



ALDO MUSACCHIO

STEPHEN J. GOLDSTEIN

## Silver Lake and Private Equity in Brazil: *Carnaval* or Calamity?

After taking off from Rio de Janeiro's Galeão International Airport and enjoying the view of the "marvelous city" and its famed Guanabara Bay below, David Roux and Julia Novaes Fernandes discussed the evening's dinner conversation, which had touched on opportunities for Silver Lake to establish itself as a major player in the Brazilian technology investing space. Their dinner with Pedro Malan, former minister of finance and president of Brazil's Central Bank, had reinforced Roux's interest in moving forward with a concerted effort in Brazil. Roux (Harvard College '78, HBS '84) was a founding partner of Silver Lake, a technology and technology-related investment firm founded in 1999; Novaes Fernandes was the firm's sole Brazilian professional (see **Exhibit 1**). Since the firm's founding, Silver Lake's partners had, at various points, considered establishing a presence in Brazil. While the market continued to pique the firm's interests, the question of market entry became more relevant as Brazil began its ascent in 2006 and 2007. However, it was not until 2009 that Silver Lake began devoting serious resources and senior attention to Brazil.

Brazil was, undoubtedly, hot, with the global media and investment communities showering attention on the country. In the years leading up to 2011, the macroeconomic environment stabilized, nominal and real interest rates fell precipitously, domestic consumption grew significantly, tens of millions entered an emerging middle class, and commodities grew not only in value exported but also in total quantity discovered and available for export (see **Exhibit 2**).

But the last time Brazil was hot, many of the Private Equity (PE) firms that had opened offices there got burned. At the height of the most recent boom in Brazil in the 1990s, many PE firms entered Brazil only to achieve disappointing returns and abandon their newly-founded offices.

Roux thought to himself, "Was this time any different? Had Brazil 'emerged' into a market ripe again for PE investment? Had the fundamentals of the economy changed enough that long-term stability would ensure sustained market liquidity and investment security?"

Almost two years had passed since the firm had begun devoting attention to Brazil, and Silver Lake had already committed capital to two Brazilian investments. In thinking back to their peaceful flight from Rio de Janeiro to São Paulo in 2011, Roux knew that he needed to decide on a path forward for Silver Lake in Brazil. Later that year, Roux and Novaes Fernandes wondered, "Should we be more aggressive in Brazil, and, if so, how should we approach market entry?"

---

Professor Aldo Musacchio and Stephen J. Goldstein (MBA 2011) prepared this case. HBS cases are developed solely as the basis for class discussion. Cases are not intended to serve as endorsements, sources of primary data, or illustrations of effective or ineffective management.

Copyright © 2011, 2012 President and Fellows of Harvard College. To order copies or request permission to reproduce materials, call 1-800-545-7685, write Harvard Business School Publishing, Boston, MA 02163, or go to [www.hbsp.harvard.edu/educators](http://www.hbsp.harvard.edu/educators). This publication may not be digitized, photocopied, or otherwise reproduced, posted, or transmitted, without the permission of Harvard Business School.

## Silver Lake Overview

According to Lerner, Hardyman, and Leamon, “the private equity industry, in its initial decades, was a predominantly American phenomenon.”<sup>1</sup> The buyout space experienced a dramatic boom from 2004-2007, as inexpensive, covenant-light debt became available in record quantities. Market valuations, fueled by spikes in available financing and equity capital, increased substantially. With the backdrop of fast-paced, sustained economic expansion, the flow of PE deals increased markedly and placed upward pressure on valuations.

In the majority of transactions, PE firms purchased portions of companies or entire companies, typically acquiring publicly traded enterprises and “taking them private.” Firms often took an active role in managing the operations of their portfolio companies. While all firms added value to their portfolio companies through improved governance, improved profitability, top-line growth, and strategic M&A, among other factors, some firms, more than others, relied on market timing and the concept of “multiple expansion” to drive returns. In a market of rising valuations, this strategy – like that of buying homes during a housing boom in which easy refinancing existed – was quite successful in driving high returns for Limited Partners (LPs). However, according to Lerner, Hardyman, and Leamon, a great deal of PE firms’ returns originated from financial engineering by taking publicly traded firms private and the ability to adroitly structure debt to maximize equity returns and free cash flow.<sup>2</sup>

The Silver Lake concept, with its focus on investing in mature technology companies, was the product of an initial vision of David Roux and Glenn Hutchins (HBS ’83, HLS ’83) in 1994. Later on, in 1998, Roux, a senior executive at Oracle, and Jim Davidson, a senior investment banker at Hambrecht & Quist, began discussing the state of the market and opportunities to capture value with a new investment strategy. Roux and Davidson began chatting with Roger McNamee, a venture capitalist and hedge fund manager, about what they felt were broad valuation distortions in the technology industries at that time.<sup>3</sup> In the middle of the Internet bubble of the late 1990s, they felt that “if you were 25 years old, had a clever idea, and just graduated from a good school, there were a lot of people who would write you a check for five million bucks.” Yet they observed that “if you were a 50-year old CEO of a billion-dollar global technology company with thousands of employees and a couple hundred million dollars of profits, and you were looking for acquisition finance or wanted to go private, there was no natural partner for you.” Finally, they noticed that “most of the large private equity firms didn’t do tech.”

Roux, Hutchins, Davison, and McNamee created Silver Lake in 1998 to fill in this gap, believing that the lack of PE funding did not make sense: “It was somewhat astounding to us, because the technology sector represented 10% of U.S. GDP and probably 15% to 20% of the S&P 500, in terms of total market capitalization.” Silver Lake’s founders believed that relying on both operational and financial expertise would produce superior returns. To put this principle into practice, Silver Lake deal teams always included financial and operating professionals, consistent with the firm’s belief that improving operations was critical to earning high returns.

Despite some differences in philosophy from other PE firms, Silver Lake’s fee structure mirrored that of its peers. The firm typically charged LPs a management fee of 1.5% of committed capital. All profits were split between LPs, who earned 80%, and the GP, who earned 20%, provided the GP met an 8% return hurdle. As of the summer of 2011, Silver Lake had roughly 196 employees, half of whom were investment professionals.

### *Silver Lake in Brazil*

Silver Lake had made two investments focused on Brazil as of 2011 with its September 2010 acquisition of a minority stake in Locaweb Serviços de Internet S.A. (Locaweb), the market leader in Brazilian webhosting<sup>4</sup> and its April 2011 acquisition of Smart Modular technologies, a leading independent manufacturer of memory modules and solid-state storage products. Shortly thereafter, David Roux told Brazil's *Valor Econômico* that Brazil had become the firm's "highest priority;" however, it was unclear whether and how Roux and his partners at Silver Lake would make the emerging economy such an important area for investment, and whether Brazil really should have been the firm's "highest priority" given the country's history and other opportunities for Silver Lake. Roux elaborated:

We are unlike most other private equity firms that built their businesses on the back of their deal-making prowess, financial engineering, and access to capital. In contrast, our core value proposition is that we understand the industrial sectors and markets where we compete, and that is not a local vs. international business. At the end of the day, how semiconductors are built and how IT Services impact the business environment are global phenomena. Brazil is the same as Japan, the U.S., and the rest of the world in that regard.

Whereas other firms often cited their global brands as key sources of value, Roux felt that "the idea that a global firm can come to XYZ country and help companies integrate into the world economy is at best, naïve, and at worst, condescending."

When thinking about the challenges associated with identifying new markets and strategies for deploying capital there, Roux explained:

The job for us is not that hard. It is not as if we sit with a big map of the world and a linear program plugging in factors like GDP growth, political stability, equity market returns, etc., to find our next country of focus. Our job is much easier. The first 10 years weren't hard: we looked at the most important tech markets in the world, which were easy to identify, such as the U.S., Europe, Japan, and China. Now we follow a similar strategy, and because global markets, like technology, tend to be highly integrated, we have a good idea of where to go next.

