

Emerging vs. Developed Markets Classification

Why it Matters to Investors

- MSCI has been classifying Emerging and Developed markets since the introduction of the MSCI Emerging Markets Index in 1988. The MSCI classification framework is based on an assessment of three dimensions: 1) economic development, 2) size and liquidity of equity markets, 3) market accessibility for foreign investors.
- Why is this important for investors? The misclassification of a market within a global index may significantly increase the cost, tracking error and overall risk of a portfolio tracking the index. A frequent misconception is to equate an advanced economy with an advanced stock market. This may lead to overlooking other important issues such market accessibility.
- Korea, for example, is a fairly developed economy with several world class companies. However, Korea's equity market is not yet at the developed level when objectively compared to the 24 markets that MSCI classifies as developed. Korea, which has been under review by MSCI for developed status for the last 5 years, will only be reclassified when accessibility issues are resolved and following a consultation with investors.

MSCI Market Classification Framework

The MSCI market classification framework is based on an assessment of three dimensions of a country's market:

- Economic development: uses Gross National Income (GNI) per capita as published by the World Bank.
- Size and liquidity of its equity markets: consistent cross country comparison for 77 markets.
- Accessibility for foreign investors: uses 18 distinct measures such as foreign ownership limits or capital flow restrictions.

Korea: An Illustration

- Korea meets the economic development and size and liquidity criteria for developed market status. However, it currently fails the accessibility criteria.
- All developed market currencies today are traded 24 hours around the world. In Korea, foreign investors can only trade the local currency during Korean business hours with Korean legal entities. Such restrictions make global portfolio rebalancing difficult and may cause tracking error.
- In Korea, the use of omnibus trading accounts and inkind transfers, which are commonly used by institutional investors to manage thousands of client accounts, is difficult or prohibited. This results in complex processes for managers and leads to higher costs and fees for the end investor.

MSCI Developed Markets and Korea

Economic Development & Key Market Accessibility Measures

Economic Dev	elopment	Market Accessibility				
		FX	In-kind tranfer/			
GNI per capita	Country Name	convertibility	Omnibus acc.			
	Norway					
	Switzerland	>				
	Denmark	>				
	Sweden	>				
	Netherlands	>				
	United States	>	②			
	Finland	>	②			
	Austria	②	<a>			
	Australia	②				
	Belgium	②	②			
	Canada	②	>			
	Japan	②				
	Germany	②				
	Singapore	②				
	France	②				
	Ireland	②				
	United Kingdom	②				
	Italy	②				
	Hong Kong	②				
	Spain	②				
	New Zealand	②	<a>			
	Israel	②				
	Greece	②	8			
	Portugal	Ø	<a>			
\rightarrow	Korea	8	8			

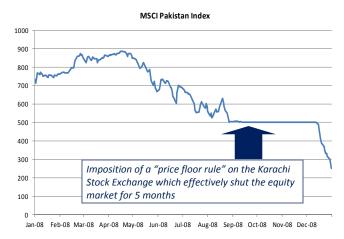
Source: MSCI, World Bank, as of November 2012



Managing Risk in Emerging Markets

- Although many emerging markets over the years have improved certain regulations and market practices, in general they are more commonly subject to crises and market disruptions.
- In June of each year, MSCI reviews the classification of the 77 markets it covers. Any change follows extensive consultations with international investors around the world.
- Classification changes may also occur off cycle, if severe market disruptions—such as the introduction of capital flow restrictions—prevent investors from entering or exiting the market.
- For example, MSCI moved Pakistan and Argentina from Emerging to Frontier Markets status and dropped the coverage of Venezuela following major market crises.

2008 Performance of the MSCI Pakistan Index



For over 40 Years MSCI Has Captured the Evolution of Markets in a Timely Manner:

	1960s - 1970s 1980s - 1990s				2000s						
D	eveloped Markets	Intro	duction and Expa	nsion of E	merging Markets		Increased	Opportu	nities in GCC and Front	ier Marke	ts
Year	Country	Year	Country	Year	Country	Year	Country	Year	Country	Year	Country
	Australia	1981	Mexico ³		Indonesia		Egypt		Bulgaria		Lithuania
	Austria		Finland	1990	Turkey	2001	Morocco		Croatia		Serbia
	Belgium		New Zealand	1990	Ireland	2006	Greece joins DM	2007	Estonia	2008	Pakistan joins FM
	Canada		Argentina		Luxemburg ⁴		Bahrain ⁸		Kazakhstan		Jordan joins FM
	Denmark		Brazil		Colombia		Kuwait ⁸		Romania		Argentina joins F
	France		Chile		India		Oman ⁸		Slovenia		Trinidad & Tobag
	Germany	1988	Jordan		Pakistan		Qatar ⁸		Ukraine		Jamaica ⁷
1969	Italy		Malaysia		Peru		Saudi Arabia		Kenya		Ghana ⁷
1909	Japan		Philippines		Sri Lanka ⁵		United Arab		Mauritius		Botswana ⁷
	Netherlands		Thailand		Venezuela ⁵		Emirates ⁸		Nigeria		Bangladesh
	Norway		Greece	1995	China				Tunisia		Bosnia Herzegovina
	Spain	1989	Korea		Israel				Lebanon		Israel joins DM
	Sweden	1909	Portugal		Poland				Sri Lanka joins FM ⁵	2010	Saudi Arabia
	Switzerland		Taiwan		South Africa				Vietnam		discontinued 9
	United Kingdom				Russia						Zimbabwe ⁷
	United States			1996	Czech Republic					2012	Saudi Arabia ¹⁰
1972	Hong Kong				Hungary						
19/2	Malaysia / Singapore ¹			1997	Portugal joins DM						
1974	South Africa										

1 Effective 4/30/93, the MSCI Malaysia / Singapore Index became the MSCI Singapore Index 2 The MSCI South Africa Gold Mines Index was included in the MSCI World Index from 12/2/74 to 3/1/95 3 On 11/5/81, the MSCI Mexico Index was included in the MSCI World Index and then became part of the MSCI EM Index on 1/1/88 4 The MSCI Luxembourg Index was discontinued as of the close of 3/29/02 5 Effective 5/31/01, the MSCI Sri Lanka Index was excluded from the MSCI EM and MSCI ACWI Indices. The MSCI Sri Lanka Index was a stand-alone index until 2007 when it was included in the MSCI EM Index 6 Effective 5/31/06, the MSCI Venezuela Index was excluded from the MSCI EM and ACWI Indices and then discontinued effective 12/31/07 7 The MSCI Bosnia Herzegovina, MSCI Botswana, MSCI Ghana, MSCI Jamaica, MSCI Trinidad & Tobago and MSCI Zimbabwe Indices are stand-alone indices that are not currently included in the MSCI FM Index but are under consideration for inclusion 8 AII GCC countries ex Saudi Arabia are part of MSCI FM Index 10 On 6/26/2012, MSCI resumed calculation of the stand-alone MSCI Saudi Arabia Index



Learn more about MSCI Market Classification: www.msci.com/products/indices/market_classification.html

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