

CAMBRIDGE ASSOCIATES LLC

GLOBAL MARKET COMMENTARY

THE CHANGING FACE OF EMERGING MARKETS DEBT

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The Changing Face of Emerging Markets Debt

We have considered emerging markets debt to be overvalued since June 2003, and *very* overvalued since September 2005. As a result, we have advised investors to steer clear of the asset class until yields and spreads improved substantially. However, as the US\$-denominated emerging debt market has continued to shrink, and local currency debt, both sovereign and corporate, continued to grow, investor and manager interest has begun to shift to the local currency market. This seems logical, as the recent changes in composition appear to be structural rather than temporary, and the mushrooming local currency market offers advantages that external debt does not. Thus, while we still believe emerging markets credit risk is overpriced, local currency debt *may* be worth considering for some investors. Local currency debt provides a wider and more varied opportunity set, and may also provide a bit of a currency hedge through exposure to emerging Asian currencies, particularly for US\$-based investors. Further, as the local currency market remains inefficient, good managers should be able to add alpha.

The Details

In many ways, local currency debt represents an entirely different opportunity set from that historically offered by external debt.¹ To begin with, while US\$-denominated debt indices have always been dominated by Latin American issues, they make up only 23% of the J.P. Morgan GBI-EM Broad Index of local currency sovereign issues,² trailing Asia (45%) and Europe (26%) (Table A). In addition, while yields on US\$-denominated and local currency debt are similar (Table B), the credit quality of local currency debt is substantially better. A-rated issues, for example, make up two-thirds of the market cap of the GBI-EM Broad, versus a mere 8.7% of the EMBI Global (Table A). Most countries, of course, prefer to finance themselves with local currency debt, turning to externally denominated financing only when necessary. As J.P. Morgan recently noted: "An increase in a country's weight in the external debt family of indices can be an indication of a country's *inability* to finance itself domestically." (Emphasis added.) The differences between US\$-denominated and local currency debt are also apparent in performance and correlation figures, which show significant return variance and relatively low correlations over the 13 years for which we have data (Table C).

It is also noteworthy that the local currency debt market, while just appearing on the radar of most investors, has comprised a growing percentage of total emerging markets debt for years (Table D), and is in fact significantly bigger than the external debt market. According to the J.P. Morgan indices, local currency sovereign debt currently totals about US\$700 billion, versus roughly US\$300 billion for US\$-denominated

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¹ US\$-denominated debt makes up roughly three-quarters of the external debt market, and is what most people refer to generically as "emerging markets debt." Thus, we have chosen to use US\$-denominated debt for most comparison purposes. Euro-denominated debt, which makes up the balance, tends to be shorter duration and thus have lower yields. To avoid confusion, we use the term "external debt" only when referring to the overall market (US\$ + euro); otherwise, the distinction between US\$- and euro-denominated debt will be clearly stated.

² We use the GBI-EM Broad Index for comparison purposes since it is the most comprehensive local currency index currently available (and most comparable to the EMBI Global Index). However, it has a short track record (since 2002), and as a result many managers use the J.P. Morgan Emerging Local Markets Index (ELMI) Plus for their benchmark. The differences between these and other available indices are detailed in Table G.

emerging markets debt, and €68 billion for euro-denominated debt. Local currency corporate debt makes up an additional US\$165 billion, and is growing rapidly. Corporate issuance was US\$111 billion in 2006 (up from US\$26 billion in 2001), and J.P. Morgan predicts that by the end of 2007, the corporate debt market will be nearly *double* the size of the external sovereign market. Emerging markets corporate debt is currently heavily weighted to Asia due to a number of large "quasi-sovereign" issuers in Korea and Malaysia, followed by Latin America, then Central Eastern European and the Middle East, which is gaining rapidly (Table F).

Plus ça Change...

The main appeal of emerging markets debt has always been the potential for blockbuster returns. It would, after all, hardly be worth investing in countries with histories of tremendous social unrest, state seizure of assets, and a general antipathy to foreign investors, when the upside is limited to a few hundred basis points (bps) over U.S. Treasuries. Still, this is the situation that currently exists with regard to US\$-denominated emerging markets debt, which at last check was paying a mere 176 bps more than ten-year U.S. Treasuries. While there are a number of reasonable theories as to why this has occurred—e.g., many emerging markets are far more financially sound today than they were in the past, while investors have become increasingly desperate in their search for yield—the bottom line is that spreads have become so thin (and absolute yields so low) that US\$-denominated debt does not offer even the *potential* for outsized returns going forward.