### **Country Background: A Long History of Boom and Bust Cycles**

Since the time of Portuguese colonization, Brazil was an important commodity exporter whose economy had been closely linked to the international cycles of economic activity. In the sixteenth century, it exported Brazilian wood, and then became the leading exporter of sugar from the sixteenth to the eighteenth centuries. By the early nineteenth century, a rapid fall in the price of sugar led to a decline in the economic prosperity that the northeast of Brazil had enjoyed for centuries. Then, in the late nineteenth and early twentieth centuries, producers in the southeast and north of Brazil became the leading exporters of rubber and coffee in the world. The rubber boom lasted only a few years, and prices collapsed after 1910. The coffee boom lasted more than 50 years and helped to finance the industrialization of major southeastern cities, such as São Paulo and Rio de Janeiro.

Brazil's reliance on commodity exports led the country's economy to follow the booms and busts of the international economy until as early as the 1920s. When commodity prices were high, foreign investors poured money into the country to take advantage of the prospects available there. The rubber and coffee booms before 1914 created a boom in government and railway bonds traded in

London and Rio de Janeiro. Enthusiastic investors also sparked a boom in industrial stocks in the nascent São Paulo exchange. Yet these booms were short lived, and when World War I began, capital flows to Brazil and commodity prices fell rapidly.

After a relatively mild recession in the 1930s, the Brazilian economy gradually began a period of faster growth under an array of democratic and autocratic regimes. After a short return to democracy (1945–1964), a military coup, supported by right-wing conservative groups, wrested control of the Brazilian government in 1964. The military regime and its team of “technocrats” promoted industrialization by protecting domestic industries from foreign competition and then introduced a radical plan to lower inflation, which had reached 140% per year in the early 1960s. Moreover, the military government enacted reforms to increase forced savings, liberalize financial markets, and channel subsidized loans to domestic industries as a way to increase capital formation. This program was later called the “Brazilian miracle” because of the high rates of growth achieved between 1968 and 1976. The rapid mobilization of labor from agriculture to manufacturing and services, together with an aggressive program of capital accumulation financed by the government’s development bank (BNDES), propelled Brazil to grow at over 10% per year (a process of growth similar to that observed in China and India in the 1990s and 2000s).

Although the military government promoted rapid growth, it also eliminated political rights, including the party system and the direct election of presidents and governors, and it tortured and kidnapped political dissidents. Ultimately the Brazilian miracle ended in disaster. The increase in investment was financed largely with excessive foreign borrowing, and when interest rates in the U.S. spiked in 1981, Brazil suspended payments on its foreign debt. This debt default triggered a major financial crisis, the fall of the military regime, and the beginning of democracy in 1985.

The enthusiasm behind the new democratic regime was accompanied by severe economic difficulties. The Constitution of 1988 introduced many new earmarked expenses for which there were insufficient revenues, which prompted the federal government and the Central Bank to resort to an expansionary monetary policy to cover the new expenditures, and a increase in inflation also meant higher deficits, given that government bonds were inflation indexed. Moreover, in Brazil, all contracts and balance sheets were indexed to inflation, a practice that also pushed prices into an upward spiral. By 1989, inflation in Brazil reached over 1,000% per year.

The hyperinflation episode aggravated Brazil’s social situation—roughly 35% of the population was considered poor. In 1990, the *Gini coefficient* went above 0.6 for the first time since it was first measured in the 1960s. Amid a wave of social protests, Congress impeached President Fernando Collor (1989–1992) on corruption charges in 1992 and left Vice President Itamar Franco to handle the crisis. President Franco was unable to reduce inflation until he appointed Fernando Henrique Cardoso as finance minister. Cardoso rapidly mobilized a team of recognized economists and introduced the *Plano Real* (“Real Plan”) to deal with inflation. When Cardoso unveiled his plan in 1994, annual inflation was on the order of 2,500%. His plan balanced the budget, transitioned the country to a new currency, the *real*, and fixed the exchange rate. The Central Bank raised interest rates high enough to drive inflation down from 2,500% in 1993 to 16% in 1996.<sup>5</sup>

Thanks to the success of the *Plano Real*, Cardoso became president of Brazil for two consecutive terms, twice beating Luis Inacio “Lula” da Silva, the candidate from the leftist Workers Party (*PT* in Portuguese). Cardoso privatized major state-owned companies, began the liberalization of financial markets, and introduced new social programs to reduce poverty. In only a few years, Cardoso’s cash-transfer program reduced poverty from 35% to 28% of the population. Inequality, however, decreased only slightly.<sup>6</sup>

Following the success of the *Plano Real*, many international PE funds made their first major forays into Brazil. Excited by a perceived shift in country risk and toward economic stability, some international funds (e.g., Warburg Pincus, TPG) opened offices in the country; others executed deals, as Álvaro Gonçalves (managing partner of Grupo Stratus and former chairman of the Brazilian Private Equity and Venture Capital Association (ABVCAP)) put it, “flying back and forth from New York.”<sup>7</sup> Yet when the Asian crisis hit in 1997 and the Russian crisis in 1998, several PE funds pulled out of many emerging markets, including Brazil. The Brazilian stock market fell by over one-third, and foreign reserves plummeted from \$60 to \$35 billion as the country struggled to maintain its exchange rate peg. In 1999, the government was forced to allow the *real* to float as part of an IMF stabilization plan.

The 1999 depreciation of the exchange rate provided a major boost to Brazil’s exports, which went from 7% of GDP in 1998 to 10% in 1999, and to 13% by 2001. After that, the Central Bank, under the direction of Armínio Fraga and with a new program of inflation targeting, kept inflation at bay.<sup>8</sup>

Yet as recently as 2002, foreign investors were again skeptical of Brazil’s ability to avoid disaster. Fears were fueled by the prospect of a leftist government under Lula and the fact that most government debt was indexed to the exchange rate (public debt to GDP was over 50%). In 2002, before the election of Lula, George Soros publicly stated, “Brazil [will] face economic meltdown if it elect[s] Lula.”<sup>9</sup> Foreign investors saw no guarantee that Lula would not default on foreign debt, as Argentina recently had, since Lula had defended defaulting during his previous campaigns. Brazil’s country risk, measured in basis points, went from 700 to 2,000 in a matter of months.

Despite this, Lula and the *PT* handily won the 2002 election in the second round and then won again in 2006 with a sweeping victory. To ensure support from the business community, Lula surprised many of his followers by acting with restraint. Rather than focus single-mindedly on solving the problem of inequality, he based his strategy on three pillars: macroeconomic stability, wealth redistribution, and strong export promotion.

## Structural Changes in Brazil (2002–2011)

Silver Lake and many other foreign PE firms were attracted by the prospect that the Brazilian boom after 2002 was different. Juan Carlos Felix, managing director of Carlyle in Brazil, summarized: “Prior to 2002, the major risk of operating in Brazil was political volatility. Now, the political question is off the table. Lula behaved well and the possibility for a new politician to rock the boat is virtually nonexistent.”<sup>10</sup> The incredible uncertainty surrounding Lula’s election had dissipated, and the transition of power to Dilma Rousseff further cemented the resilience of the political system.

