financial product. Leasing is also a lawful method of earning income, according to Islamic law. In this method, tangible assets such as machinery, a car, a ship, a house, can be leased by one person (lessor) to the other (lessee) for a specific period against a specific price. The benefit and cost of the each party are to be clearly spelled out in the contract so that any ambiguity (Gharar) may be avoided.

Ijarah wa Iqtina (Lease to Purchase)

This term refers to a mode of financing adopted by Islamic banks. It is a contract under which the Islamic bank finances equipment, a building or other facility for the client against an agreed rental together with an undertaking from the client to purchase the equipment or the facility. The rental as well as the purchase price is fixed in such a manner that the bank gets back its principal sum along with some profit which is usually determined in advance.

Ijtehad

Lit: effort, exertion, industry, diligence. Technically, endeavour of a jurist to derive or formulate a rule of law on the basis of evidence found in the sources.

Istisna (Progressive Financing)

A contract of acquisition of goods by specification or order where the price is paid progressively in accordance with the progress of a job. An example would be for the purchase of a house to be constructed, payments are made to the developer or builder according to the stage of work completed. This type of financing along with bai salam are used as purchasing mechanisms, and murabaha and bai muajjal are for financing sales.

Ju'alal

Lit: stipulated price for performing any service. Technically applied in the model of Islamic banking by some. Bank charges and commission have been interpreted to be ju'ala by the jurists and thus considered lawful.

Mudaraba / Modaraba (Trust Financing)

The term refers to a form of business contract in which one party brings capital and the other personal effort. The proportionate share in profit is determined by mutual agreement. But the loss, if any, is borne only by the owner of the capital, in which case the entrepreneur gets nothing for his labour. The financier is known as 'rab-al-maal' and the entrepreneur as 'mudarib'. Mudarib In a mudaraba contract, the person or party who acts as entrepreneur.

Mu'amalah

Lit: economic transaction.

Murabaha / Morabaha (Cost-Plus Financing)

Lit: sale on profit.

Technically a contract of sale in which the seller declares his cost and profit. This has been adopted as a mode of financing by a number of Islamic banks. As a financing technique, it involves a request by the client to the bank to purchase a certain item for him. The bank does that for a definite profit over the cost which is agreed in advance. It has been estimated that 80 to 90 percent of financial operations of some Islamic banks belong to this category. There are a number of requirements for this transaction to meet the Islamic standards of a legal sale. The entire transaction is to be completed in two stages and as two separate contracts. In the first stage, the client requests the bank to undertake a Murabaha transaction and promises to buy the commodity specified by him, if the bank acquires the same commodity. In the second stage, the client purchases the good acquired by the bank on a deferred payments basis and agrees to a payment schedule. The Murabaha form of financing is being widely used by the Islamic banks to satisfy various kinds of financing requirements. It is used to provide finance in various and diverse sectors e. g. in consumer finance for purchase of consumer durable such as cars and household appliances, in real estate to provide housing finance, in the production sector to finance the purchase of machinery, equipment and raw material etc.

Musharaka (Venture Capital)

Musharaka is a technique of financing used as a partnership. It is where two or more financiers provide finance for a project.

All partners are entitled to a share in the profits resulting from the project in a ratio which is mutually agreed upon. However, the losses, if any, are to be shared exactly in the

proportion of capital proportion. All partners have a right to participate in the management of the project. However, they can waive the right of participation in favour of any specific partner or person. There are two main forms of Musharaka: Permanent Musharaka and Diminishing Musharaka. These are briefly explained below:

Permanent Musharaka – In this form of Musharaka an Islamic bank participates in the equity of a project and receives a share of profit on a pro rata basis. The period of contract is not specified. So it can continue so long as the parties concerned wish it to continue. This technique is suitable for financing projects on a longer term where funds are committed over a long period and gestation period of the project may also be protracted.

Diminishing Musharaka – Diminishing Musharaka allows equity participation and sharing of profit on a pro rata basis but also provides a method through which the equity of the bank keeps on reducing its equity in the project and ultimately transfers the ownership of the asset of the participants. The contract provides for a payment over and above the bank share in the profit for the equity of the project held by the bank. That is the bank gets a dividend on its equity. At the same time the entrepreneur purchases some of its equity. Thus, the equity held by the bank is progressively reduced. After a certain time the equity held by the bank shall come to zero and it shall cease to be a partner. Musharaka form of financing is being increasingly used by the Islamic banks to finance domestic trade, imports and to issue letters of credit.