Indeed, we would argue the issues that compose the EMBI indices no longer represent emerging markets debt as most people know it. Rather, US\$-denominated sovereign debt would be better described as a shrinking, virtually anachronistic corner of the global debt universe, with investors taking moderate risks in the hopes of scoring a few additional bps of return over developed markets debt. (In many cases, countries clearly have the *ability* to pay; the only question is whether left-leaning governments will choose to do so. Clearly this is different from the past, when *both* issues were in question.) Local currency debt, on the other hand, represents a fast-growing, dynamic area, with the number and quality of issuers improving rapidly, and a growing number of managers scrambling to put together investment vehicles to offer access to yield-starved investors. In short, while local currency sovereign yields are similar to yields on US\$-denominated sovereigns, credit quality is higher, opportunities to benefit from active management are more pervasive, and the addition of currency risk may be desirable to some investors.

Currency Matters

Of course, the biggest difference between external debt and local currency debt is the currency in which it is denominated. Indeed, the main reason most investors have historically shunned local currency debt is emerging markets' sordid history of currency devaluations that left foreign investors holding essentially worthless paper. US\$-denominated debt, in particular Brady bonds, was the temporary solution to this problem, since it allowed foreign investors to invest in emerging markets debt with far fewer currency worries. (Such worries still existed, of course, particularly in countries with unsustainable currency pegs such

as Argentina. However, the difference is that countries with external debt were forced to default when crisis hit, rather than simply paying off their debt with radically devalued currency.)

Today, by contrast, it is the US\$ that appears vulnerable due to yawning current account and budget deficits, while many emerging markets currencies look attractive. We tend to shy away from currency forecasts, but agree with the market consensus that a variety of secular factors are likely to weigh on the US\$ for many years; partly as a result, we have for the past few years recommended investors diversify away from US\$-based investments. An added benefit of local currency debt, therefore, is that it provides a bit of a hedge against a sharp decline in the US\$, should it depreciate relative to emerging Asian currencies, as expected over the long term. However, a couple of caveats are worth noting. First, a local currency debt investment actually entails two separate and distinct risks that need not be intertwined. In other words, investors who choose to place unhedged funds with a local currency manager should be aware that they are exposing themselves to both credit risk and currency risk. Second, and perhaps more important, is that recent reforms in emerging markets, while certainly encouraging, could prove to be ephemeral. Particularly in the event of a global economic downturn, it would not be surprising to see many emerging debt issuers resort to currency devaluations in order to maintain economic competitiveness. Still, this worry may be a bit overstated given the small weight of Latin American debt in the local currency indices, given their historical penchant for "solving" economic problems through currency printing.

Valuations

The one hole in the argument for local currency debt is the lack of historical data with which to formulate a valuations framework. The GBI indices are too new to give a useful history, while the ELMI, which is composed of money market instruments, does not provide an adequate proxy for the actual opportunity set available to investors. Further, the vast differences between emerging markets currencies make assigning an overall valuation to local currency debt an exercise fraught with peril. Indeed, while assigning valuations to US\$-denominated debt is hardly a science, the process (essentially a comparison between yields on emerging markets debt and U.S. Treasuries) is far more concrete than that applied to local currency debt, which, after accounting for credit ratings and ability/willingness to pay, basically comes down to an investor/manager's outlook for specific currencies and interest rates.

For our part, we feel comfortable saying that, given the yields and credit quality available in the local currency space, good managers should have little difficulty finding attractively priced issues. To clarify: we believe there is value in local currency debt *in aggregate*; however, given the wide disparity in credit quality, yields, and currencies among emerging markets, investors should seek to access this space through an actively managed strategy, rather than attempting to mimic a benchmark. In short, local currency debt is an inefficient, reasonably priced area where we would expect good managers to add alpha.

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Speaking of Managers...

In a somewhat unusual twist, managers actually appear to be ahead of investors with regard to local currency debt markets. While investor demand for local currency debt products remains low, we know of roughly 20 managers (most with significant experience in emerging markets) who are participating in the market in some fashion, with a dozen running (or in the process of starting) dedicated local currency funds. Thus, investors wishing to gain exposure to the area should have a number of options from which to choose.