### *Rule of Law*

For Armínio Fraga, former president of the Central Bank of Brazil and chairman and chief investment officer of Gávea Investimentos, “[Brazil] is likely the only BRIC country in which you can sue the government and win. Equally important is the fact that if you win, you can actually get paid and not be the victim of government violence in one form or another.”<sup>11</sup> (See **Exhibit 4**.) Foreign investors in Brazil were, on the whole, excited by the judiciary’s ability to fairly adjudicate claims and by the recent predominance of arbitration as a viable means for solving disputes between shareholders or between PE firms and other portfolio company owners. According to Marcelo Hallack, partner of BTG Pactual, “10–15 years ago you could add an arbitration clause to a contract, but often it was not upheld by the courts. Since the early 2000s, arbitration has been recognized by Brazilian courts as a legitimate means to resolve conflicts.”<sup>12</sup> While this change was significant for



Brazil, many still believed the judicial system was “inefficient,” and, unfortunately for most, arbitration was out of reach as a means to bypass that inefficiency. According to the World Bank, of 183 countries, Brazil ranked 74<sup>th</sup> in “protecting investors” and 98<sup>th</sup> in “enforcing contracts.”<sup>13</sup> Furthermore, enforcing a contract through the legal system would take, on average, 616 days (vs. 300 in the U.S.) and would require 45 procedures (vs. 32 in the U.S.), with an overall recovery rate when closing a business of 17.1% (vs. 81.5% in the U.S.).<sup>14</sup>

Some foreigners worried that the judicial system was biased against foreigners. However, Marcelo Naigeborin, managing director in charge of Investment Banking for Morgan Stanley Brazil, believed that those fears were unfounded: “Brazilians finally realized that, in terms of jurisprudence, they needed to be rational and fair to the rest of the world; if not, then we might not have a second chance in establishing ourselves as a credible player in the global arena.”<sup>15</sup>

### *Macroeconomic Stability*

Lula’s strategy for macroeconomic stability was based on price stability, fiscal responsibility, and a reduction of the government’s external vulnerabilities. Lula altered investors’ expectations by choosing relatively moderate ministers of finance, and by selecting Henrique Meirelles (HBS AMP ’84), a former president of Global Banking for FleetBoston, as president of the Central Bank.

Lula’s team in the Ministry of Finance reorganized the government finances in a way that reassured international investors. For instance, Minister Antonio Palocci (2002–2006) increased the target for the primary budget surplus and swapped short-term dollar-linked debt for medium- and long-term debt denominated in domestic currency. Between 2003 and 2008, Fitch and S&P, two bond-rating agencies, gradually upgraded Brazil from B+ to investment grade.<sup>16</sup>

### *Wealth Redistribution and the Rise of the Middle Class*

The second pillar of Lula’s development strategy was the reduction of poverty and inequality. His redistributive policies were based on a series of programs of cash transfers to the poor and a rapid increase of the national minimum wage. The minimum wage went from less than R\$240 per month in 2003 to above R\$350 in 2006 (see **Exhibits 5a and 5b**). This policy not only improved the purchasing power of poor households but also increased the burden of the social security program for the government. Moreover, the change in wages was not matched by increases in productivity.

Lula, for instance, expanded the *Bolsa Escola* (School Grant) program of conditional cash transfers and renamed it *Bolsa Família* (Family Grant). Under this program the government provided families earning between US\$42 and US\$83 per month a cash transfer that varied between US\$12 and US\$118, depending on income level and the number of children. In exchange, the beneficiaries of this program committed to keeping their children in school and receiving regular medical visits and vaccinations.

Between 1995 and 2008, GDP per capita (PPP) increased from just below \$6,500 to just below \$10,500. At the same time, the Gini coefficient fell from nearly 0.6 to roughly 0.53, indicating that while the country was becoming more wealthy on a per capita basis, income inequality was also falling at the same time.<sup>17</sup> As a result, over 30 million Brazilians entered the middle class from 2003–2009<sup>18</sup> and 18 million more were projected to enter it by 2014.<sup>19</sup> Since 2004, household consumption had fueled a boom across most sectors of the economy, with a 2005–2010 average aggregate GDP year-over-year growth of roughly 5.4% with reasonably limited volatility.<sup>20</sup> As Henrique Alhante (HBS OPM 42), partner of JGP Global Gestão de Recursos Ltda., put it, “There is a whole new story. Consumption has structurally shifted up.”<sup>21</sup> (See **Exhibits 5a and 5b**.) In fact, most PE funds were focused on the growing consumer story, with Doug Scherrer, vice president of General Atlantic’s São

Paulo office, underscoring its importance: “What gets us excited is the local domestic consumer market.”<sup>22</sup>

In addition to shifting of the economic pyramid, the demographic pyramid looked even more favorable. Brazil, relative to all developed and most developing economies, was a young country with a “median age of 29 years old, versus Europe at 40 and North America at 37.”<sup>23</sup> By 2020, the demographic distribution would provide the economy with 15 million additional workers. In addition to workers, more Brazilian baby boomers would become what experts had termed “prime savers,” or those members of society with the highest propensity to save a larger portion of their income” (see **Exhibit 6**).<sup>24</sup> These savers were critical not only because of the stability they provided the economy but also because of the role their savings played in financing Brazil’s staggering need for investment.<sup>25</sup>

### *Export Promotion*

The government’s efforts to open trade with China and other South American partners aided the rapid increase in the demand for Brazilian commodities. In dollar terms, Brazil’s exports of goods went from \$73 billion in 2003 to \$210 billion in 2010, a CAGR of 16% per annum (see **Exhibit 3**). China also became Brazil’s main trading partner in 2009 and the main buyer of Brazilian iron ore, soy, and tobacco. Moreover, in 2011, China became the largest source of FDI to Brazil.<sup>26</sup>

Chinese demand for commodities changed Brazil’s export profile. Iron ore, petroleum, soy, sugar, and poultry became the largest exports, demoting airplanes, automobiles, and electronics. Despite the sustained improvement in Brazil’s external profile, some feared that the boom in commodity exports could lead to the so-called “Dutch disease,” or an appreciation of nominal and real exchange rates to the point where commodities displace manufactured exports and hurt industries outside of the natural resources sectors.

### **Reasons for Concern: “Buyer Beware”**

Structural changes in Brazil provided David Roux with enough reasons to be optimistic. “Over 20 years, Brazil will surely manage rationally through the cycle. The country simply cannot afford not to. Brazil will not be like Argentina.” Yet he was also aware that he had to consider the possible downsides of doing business in Brazil.

Jes Staley, CEO of JP Morgan Investment Banking, summarized his views on investing in Brazil: “If I had to give advice to a foreigner going into Brazil, it would be ‘buyer beware’ because the locals know Brazil, and the foreigners don’t. It is very easy to get enchanted by the optimism and lose your shirt.”<sup>27</sup> Gabriel Felzenszwalb (HBS ‘07) and Pedro Quintella (HBS ‘08), both principals at Vinci Partners, concurred, stressing, “Brazil is not for beginners.”<sup>28</sup> For instance, following the free floatation of the *real* in 1999, the resultant economic downturn and collapse in Brazilian valuations made existing PE investments in the country virtually worthless, particularly in U.S. dollar terms. While it was clear that the macroeconomic situation in Brazil had impacted these investments, some local players, including Gonçalves, believed that foreign firms blamed Brazil unfairly without questioning the foreign firms’ own processes or investment decisions. Gonçalves explained: “in the 1990s, some international PE funds failed and blamed Brazil when they should have blamed themselves for not doing proper diligence.”

**Slower long-term growth** As Gávea’s Fraga put it bluntly in 2011, “we are not going to grow at 7% . . . that is just a recovery year number. We are a 4% economy, which is a miracle in light of our

19% of GDP rate of investment and an education system that is improving at a slow pace.”<sup>29</sup> Jorge Gerdau Johannpeter explained: “with our level of savings, it is hard to grow above 5% per year . . . the problem is cultural – when you grow at 2.5% per year things work themselves out [but] to grow at 5% you need to plan for the next 10 years. We do not have the capacity to plan that far ahead.”<sup>30</sup>

**Insufficient capital formation and poor infrastructure** Fraga warned that “Brazil’s infrastructure is in terrible shape, and the country isn’t saving and investing enough.”<sup>31</sup> Marcelo de Paiva Abreu, an economist at the Catholic University of Rio de Janeiro, argued that infrastructure deficiencies were holding Brazil back: “Road networks, airports, ports, and everything else is congested.”<sup>32</sup> André Jakurski (HBS ’73), founding partner of JGP Global Gestão de Recursos Ltda., was concerned that “we are very incompetent in implementing projects. In the same span of time, the Chinese could have completed 1,000 more things. Here, nothing gets done. If it’s not private, then nothing gets done.”<sup>33</sup> Fraga offered a similar view: “Lula lowered the real and perceived risk of a catastrophic political event. However, it is frustrating to look at other development cases (e.g., Chile, Indonesia) in which a clear reduction in political risk resulted in a jump in investment. That did not happen here. Instead, the government resorted to pumping credit and driving demand.”<sup>34</sup>