Musaqah

A contract in which the owner of the garden shares its produce with another person in return for his services in irrigating the garden.

Muzara'a

A contract in which one person agrees to till the land of the other person in return for a part of the produce of the land.

Qard Hasan (Interest free loans)

Most of the Islamic banks also provide interest free loans (Qard Hasan) to their customers. If this practice is not possible on a significant scale, even then, it is adopted at least to cover some needy people. Islamic view about loan (Qard) is that it should be given to borrower free of charge.

Qimer

Lit: gambling.

Technically, an agreement in which possession of a property is contingent upon the occurrence of an uncertain event.

By implication it applies to those agreements in which there is a definite loss for one party and definite gain for the other without specifying which party will gain and which party will lose.

Rab-al-maal

In a mudaraba contract the person who invests the capital.

Riba

This term literally means an increase or addition. Technically it denotes any increase or advantage obtained by the lender as a condition of the loan. Any risk-free or "guaranteed" rate of return on a loan or investment is riba. Riba, in all forms, is prohibited in Islam. In conventional terms, riba and "interest" are used interchangeably.

Sadaqah

Charitable giving.

Shari'ah / Shariah / Shari'a

Islamic canon law derived from 3 Primary sources: the Quran; the Hadith (sayings of the Prophet Muhammad); and the Sunnah (practice and traditions of the Prophet Muhammad), and three Secondary sources: Qiyas (Analogical deductions and reasoning), Ijma (Consensus of Islamic Scholars) and Ijtihad (Legal reasoning).

Shirkah

A contract between two or more persons who launch a business or financial enterprise to make profit. Shirkah = musharaka.

Suftajal

A banking instrument used for the delegation of credit and was used to collect taxes, disburse government dues and transfer funds by merchants. In some cases suftajahs were payable at a future fixed date and in other cases they were payable on sight. Suftajah is distinct from the modern bill of exchange in some respects. Firstly, a sum of money transferred by suftajah had to keep its identity and payment had to be made in the same currency. Exchange of currencies could not take place in this case.

Secondly, Suftajah usually involved three persons. 'A' pays a certain sum of money to 'B' for agreeing to give an order to 'C' to pay back to 'A'. Third, a Suftajah could be endorsed.

Sukuk

A certificate entitling the holder to the benefits of the income stream of the assets backing the certificate. Equivalent to a Fixed income bond.

Takaful

This is a form of Islamic insurance based on the Quranic principle of Ta'awun or mutual assistance. It provides mutual protection of assets and property and offers joint risk sharing in the event of a loss by one of its members. Takaful is similar to mutual insurance in that members are the insurers as well as the insured. Conventional insurance is prohibited in Islam because its dealings contain several haram elements including gharar and riba, as mentioned above.

Waqf

Lit: detention.

Technically appropriation or tying-up of a property in perpetuity so that no propriety rights can be exercised over the usufruct. The Waqf property can neither be sold nor inherited or donated to anyone. Awqaf consists of religious foundations set up for the benefit of the poor.

Zakah/Zakat

A tax which is prescribed by Islam on all persons having wealth above an exemption limit at a rate fixed by the Shariah. According to the Islamic belief Zakah purifies wealth and souls. The objective is to take away a part of the wealth of the well-to-do and to distribute it among the poor and the needy. It is levied on cash, cattle, agricultural produce, minerals, capital invested in industry, and business etc. The distribution of Zakah fund has been laid down in the Qur'an (9:60) and is for the poor, the needy, Zakah collectors, new converts to Islam, travellers in difficulty, captives and debtors, etc. It is payable if the owner is a Muslim and sane. Zakah is the third pillar of Islam. It is an obligatory contribution which every well off Muslim is required to pay to the Islamic state, in the absence of which individuals are required to distribute the Zakah among the poor and the needy as prescribed by the Shariah.