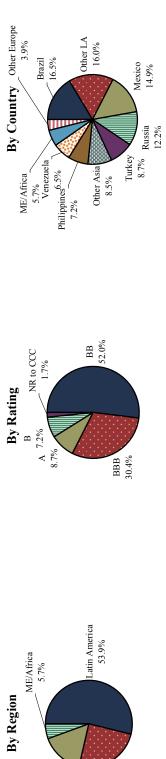
Conclusion

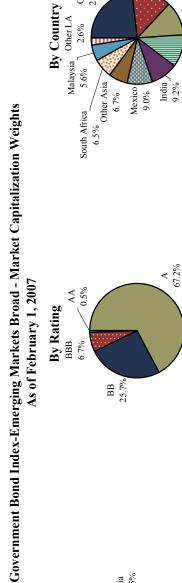
To paraphrase an old car commercial, this is not your father's emerging debt market. The rapidly expanding local currency market, both sovereign and corporate, offers a plethora of highly rated, attractively priced issues, with the added benefit that they may provide protection in the event of a US\$ decline. Still, investors should not expect returns to match those achieved by US\$-denominated debt over the past decade or so, which owed much to the once-in-a-lifetime restructuring undergone by emerging markets over this period, not to mention extraordinarily high starting yields and a generational bull market in global bonds. Finally, it bears mentioning that a rise in investor risk aversion would likely cause investors to pull back from emerging markets investments overall; a local currency debt manager we spoke with on February 27 (when U.S. markets fell sharply following a 9% drop in Chinese shares) told us the biggest threat to local currency markets is "more days like today."

Table A

CHARACTERISTICS OF EMERGING MARKETS DEBT INDICES

Emerging Markets Bond Index Global - Market Capitalization Weights As of January 31, 2007





23.1% China

2.6%

Other Europe 14.0%

Brazil Broad 11.8%

Poland 11.6%

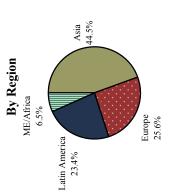
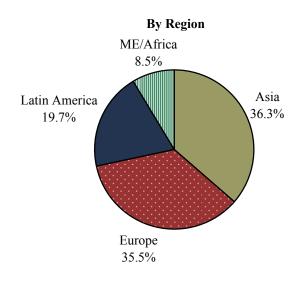


Table A (continued)

CHARACTERISTICS OF EMERGING MARKETS DEBT INDICES

Emerging Local Markets Index Plus - Market Capitalization Weights As of January 31, 2007



By Country South Africa Israel 4.7% Other Asia 3.8% Hungary 16.1% 5.5% Czech Republic 6.4%Singapore 10.1% Other Europe 7.4% Hong Kong Turkey 10.1% 8.0% Poland Mexico 8.1% Other LA 10.0%

Source: J.P. Morgan Securities, Inc.

Notes: Percentages may not total 100% due to rounding. Rating weightings for the Government Bond Index-Emerging Markets Broad (GBI-EM Broad) are as of January 1, 2007.

9.7%



Table B

YIELD DIFFERENTIAL BETWEEN USS-DENOMINATED DEBT AND LOCAL CURRENCY DEBT

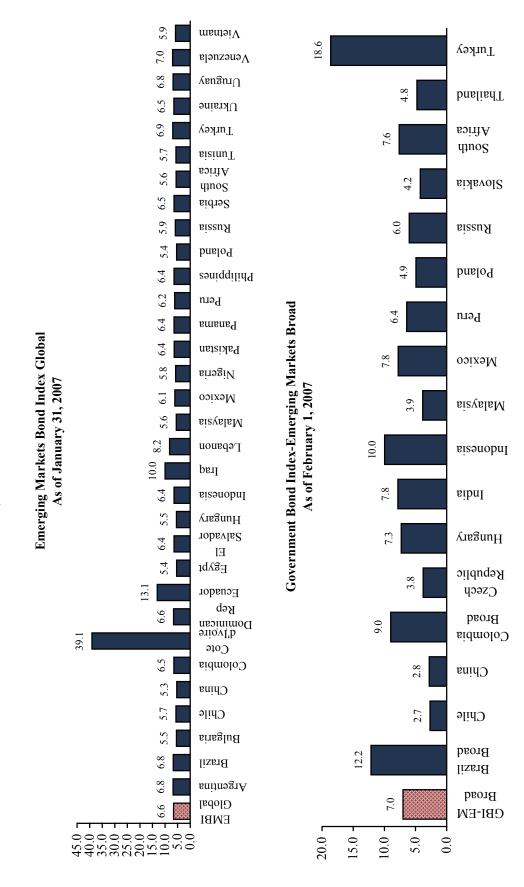
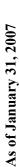
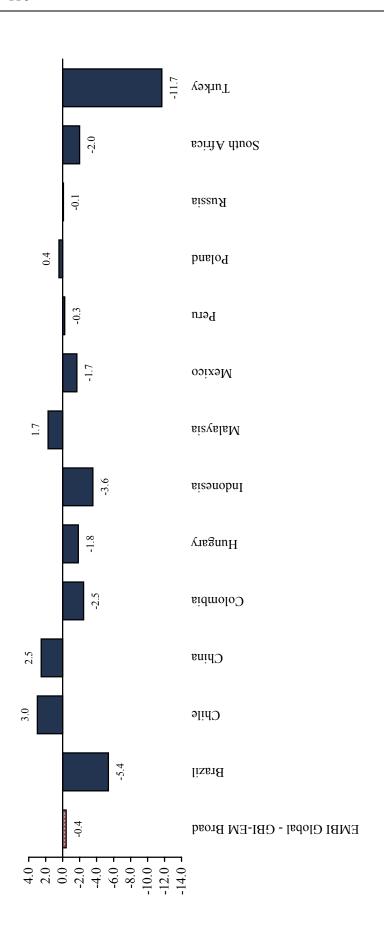