**Business environment** The challenges that Brazil faced reached far beyond its lack of investment and 4% growth. According to the World Bank, Brazil ranked 129<sup>th</sup> in its study of “Ease of Doing Business,” 138<sup>th</sup> in “Employing Workers,” and 150<sup>th</sup> in “Paying Taxes.” These statistics were far worse than those of Brazil’s peers and highlighted that much additional work needed to be done to strengthen the economy. The Brazilian tax burden was among the highest in the world, with total taxes of roughly 35% of GDP and government spending (aggregating federal, state, and municipal) above 35%, thus making the government a negative saver.<sup>35</sup> Alexandre Behring (HBS ’95), managing partner of 3G Capital, summarized the situation: “For an emerging market, the taxes in Brazil are very high, far higher than in Mexico, for instance. A tax rate in the high 30s limits how fast Brazil can grow without inflation, and it is structurally hard to grow very fast with a government that heavy.”<sup>36</sup>

**Labor market** Tight labor markets challenged every business in Brazil. Eduardo Mufarej, managing partner of Tarpon Investimentos, noted that for the first time in recent history, “there has been an adjustment, and it is now swinging from an employers’ to an employees’ market. Companies were used to underpaying.”<sup>37</sup> However, this lack of available talent impacted all levels of most organizations, not only the C-level managers with which most PE funds typically had direct contact. Cyrela, Brazil’s second largest homebuilder, slashed its 2011 profit guidance because of rising labor and other costs, citing high pressure on skilled and unskilled wages through 2015. According to Cyrela, “workers in the sector are demanding double-digit pay increases for this year,”<sup>38</sup> and, unfortunately for many employers, this trend was not unique to homebuilding. *Exame*, a business magazine, calculated that there was a shortage of 8 million professionals in 2011.<sup>39</sup>

**Strong real** On July 28, 2011, *The Economist*, referencing a “beefed-up” purchasing-power-parity-adjusted “Big Mac index,” commented, “the Brazilian *Real* is the most overvalued currency in the world.”<sup>40</sup> However, most saw no end in sight to the overvaluation and did not view the current levels as a deterrent to investing. In order to stop the appreciation of the *real* in 2011, the government imposed capital controls to deter short-term capital from entering (e.g., by increasing taxes on the purchase of government bonds). Yet the government would likely face challenges implementing stricter controls to prevent short-term capital inflows, since the country needed foreign savings to finance investment. Moreover, the central bank could not lower interest rates to scare investors away because such an action would generate rapid price increases in an already inflationary environment. According to Novaes Fernandes, “with regard to the currency, the discussion is not just whether it is over or undervalued – we focus on volatility and a history of stability. Therefore, we feel comfortable



at 2011 levels.” Silver Lake was not alone in its thinking as foreign direct investment inflows hit record levels in the first semester of 2011, while hedging against a sudden movement up or down of the *real* became too expensive. Therefore, despite widespread agreement that the currency should devalue, in the absence of a trigger, investors felt compelled to push forward with their activities in Brazil.

**Return of inflation** During the two Lula administrations, the Brazilian Central Bank kept inflation under control by sticking to its inflation target, thus managing to reduce interest rates gradually over time. However, in 2011, at the start of Dilma Rousseff’s first term in office, inflation expectations for 2011 reached as high as 6.31%,<sup>41</sup> nearly breaking the statutory maximum of 6.5%.

Three factors increased inflationary pressures during boom periods in Brazil. First, a tight job market and government-mandated increases of the minimum wage further pushed wages up rapidly (see **Exhibit 2**). Second, with the number of earmarked expenditures included in the Constitution of 1988, fiscal policy in Brazil was highly pro-cyclical. Third, BNDES increased the amount of loans rapidly in the second Lula term, with total loans in 2010 reaching almost \$100 billion, an amount greater than all loans disbursed by the World Bank over the same period.

Moreover, it was not clear how much the Brazilian Central Bank and its governor, Alexandre Tombini, were committed to reining in inflation by raising interest rates because the Central Bank faced a dilemma when it came to monetary policy. Even though the Central Bank was charged with price stability, raising interest rates could have opened the spread between rates in the developed world and in Brazil, thus leading to large capital inflows seeking arbitrage opportunities (i.e., carry trade) and a further appreciation of the exchange rate (see **Exhibit 2**). The appreciation of the *real* since 2003 was so significant that the appreciation began to hurt Brazilian exporters. Thus, the Central Bank, in practice, ended up targeting inflation while trying to keep the exchange rate stable.

According to Felzenszwalb and Quintella of Vinci Partners, “Our nightmare scenario is inflation. Unlike inflation-indexed investments or bonds, both of which are common in Brazil given our long history of high inflation, equity investments are not inflation protected. Although inflation may boost earnings, it will likely erode multiples.”<sup>42</sup>

**Risk of a credit bubble** In early 2011 analysts began worrying that the expansion of private credit had reached dangerous levels in Brazil. In 2010, private credit to GDP reached 47% for the first time, and the average household debt-servicing-burden-to-income ratio reached 37% (from just over 20% in 2008).<sup>43</sup> Since the majority of household debt was in short-term loans, some market participants and credit rating agencies worried when defaults on 90-day loans spiked in 2011 at 6% of the total, and some forecasted that total defaults would reach 8% of loans by the end 2011.<sup>44</sup> JGP’s André Jakurski felt that given credit’s central role in Brazil’s emergence, this very cooling down might have its own negative impacts on the economy: “If credit were to slow down, then banks would stop refinancing loans, and we would see our own ‘extend and pretend’ scenario.”<sup>45</sup>

Yet according to Persio Arida, former president of the Central Bank of Brazil and managing partner and chairman of Asset Management at BTG Pactual, even if Brazil had a 47% credit-to-GDP ratio, it was much lower than that of Chile, at roughly 80%. He added, “Brazil has a long way to go in terms of credit growth. Our mortgage-to-GDP ratio is only 4%.”<sup>46</sup> Arida remained optimistic: “Debt service as a percentage of disposable income has always been high in Brazil. Remarkably, even if people made more money, they maintained the same ratio of debt service to disposable income. The debt burden looks high, but almost half of that burden is amortization, not interest payments.”<sup>47</sup> Another important element of financial deepening was the quality of banks’ loan books. According to Arida, recent developments, such as the emergence of payroll loans and new laws that simplified the

process by which banks could seize collateral on defaulted loans, led to enhancements in overall credit quality in Brazil.

**Fears of repeating the bust of the 1970s** For Armínio Fraga, the overall picture resembled the 1970s when Brazil experienced extraordinary growth followed by a “lost decade.” He recounted: “I see an orange flag; things resemble the ‘70s a bit, and, in the end, everything blew up. Inflation is lower now but is at the top of the target range, and the Current Account is in deficit despite phenomenal gains in trade. In fact, we have gotten away with excessive growth in domestic demand for longer than we should have because of the gains in the terms of trade.”<sup>48</sup> Fraga, in thinking about the macro situation, summarized with the following: “We have used up all of our slack on inflation, credit, government expenditure growth, and the balance of payments. The government will have a problem on its hands if it fails to address these issues.”<sup>49</sup> (See **Exhibit 3**.)