Source: Yasaar Limited

Contact details

FTSE

Kevin Bourne
Managing Director
FTSE ESG Group
+44 (0)20 7866 8009
kevin.bourne@ftse.com

Gordon Morrison FIA
Managing Director
FTSE ESG Group
+44 (0)20 7866 8919
gordon.morrison@ftse.com

David Harris
Director
FTSE ESG
+44 (0)20 7866 1862
david.harris@ftse.com

Maaqil Bhoyroo
Shariah Analyst
Head of EMEA Partnerships
FTSE Group
+44 (0)20 7866 8982
maaqil.bhoyroo@ftse.com

Jonathan Cooper
Managing Director, Middle East & Africa
FTSE Group
+971 4 375 1868
jonathan.cooper@ftse.com

Jessie Pak
Managing Director, Asia
FTSE Group
+852 2 164 3226
jessie.pak@ftse.com

YASAAR

Majid Dawood
CEO
Yasaar Limited
+44 (0)20 3664 9026
majid@yasaar.org

M Iqbal Asaria
Head of European Operations
Yasaar Limited
+44 (0)20 3664 9026
mia@yasaar.org

For further information, please contact

Beijing	+86 10 5833 2202	New York	+1 888 747 FTSE (3873)
Dubai	+971 4 319 9901	Paris	+33 (0)1 53 76 82 89
Hong Kong	+852 2164 3333	San Francisco	+1 888 747 FTSE (3873)
London	+44 (0) 20 7866 1810	Shanghai	+86 21 6058 9132
Milan	+39 02 3604 6953	Sydney	+61 (2) 9293 2864
Mumbai	+91 22 6649 4180	Tokyo	+81 (3) 3581 2811

© 2013 FTSE International Limited ("FTSE"). All rights reserved. "FTSE®" and "Footsie®" are trade marks of the London Stock Exchange Group companies and is used by FTSE under licence. "All-World", "All-Share", "All-Small" and "FTSE4Good" are trade marks of FTSE.

Rights in each index vest in FTSE, the FTSE Licensors and/or FTSE's relevant partners. Neither FTSE, the FTSE Licensors nor FTSE's relevant partners makes any warranty or representation whatsoever, expressly or impliedly, either as to the results to be obtained from the use of the indices and/or the figure at which the said index stands at any particular time on any particular day or otherwise. Each Index is compiled and calculated by FTSE and/or its relevant partners. However, neither FTSE nor the FTSE Licensors nor FTSE's relevant partners shall be liable (whether in negligence or otherwise) to any person for any error in any index and neither FTSE nor the FTSE Licensors nor FTSE's relevant partners shall be under any obligation to advise any person of any error therein. The information and opinions contained in this document, which has been prepared by FTSE, are not intended to be a comprehensive study, nor to provide any advice, and should not be relied on or treated as a substitute for specific advice. All information is provided for information purposes only. No reliance may be placed for any purposes whatsoever on the information contained in this document or its completeness. No representation or warranty is given by FTSE or its partners, any of its directors, officers or employees as to the accuracy or completeness of the information or opinions contained in this document and no liability is accepted for any such information or opinions. While every effort is made to ensure that all information given by FTSE in this publication is accurate, no responsibility or liability can be accepted by FTSE and/or its relevant partners for any errors or for any loss arising from use of this publication. This document and its contents may not be reproduced, redistributed, stored in retrieval system, or passed on, directly or indirectly, to any other person or published, or transmitted by any other form or means whether electronic, mechanical, photocopying, recording or otherwise in whole or in part, for any purpose without the prior written consent of FTSE.

Nothing in this document constitutes financial or investment advice. FTSE is not an investment adviser and makes no representation regarding the advisability of investing in any security or investment vehicle. A decision to invest in any such security or an investment vehicle should not be made in reliance on any information above. Indices cannot be invested in directly. Inclusion of a security in an index is not a recommendation to buy, sell or hold such security. Please see ftse.com for additional legal disclosures and complete index methodology details. This document is meant for informational purposes only and does not constitute an offer to buy or sell, or a promotion of, any security. The presentation may contain forward-looking statements. These are based upon a number of assumptions concerning future conditions that ultimately may prove to be inaccurate. Such forward-looking statements are subject to risks and uncertainties and may be affected by various factors that may cause actual results to differ materially from those in the forward-looking statements. Any forward-looking statements speak only as of the date they are made and FTSE assumes no duty to and does not undertake to update forward-looking statements.