Table B (continued)

YIELD DIFFERENTIAL BETWEEN US\$-DENOMINATED DEBT AND LOCAL CURRENCY DEBT



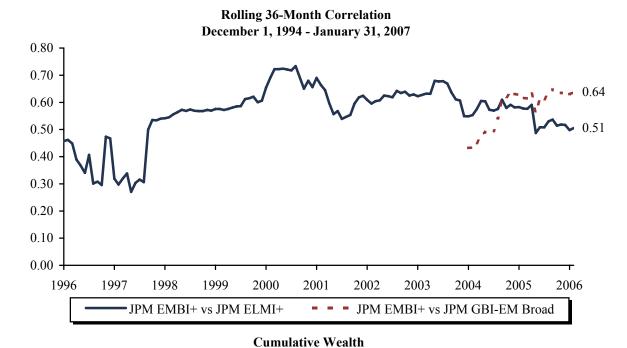


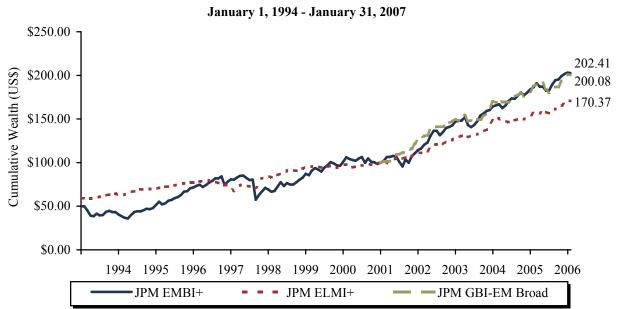
Source: J.P. Morgan Securities, Inc.

Notes: Indonesia weight is reduced by 50% in GBI-EM Broad for February 1, 2007 rebalancing. The remaining will be removed on March 1, 2007.

Table C

CORRELATIONS AND CUMULATIVE WEALTH OF EMERGING MARKETS DEBT INDICES



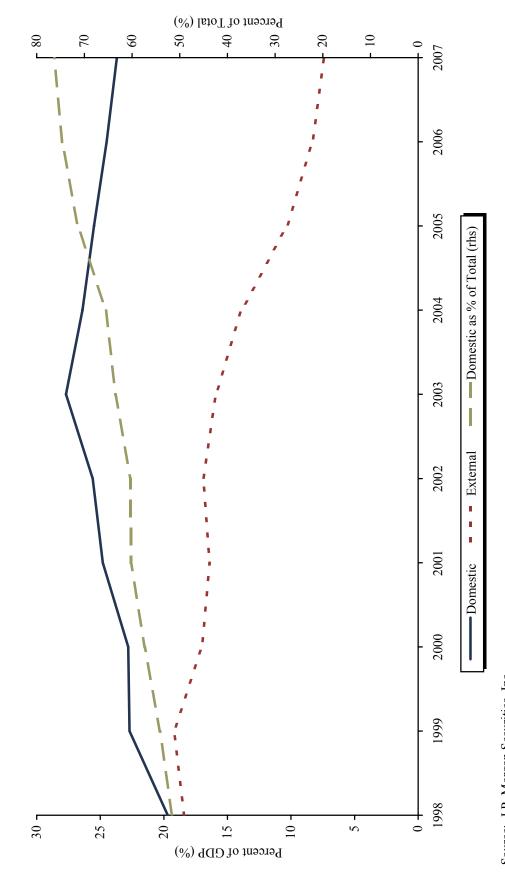


Sources: The Bloomberg, J.P. Morgan Securities, Inc., and Thomson Datastream.