## Private Equity and the Excitement about Brazil

When thinking about the imperative to enter the Brazilian market, most players pointed to structural changes in traditional PE markets, the fundraising environment in Brazil, and structural changes in the Brazilian market as the critical drivers. (See **Exhibits 7 and 14**.) Thus, Roux and Silver Lake had to think carefully about these factors before deciding whether to enter Brazil or to continue doing deals from New York. Thus, Roux had to consider the following:

**Structural changes in traditional PE markets** In April, 2011, Blackstone’s president, Hamilton E. James (HBS ’75), was quoted as saying “corporate competition . . . has made the plain vanilla buyout pricey.”<sup>50</sup> In that environment, most large PE funds found themselves, as Martin Escobari (HBS ’98, Advent international managing director in Brazil) put it, operating in a “world without leverage and zero growth.”<sup>51</sup> Therefore, PE funds faced headwinds that would make it more difficult to earn the high returns that had attracted investors before 2011 (see **Exhibits 12 and 16**). These funds needed opportunities to boost returns while not dramatically decreasing the quality and increasing the risk of those returns. At the same time, GPs faced increasing demand to invest abroad, particularly in emerging markets. According to Ernst & Young, “driving the interest in emerging markets funds [was] the search for higher returns that [were] largely uncorrelated with the rest of LPs’ portfolios.”<sup>52</sup>

**Fundraising and PE returns in Brazil** Latin American-focused PE fundraising reached its peak in 2010, with Brazil receiving \$8.1 billion in committed capital. Given that backdrop, 2011 promised to be another record-breaking year with more than 50 funds seeking roughly \$19.5 billion of capital in aggregate. Brazil was undoubtedly receiving the lion’s share of attention and capital, drawing over 60% of total capital allocated to Latin America in 2010. At the same time, the average deal size in Brazil more than doubled between 2009 and 2010, increasing from \$19 to \$41million, with the number of deals valued above \$100 million doubling in concert. While foreign capital allocations continued to increase, Brazilian institutional investors, in an effort to increase returns in a lower-interest-rate environment, were, as Novaes Fernandes described, “increasingly interested in allocating capital to international PE funds, a trend we first saw develop in 2009 when the limit for offshore investing by Brazilian pension funds increased from 3% to 10%.”

In addition to benefitting from macroeconomic tailwinds, foreign firms witnessed many local firms, including Gávea, Tarpon, and GP, consistently earning high returns. For instance, according to the 2011 HBS Survey of Private Equity in Brazil, local firms targeted, on average, over 500 basis points of excess returns relative to their international peers.<sup>53</sup> Since inception in September 2006, and

as of Q4 2010, Tarpon Investimentos had earned over 247% dollar returns, net of fees, for its investors.<sup>54</sup> In 2010 alone, Tarpon returned nearly 50%. For GP Investimentos' investors, BRMalls generated an IRR of 47%, Hypermarcas an IRR of 58%, and BR Properties an IRR of 43%.<sup>55</sup>

**PE Funds migrating south en masse** With the exception of Advent, which entered Brazil in 1997, the overwhelming majority of funds doing business in Brazil did not arrive until 2007. AAI Global Equity, Actis International, DLJ South America Partners, HSBC Capital, General Atlantic (GA), and Carlyle all arrived in the years leading up to and including 2007. TPG made its first investment in 2008 by taking a minority stake in Azul Airlines and then partnered with Gávea in 2010 to acquire 12.5% of logistics operator Rumo. Warburg Pincus reestablished its presence in Brazil in 2009. In late 2010, Blackstone acquired 40% of Pátria Investimentos for \$200 million; Highbridge acquired 55% of Gávea for roughly \$270 million; and a consortium of GIC, CIC, and JC Flowers acquired 18% of BTG Pactual (for \$1.8 billion), a diversified financial services firm with a considerable PE arm.<sup>56</sup> 3i entered Brazil in 2011, and, according to the *Financial Times* in May 2011, "US-based private equity groups Kohlberg Kravis Roberts and TPG [were] looking to set up offices in Brazil as the industry increasingly [sought] to tap emerging markets for growth."<sup>57</sup>

These foreign players moved quickly, actively doing deals, many of which fell at the larger end of the spectrum in Brazil. According to data compiled from ThompsonOne Banker, international firms participated in over 80% of deals larger than \$100 million in 2009 and 100% in 2010, up from roughly 30% in 2008.<sup>58</sup> Foreign PE firms took part in buyouts of several of Brazil's sector-leading companies, including the largest tour operator, webhosting company, and the domestic public and OTC exchanges, to name a few. More broadly and beyond PE specifically, overall FDI increased annually on average by 18% from 2005–2010.<sup>59</sup>

**Sky-high valuations?** Since 2005, PE multiples on the Bovespa had trended up significantly. While Brazilian companies typically traded at a discount to their developed market peers, the gap had decreased significantly by 2011. Many public market investors began to apply U.S.-level multiples to value Brazilian companies, thus driving up valuations to levels that some, including Veronica Serra (HBS '97), founding partner of Pacific Investimentos, thought were overly bullish: "Foreign investors often make the mistake of applying U.S. multiples to Brazilian companies to arrive at their target valuations. They forget that Brazil is a different country with a whole different set of risks."<sup>60</sup> 3G's Alexandre Behring went into a bit more detail: "It is amazing how many people forget about the interest rate. They take the U.S. risk-free rate and add 100 basis points and go from there. They need to start with the Brazilian risk-free rate."<sup>61</sup> It was possible that the above "misperceptions" had bid up domestic valuations and resulted in lower aggregate returns on Brazilian equities.

However, it was unclear whether the surge in public market comparables had eliminated the opportunity for private market participants to acquire companies at attractive valuations. According to Eduardo Mufarej of Tarpon, "The public markets keep you honest. You would never pay more than a public market multiple in Brazil, particularly for a situation in which you don't acquire control."<sup>62</sup> And Fernando Borges, Carlyle's head of South America Buyouts, felt that with regard to exits, frothy public markets provided opportunities for attractive returns: "Brazil is not expensive at all. I would rather pay 6–8x EBITDA for a company growing 20%–30% per year with opportunities to improve margins, better governance, and the potential to exit via the public markets than pay 3–5x for companies 10 years ago."<sup>63</sup> (See **Exhibits 8, 9, 11 and 15.**) Antonio Bonchristiano, co-chairman and co-CEO of GP Investimentos and one of the "50 most influential people in Private Equity,"<sup>64</sup> summarized the situation: "There is no lack of opportunity at attractive valuations."<sup>65</sup>

On the other hand, despite the massive inflows of foreign investment into Brazil and a spike in investing activity Bovespa, Corrado Varoli, CEO of G5 Advisors, asserted that “Brazil is starved for capital.”<sup>66</sup> Carlos Piani, co-head of Private Equity at Vinci Partners, agreed: “There simply is not enough capital. The number-one source of financing in Brazil is internally-generated cash flows, and foreigners have a real role in bringing liquidity to the market.”<sup>67</sup> Varoli continued, “On the surface it may seem that PE deals are over-marketed and selling for high multiples, and there may be a view that there is a lot of capital chasing too few deals, but that is only on the surface and particularly only at the very high end of the market.”<sup>68</sup> Private market investors were increasingly focusing on opportunities to deploy capital below “the very high end of the market” and take advantage of the fact that, as Gonçalves described it, “There [were] not enough private equity players in Brazil.”<sup>69</sup> Given the backdrop of strong economic growth and favorable demographic and wealth-redistribution trends, it appeared as though private capital had an opportunity to earn above developed-market returns in Brazil. According to materials compiled by Grupo Stratus, PE fundraising in Brazil in 2009 totaled roughly 0.1% of GDP, well below the U.K. and U.S. level of 0.3%, thus implying that the market, relative to others, was not saturated with committed capital.<sup>70</sup>

In addition to insufficient capital, the Brazilian market possessed certain critical characteristics that made PE investing even more attractive. Stringent public market listing requirements, both from a compliance and absolute size perspective, made PE the ideal provider of capital because PE firms were capable of helping companies prepare for eventual IPOs. Furthermore, those firms willing to invest in consolidation plays could take advantage of the fact that Brazil suffered from a chronic scarcity of capital. “Many markets are still very much fragmented,” said Arida, “and, because of that fragmentation, economies of scale are a major driver of competitive advantage.”<sup>71</sup>

### *Reasons for Concern*

In addition to the challenges that foreign players faced in the past, entrants would have to cope with a constantly changing market that differed from more developed markets in five key areas: (1) absence of long-term, affordable leverage; (2) a strong cadre of sophisticated local incumbents; (3) prevalence of minority transactions; (4) consolidation as a key driver of returns; and (5) intrinsic growth far above developed-market levels. Given the disparities in the market relative to PE firms’ home countries and areas of recent expansion, what value proposition did foreign firms offer in Brazil? (See **Exhibit 13**.)

**Absence of long-term, affordable leverage** As Luca Molinari, managing director of the Warburg Pincus office in Brazil, put it, “Here, you want to be very careful about leveraging your companies. Because of memories of hyper-inflation (which are still fresh in people’s minds), infrastructure bottlenecks, and banking regulation complexities, Brazil has the highest real interest rates in the world. When a company has a 5% drop in revenues, the impact on profit is structurally much more severe than in the U.S. or Europe.”<sup>72</sup> Relative to the U.S. or Europe, where real rates hovered around zero and high-yield debt was priced accordingly, Brazil’s 12% risk free rate had created an environment in which the all-in cost of debt rapidly approached the cost of equity, often above 20%. Even if a PE deal were to include a long-term tranche of debt, the cost of that debt and the associated terms might have made that financing unattractive to PE investors. For the most part, debt in Brazil was short term, unlike in developed markets where fixed-rate subordinated debt and debt-like securities (e.g., high-yield bonds, notes, mezzanine debt) represented a significant portion of PE deal capital structures. “Long-term nominal bonds were not available in Brazilian domestic markets,” commented Arida. He continued: “with the exception of funding from the BNDES, only Brazilian Treasury-issued inflation-linked bonds existed in Brazil. However, while the BNDES offered long-term financing, that financing was conditioned by public policy priorities.”<sup>73</sup>



Independent of the high, variable rates on Brazilian debt, the amount of potential leverage available rarely exceeded 3.5x LTM EBITDA, with few PE sponsors able to secure financing at that level. Therefore, Gonçalves believed that “the skills required in Brazil are not financial engineering. They are, however, related to general management and operations.”<sup>74</sup> (See **Exhibit 10**.)

**Strong local incumbents** While the U.S. and European players were undoubtedly the largest globally, it was unclear whether their cachet resonated in Brazil. Veronica Serra put it plainly: “In Brazil, some of the largest foreign firms are not known. Often, trust, relationships and local presence are more valued and provide more access than the size of the firm’s bank account.”<sup>75</sup> According to Marcelo Hallack, “BTG Pactual’s local relationships and familiarity with the Brazilian context have enabled us to complete due diligence at a significantly faster pace than some of our foreign competitors. In some cases, and unlike many of our foreign competitors that ‘diligence’ companies for at least several months, we have been able to comfortably commit capital after several weeks of diligence.”<sup>76</sup> The quality of finance professionals in Brazil was, according to some, among the best in the world. Growing up in hyperinflationary environments, managers and bankers had to learn to deal with the realities of business economics that changed on a monthly, or even weekly, basis. According to Jes Staley (CEO of JP Morgan Investment Banking), “no one knows how to use a bond calculator like a Brazilian.”<sup>77</sup> More specifically in the case of PE, Felzenszwalb and Quintella described the situation as the following: “We have very sophisticated financial markets and the finance community here is very developed, so there are no low-hanging fruits that foreigners can grab easily.”<sup>78</sup>

According to Grupo Stratus, there were over 20 PE firms with local presences investing across all deal sizes and structures (e.g., minority, control). Some of these funds, such as GP Investimentos, Gávea Investimentos, Pátria Investimentos, like their global competitors, had both local and global cachet. However, it was the local reputation that was far more salient in the domestic market.

**Prevalence of minority transactions** Unlike prior periods in Brazil and the “LBO boom” in developed markets that were typically characterized by control investments, the market in Brazil had changed. The market had developed from one in which sponsors nearly always insisted on acquiring control, to one, according to Doug Scherrer of General Atlantic, with “a more varied scope of private equity, including opportunities for minority and venture capital investments.”<sup>79</sup> As the domestic capital markets and the *Novo Mercado* developed, Scherrer continued, “the pipeline of minority investments grew significantly, with a focus on entrepreneur-owned companies interested in having partners but unwilling to sell control.”<sup>80</sup> At the same time, many sponsors did not feel that the absence of control hindered their ability to operate effectively. Luca Molinari of Warburg Pincus provided an overview of the role of control: “In more developed markets, and especially in Europe, very often you need or are able to use leverage to attain your targeted returns because there is very little growth in many sectors in those markets. To use leverage effectively, though, you need control. However, in places like Brazil, you do have the benefit of organic growth given where the economy is in its development trajectory. Therefore, control or non-control becomes much more of a case-by-case decision, which is a function of how much influence you believe you would exercise in the strategic decision-making and how confident you are that you can eventually monetize your investment from a minority position.”<sup>81</sup>

In the absence of control, new skills, in addition to general management skills, became increasingly more important. In fact, “a lot of what we do involves soft skills,” explained Eduardo Mufarej of Tarpon.<sup>82</sup> Before making an investment, GPs spend a great deal of time, sometimes up to a decade, getting to know entrepreneurs and making sure those entrepreneurs can be trusted. “The deal was not going to happen until my wife met his wife,” recalled Carlyle’s Felix, “we all needed to know that we could work together.”<sup>83</sup> Unlike a control situation in which the sponsor acquired



complete discretion over all decisions, in the case of a minority position, the sponsor could find him/herself at the mercy of a controlling shareholder, a situation potentially uncomfortable for those who built their careers by buying control positions.

**Consolidation as a key driver of returns** Fragmentation, which was in large part a result of the “informality” of the Brazilian economy, led to subscale operations and opportunities to improve margins through consolidation. This trend dominated PE investment theses to the extent that, according to Bonchristiano, “Most things we are looking at today have a consolidation play. Until 1990, ours was a protected economy with no competition, which bred inefficiency.”<sup>84</sup>

While consolidation was not a new strategy for global PE players, the execution of such a strategy in Brazil seemed daunting. For the most part, the companies that were rolled up into the initial investment were typically small and relatively informal, with few having audited financials or many of the key governance and management practices familiar to most large sponsors. Yet, according to Hallack of BTG, “We have been able to acquire our platform companies at roughly 5–6x EBITDA and have created significant value through strategic acquisitions priced around 3–5x EBITDA. In one instance, we bought a large platform company and have executed 16 M&A deals for that company alone, many of which did not have fully audited financials at the time of acquisition.”<sup>85</sup>

**Intrinsic growth far above developed world levels** In many instances, global PE had been successful because of its ability to rationalize operations and drive efficiencies through cost cutting. In Brazil, focusing on cost cutting would not generate above-market returns. Rather, and according to the 2011 HBS Survey of Private Equity in Brazil, the market required more of a growth equity focus in which sponsors looked for companies that were doing well and that needed to grow (see **Exhibit 11**). As Bonchristiano put it, “a lot of our targets don’t need capital to grow at 20%–30% per year. They need capital to double their size, and that is where we come in.”<sup>86</sup> (See **Exhibit 11**.)

## Different Entry Strategies

In theory, Silver Lake did not need a local presence in order to invest successfully in Brazil. Looking at General Atlantic’s experience as a first case, the success of that investment was based initially on GA’s ability to diligence BM&F (the Brazilian Mercantile and Futures Exchange, which later merged with the Bovespa) from abroad and during trips to Brazil. BM&F had audited financials, was conveniently located in São Paulo, and its business was, by all considerations, “clean” and free of tax liabilities and any other legal complications that would have made the purchase difficult. Carlyle’s head of South America Buyouts, Fernando Borges, commented, “You don’t need local people to buy a publicly traded company . . . [however,] in Brazil we focus on proprietary deals and avoid auction processes . . . relying on our own sourcing capabilities.”<sup>87</sup> Yet as Silver Lake’s Novaes Fernandes commented, “When you first start to invest, it is very hard to source proprietary deals without having a local presence. At first, most of our pipeline came from the local banks.”

Silver Lake’s local cachet and access changed after the firm successfully executed the Locaweb transaction from New York. Novaes Fernandes explained: “Once you close a deal, the situation changes. We saw our pipeline strengthen, and the number of inbound, proprietary situations increased as local companies began reaching out because they understood the value we provided and that we were serious about Brazil.” Roux added a bit more color: “if you are the owner of a technology business that is large enough, you are going to want to talk to Silver Lake, which means that we will see 100% of the large, good opportunities no matter where our offices are located.” At the same time, Roux underscored the importance of building relationships with the most important

people in the local industry and spending time to fully understand the local regulatory market and restrictions.