Notes: Data for the J.P. Morgan Government Bond Index-Emerging Markets Broad start on January 1, 2002. J.P. Morgan EMBI+ and J.P. Morgan ELMI+ data are rebased to \$100 in December 31, 2001 to match the start date of the J.P. Morgan GBI-EM Broad.

Table D

DOMESTIC DEBT INCREASING AS A SHARE OF TOTAL DEBT



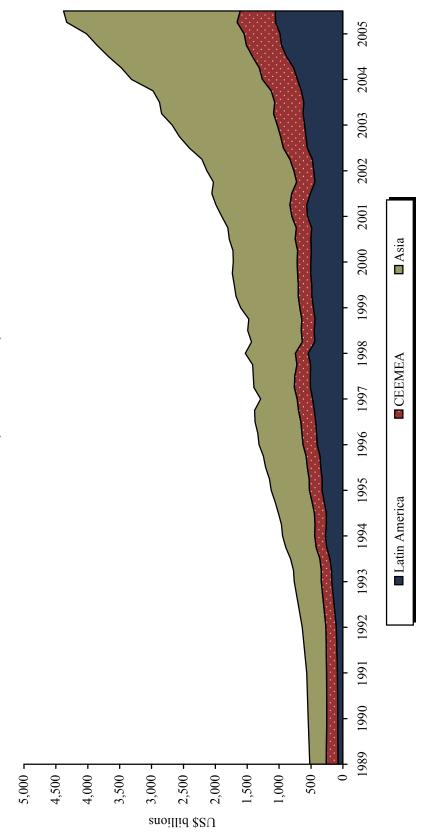
Source: J.P. Morgan Securities, Inc.

C|A

Table E

DOMESTIC DEBT SECURITIES STOCK



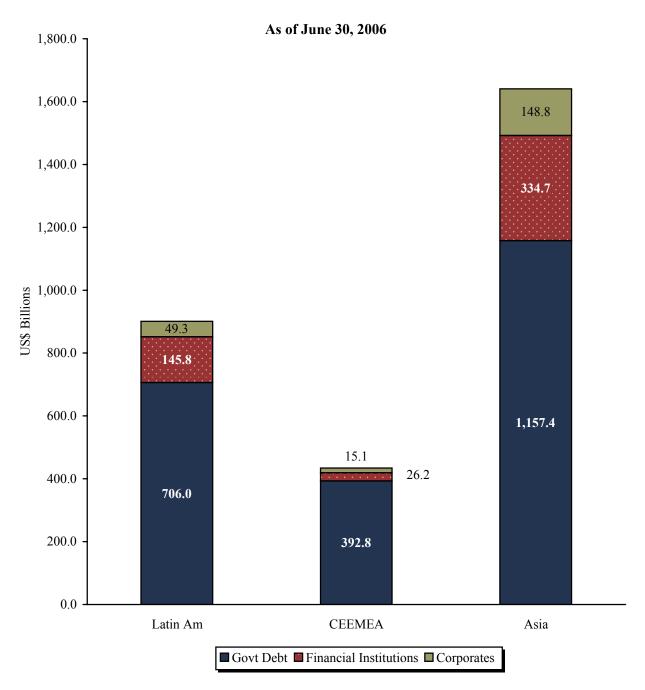


Sources: Bank of International Settlements and J.P.Morgan Securities, Inc.

Notes: Latin America includes Argentina, Brazil, Chile, Colombia, Mexico, Peru, and Venezuela. CEEMEA stands for Central Eastern Europe Middle East and Africa and includes Croatia, Czech Republic, Hungary, Lebanon, Poland, Russia, Slovakia, South Africa, and Turkey. Asia includes China, Hong Kong, India, Indonesia, Malaysia, Pakistan, the Philippines, Singapore, South Korea, Taiwan, and Thailand.

Table F

DOMESTIC DEBT SECURITIES STOCK:
EXCLUDES DEBT WITH MATURITY OF LESS THAN ONE YEAR



Sources: Bank of International Settlements and J.P.Morgan Securities, Inc.

Notes: Latin America includes Argentina, Brazil, and Mexico only. CEEMEA stands for Central Eastern Europe Middle East and Africa and includes Czech Republic, Poland, South Africa, and Turkey. Asia includes China, India, Indonesia, Malaysia, and Thailand.