In addition, Silver Lake viewed the local market differently than its more generalist investment peers. “The other firms might see the local firms as competitors, but we see them as our potential partners. They are not threatening in that Brazil is one of the biggest economies in the world and there are more deals than there is capital.” According to Novaes Fernandes, “the local players are almost all generalists, and they see technology developing into an important sector in Brazil. Therefore, we bring our industry expertise, and they bring their knowledge of Brazil. Throughout Silver Lake’s history, the majority of our deals have been partnerships of one form or another with most also sourced through proprietary channels.”

Despite being open to flexibility about deal structure and balanced about future macroeconomic prospects, Silver Lake had not been willing to engage in some uniquely Brazilian practices. For instance, the firm was not willing to transact with companies that did not have audited financials, nor would Silver Lake take the time to audit financials in the diligence process.

The Locaweb investment was made by Silver Lake Sumeru, the firm’s middle-market technology fund, which was headed by Ajay Shah. Locaweb was sourced by Kyle Ryland and others on the Sumeru team, with Ryland sitting on the company’s board of directors. Novaes Fernandes, a member of the Locaweb deal team, commented, “In Brazil we were fortunate in that our technology specialization was valued by local companies, as much or more than the valuation we and others ascribed to the business.”

In April 2011, Silver Lake Partners and Silver Lake Sumeru, led by Ken Hao and Ajay Shah, collaborated to sign a definitive agreement to acquire Smart Modular Technologies, a leading independent manufacturer of memory modules and solid-state storage products. The company was headquartered in Newark, California, but had significant operations in Brazil, and approximately 70% of the company’s EBITDA was generated in Brazil. Despite Silver Lake’s moves in Brazil, several Silver Lake competitors seemed more cautious. Bain Capital, KKR, TPG, Apollo, and many others had not yet completed a proprietary deal.

In the scheme of entry strategies, establishing a local office was quite possibly the riskiest option. This option was risky no matter how it was structured because the GPs of a fund needed to commit capital and, more importantly, their time on a venture that had no guarantee of success. Given the above factors, it seemed as though the odds might have been against foreign players. However, given the global PE fundraising cycle and the need to diversify, Brazil appeared too large to ignore.

In this effort to establish a local presence, the international player had four options: start a team with expatriates, acquire local talent from the start, hire a rainmaker, or partner with a local firm. (For examples of such strategies, see **Appendixes A-D**.)

## The Brazilian Technology Market

Many of the same characteristics of the U.S. technology market that Silver Lake’s founders identified in the 1990s were also true of the Brazilian market in 2011. The technology sector globally was growing 4–5x faster than global GDP, but PE continued to under-allocate capital outside of the U.S., and in Brazil to an even larger extent. The Brazilian IT market grew at a 15% CAGR from 2008 through 2009, and IT spending reached 9.6% of GDP in 2010 (see **Exhibit 17**). When thinking about the Brazilian technology market, Silver Lake broke the space into three main segments: Internet and

consumer technology, core technology (e.g., semiconductors, hardware and software), and IT outsourcing and payments processing.

A major driving force for all segments was the macroeconomic boost from a growing middle class, which began to demand more products and better products at attractive prices. Novaes Fernandes summarized Silver Lake's view on the market: "When you have an overall market that is developing, the tech sector typically opens up in lockstep with the overall economy, with Internet, mobile telephony, etc., representing the first focus areas. Once local semiconductor and hardware/software markets develop, there is a potential for a technology market with domestic demand that is long-term sustainable." According to data compiled by IDC, in the second quarter of 2011, Brazil ranked as the third-largest market for computers in the world.

For Silver Lake, the Brazilian market, according to Novaes Fernandes, was particularly interesting because "aside from very favorable macroeconomic and demographic factors, the push toward formalization in the economy has led to, and will create, further development of the local technology sector. As the need for recordkeeping, often by the government, increases markedly, so, too, will the need for locally produced and tailored hardware and software solutions." In addition to this growth profile, "in each of the last several years, Brazil ran a growing IT trade deficit that exceeded \$10 billion. In response, the government stated its objective of avoiding such technology deficits going forward. However, given current capacity, it was unclear how the local market could satisfy a deficit that some predicted would top \$50 billion in 2020" (see **Exhibit 18**). To achieve the government's goals, meaningful structural changes needed to occur, and the government had already begun to provide tax relief and trade protection, both of which successfully reduced the price of tablet computers in Brazil by 36% in 2011.

As a result of these changes, foreign companies began to focus on Brazil: for instance, Foxconn was expected to invest \$12 billion in Brazil from 2011–2016 to build a tech center near São Paulo and to manufacture, among other products, Apple's iPad 2 and iPad 3 in Brazil.

## Decision Point Revisited

For the leaders of Silver Lake, the decisions of whether to push forward with investing in Brazil, and with what strategy, still loomed. Roux thought to himself, "We need a Silver Lake professional . . . someone who feels passionate about it . . . wildly excited . . . . We need to be confident that we can build a great local team, and we need to be confident that we can be as good or better in Brazil than we are elsewhere." Unlike some other funds, Silver Lake was not focused on finding a local rainmaker from an investment bank: "the idea that you need to know someone for 30 years to trust them enough to invest with them is a false God." Being first, Roux commented, meant nothing if your firm was not in the deal flow and meeting companies: "Spending your time having *cafezinhos* on the beaches of Rio does not mean you are better off than if you were in New York."

For Silver Lake, it seemed as though Brazil would be a critical component in its continued quest to be the best technology investor in the world. Yet what form that quest would take was still uncertain, and it remained to be seen whether entering Brazil, at all, would turn out to be as successful a move as Silver Lake hoped. According to 3G's Behring in 2011, whose firm and key investors (representing some of the most successful in Brazil's history) had recently completed purchases of U.S. firms Anheuser Busch and Burger King, "the risk-reward tradeoff seems skewed to doing deals in the U.S." If prominent Brazilians were focusing on the U.S., did it make sense for U.S. players to focus on Brazil?

## APPENDIXES A-D: STRATEGY EXAMPLES

### *A. General Atlantic: Going for Growth (2007) – Lead with Investments, Follow with a Local Team*

General Atlantic (GA), the world's leading growth equity investor, made its foray into Brazil in 2007 following its investment in the Brazilian Mercantile and Futures Exchange (BM&F). This investment was of critical importance to GA since it represented the largest total equity investment in the firm's 31-year history. Leveraging its U.S.-based team that executed the investment, GA sent Doug Scherrer, an investment professional, to start a local office in São Paulo. He explained: "I was only supposed to stay here for six months, but it has been over three years and the office has grown dramatically" to include a mix of GA expatriates and seasoned local professionals and advisors. For GA, the decision to have expatriates in the office "depended a lot on the structure of the firm. If there is one global capital pool, then it makes a lot of sense to have a transplant at first who can leverage the resources of the home office." In the end, he said, "I believe there is a very human element of trust that is critical to starting a new investment office that can only come with having worked face-to-face with the U.S.-based partners." At the same time, convincing an investment committee in New York that a deal in Brazil is worth the firm's capital was not always the easiest task. "To bring everyone on board, we have an industry or sector expert from the U.S. as part of every deal team, and we try to get as many people meeting the company as possible. Often, the number of GA people that meet the company is in the double digits." With strong support from the firm's leadership and recognition across GA of the opportunity set in Brazil, Scherrer's colleagues from the firm's New York office were frequent visitors and played a key role in establishing the firm's presence in the country. On the other hand, dependence on input from abroad could have made a non-Brazilian investor less nimble and unable to respond quickly to emerging opportunities. Despite GA's integrated process, Scherrer said, "Investment Committee members must evaluate opportunities across regions and on a global basis, which means we really have to be that much more convincing on the more nuanced, Brazil-specific opportunities and challenges."<sup>88</sup> Arida (of BTG Pactual) cautioned, "Even if you were to hire locals, it would be difficult for a non-Brazilian Investment Committee to decide on idiosyncratic aspects, particularly those related to liabilities, of Private Equity investments in Brazil."<sup>89</sup>

In this context and despite apparent challenges, GA's experience had been a great success. BM&F, Grupo Qualicorp, and MercadoLibre had increased significantly in value and contributed positively to the firm's overall performance. The firm also recently completed investments in Peixe Urbano and Linx in 2011. Given this strong track record, GA was committed to the region and to maintaining a strong presence there in the future.