Table G

CHARACTERISTICS OF EMERGING MARKETS INDICES

As of December 31, 2006

The Main J.P. Morgan Emerging Market Local Market Indices						
	GBI-EM Broad/	GBI-EM Global	GBI-EM/Diversified			
	Diversified (Broadest)	Diversified (Investable)	(Replicable)	ELMI +		
Number of Countries	17	15	15	25		
Country Scope	All countries in the GBI-EM universe.	Excludes China and India.	Narrower versions of Brazil and Colombia. Excludes China and India.	All emerging markets.		
Country Criteria	Does not exclude markets with capital controls and/or regulatory/tax hurdles for foreign investors.	Accessible to majority of foreign investors. Does NOT include markets with capital control.	Directly accessible. No impediments for foreign investors.	No restrictions for foreign investors. Money Market Instruments must provide a minimum degree of liquidity.		
Income Criteria	Low/Middle income	Low/Middle income	Low/Middle income	NA		
Liquidity Criteria	Liquid - Daily pricing available.	Liquid - Daily pricing available.	Liquid - Daily pricing available.	Liquid - Daily pricing available.		
Instrument Criteria	Fixed Coupon and Zero Coupon Maturity>13 months.	Fixed Coupon and Zero Coupon Maturity>13 months.	Fixed Coupon and Zero Coupon Maturity>13 months.	Money Market Instruments.		
Countries/Bonds	17/234	15/185	15/171	25/NA		
Index Market Cap	US\$693 billion	US\$468 billion	US\$386 billion	NA		
Largest Country	China	Poland	Poland	Hong Kong/Mexico/ Singapore		
Largest Weight	23.27%	17.68%	21.43%	10.00%		
Historic Data Back to	Dec-31-01/Dec-31-02	Dec-31-01/Dec-31-02	Dec-31-01/Dec-31-02	Dec-31-93		

The Main J.P. Morgan Emerging Market External Debt Indices

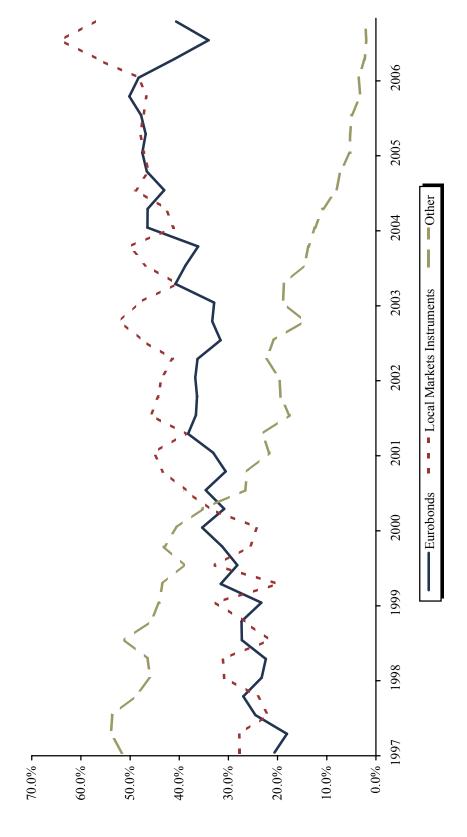
			EMBI Global	Euro EMBI Global
	EMBI+	EMBI Global	Diversified	Diversified
Countries	17	32	32	18
Includes Defaulted?	Yes	Yes	Yes	Yes
Includes Quasi	No	Yes	Yes	Yes
Sovereigns?				
Inclusion Criteria	BBB+/Baa1 or Under	Low/Middle Income	Low/Middle Income	Low/Middle Income
Minimum Issue Size	US\$500 million	US\$500 million	US\$500 million	€500 million
Liquidity Criteria	Yes	No	No	No
Face Constraints	No	No	Yes	No
Market Cap	US\$222 billion	US\$299 billion	US\$192 billion	€68 billion
Largest Country	Brazil	Brazil	Brazil	Poland
Largest Weight	20.90%	16.40%	9.80%	23.00%
Historic Data Back to	Dec-93	Dec-93	Dec-93	Dec-98

Source: J.P. Morgan Securities, Inc.

LOCAL MARKETS NOW DOMINATE TRADING ACTIVITY IN EMERGING MARKETS

Table H

First Quarter 1997 - Fourth Quarter 2006



Sources: EMTA and J.P. Morgan Securities, Inc.

Notes: Other includes loans, Brady Bonds, options, and warrants. Total trade volumes on quarterly basis.