### *B. Carlyle Group: Going Global, Again (2007) – A Local Team*

According to its website, "Carlyle's approach in South America mirrors its method throughout the world: field a team of proven local investment professionals with intimate knowledge of the region and leverage the Carlyle platform, which features a remarkable global network, industrial expertise and operational know-how." Carlyle, the largest global PE firm with roughly \$100 billion of capital and offices in 19 countries, was the largest global PE firm with its own local presence as of 2011. Having executed three very large deals and committing nearly \$1 billion of capital in roughly three years, Carlyle established itself as a major player in Brazil capable of doing the largest scale deals in the region. With regard to its approach to working with portfolio company management teams, Carlyle's process "follows our global model. Across markets, management teams retain stakes in our

invested companies; however, in Brazil, we typically prefer that original shareholders/founders control roughly 30% of each company, which is usually higher than in other areas of the world.” With nine professionals as of 2011, Carlyle seemed poised to grow further, particularly given its relationship with Banco do Brasil and the \$1 billion of capital that Carlyle had raised for its buyout activities in Brazil.

Establishing itself as the leader in large buyouts, Carlyle created a niche that other international firms likely coveted. For investors with large global funds, many small to mid-sized deals were unattractive from an absolute returns perspective since even a very high return on a small amount of capital would not justify the effort required to make an investment, particularly given the lengthy diligence process in Brazil. However, given the state of the Brazilian corporate universe in 2011 and company characteristics, the supply of companies at the scale of CVC and Grupo Qualicorp (two of Carlyle’s recent investments) was limited, with Grupo Stratus estimating that fewer than 3,000 such companies existed in Brazil, or less than 0.1% of the total.<sup>90</sup> While they were a pioneer, Carlyle may have invited unwanted competition from its foreign peers, competition that had already begun to drive up prices. Despite emerging competition, Fernando Borges was bullish given the size and depth of the team he had assembled: “KKR or TPG without a local presence or a local partner would not have bought CVC. In fact, they could not have . . . they needed to have a local team.”<sup>91</sup>

Like GA, Carlyle was off to a strong start. According to *Exame*, Carlyle had planned to sell a 25% stake in CVC in September of 2011.<sup>92</sup> The magazine reported that Carlyle intended to generate roughly \$1 billion from the offering. Given that Carlyle paid less than \$250 million for a 63.6% stake in CVC in January, 2010, it was likely that Carlyle would realize a sizeable absolute and relative return despite a relatively short investment life.

### *C. Warburg Pincus (2009) – Second Bite at the Caju<sup>1</sup>*

Warburg Pincus, like other well-known PE firms, entered the Brazilian market in the 1990s to take advantage of what seemed like a booming market. However, global and domestic financial crises and other significant challenges in Brazil led Warburg Pincus to close its office. According to Molinari of Warburg Pincus, “For us it was not the case of negative financial performance in absolute terms, but rather the overall impact of our Brazilian business, in the context of the size of the firm. Plus, we were in a bubble environment with a very low level of visibility on the macro outlook.” From this experience, however, “We learned that we needed to be patient and not get too excited by short-term market movements, either way. Consistent with our experience in other emerging markets, we understand that we must have a longer-term perspective and a team structure that allows us to address market opportunities in the best possible way and just accept a higher level of short-term volatility in Brazil.”

Given the firm’s renewed confidence in and perspectives on the Brazilian market, in 2009 Warburg Pincus hired Alain Belda, then chairman of Alcoa and board member of IBM, Citigroup, and Renault-Nissan, to lead the firm’s activities in Latin America. Belda was widely considered one of the most successful Brazilian executives in America; he began his career at Alcoa do Brasil in 1969, eventually becoming Alcoa’s global CEO and chairman for roughly a decade. Hiring someone like Alain Belda was a clear testimony to Warburg Pincus’s long-term commitment to the region. Belda was supported by Luca Molinari, who had been with Warburg Pincus for over 10 years. Molinari relocated to Brazil in April 2010, when he was a managing director in the firm’s London office. The

---

<sup>1</sup> A popular Brazilian fruit.



Brazilian office of Warburg Pincus was also staffed with several other investment professionals who had diverse professional backgrounds in the Brazilian financial environment.

Warburg Pincus's global fund structure enabled the firm to be more nimble than some of its competitors. The firm had long organized its investment teams around well-defined sector domains and combined local resources and global sector expertise when conducting diligence. As part of this structure, Warburg Pincus always aligned compensation with overall firm performance rather than solely on individual performance, thus incentivizing investment professionals to cooperate with each other as the firm deployed capital as efficiently as possible across the globe. Warburg Pincus had invested in companies at different stages of their development cycle, from early-stage through growth-capital to late-stage investing, always with a growth-oriented philosophy.

As of 2011, Warburg Pincus in Brazil had committed to investing up to R\$350 million in Omega Energia (in partnership with Tarpon Investimentos, a leading Brazilian investment firm) and R\$150 million in Banco Indusval.

#### *D. Blackstone and Highbridge (2010) – A Local Partner*

In 2010, the Blackstone Group and Highbridge Capital Management both acquired stakes in two of Brazil's most respected alternative asset managers, Pátria Investimentos and Gávea Investimentos, respectively. The two U.S. firms could have opened local offices like GA or Carlyle, but, instead, elected to partner with locals. It was likely that Blackstone and Highbridge wanted to avoid the past mistakes that others had made in the late 1990s. By joining forces with two of the most respected financial institutions in Brazil, it seemed unlikely that either venture would fail, but it was not certain that either would be a resounding success.

While there was insufficient data as of 2011 to determine whether either partnership mentioned above was successful, the model employed in both transactions mimicked that used by Credit Suisse in its acquisition of Banco Garantia, then Brazil's largest and most well-respected investment bank, or that used by UBS in its acquisition of Pactual. In both instances, the local offices acted semi-independently of their European owners. Corrado Varoli (CEO of G5 Advisors) asserted, "the only way you can make it work is with an acquisition that is semi-independent of New York, with Credit Suisse being the paradigm."<sup>93</sup> Brazil, he believed, was a completely distinct market from the rest of the world and should operate according to local practices. Using Varoli's logic, it appeared as though Highbridge and Blackstone chose wisely. They both followed Credit Suisse's lead by buying preeminent franchises and by affording their Brazilian partners relative independence.

**Exhibit 1** Selected Biographies

**David Roux** is a co-founder of Silver Lake and Chairman. He was formerly Chairman and CEO of Liberate Technologies, Executive Vice President at Oracle Corporation and Senior Vice President at Lotus Development. Mr. Roux began his technology career as co-founder and CEO of Datest, Inc., the first commercial CD-ROM publishing company. He is currently a member of the Avaya and Intelsat boards. Previously, Mr. Roux was a board member of Business Objects S.A., Gartner, Inc., Symantec, Thomson, UGS Corp., and was the Chairman of the Board of Seagate Technology and Serena Software. He is also on the board of the Institute for Health Metrics and Evaluation, a member of the DuBois Institute's National Advisory Board, a trustee at The Center for Advanced Study in the Behavioral Sciences at Stanford University, and an advisor to the Positive Coaching Alliance. Mr. Roux holds an M.B.A. from Harvard Business School and an M. Phil. from King's College, Cambridge University. He is a graduate of Harvard College.

**Julia Novaes Fernandes** joined Silver Lake in 2009. Prior to joining Silver Lake, Julia Novaes Fernandes worked at JP Morgan in Asset Management focusing on Latin America and at Deutsche Bank in the Corporate Finance Investment Banking Group. Julia Novaes Fernandes worked on Silver Lake's first investment in Brazil, Locaweb. She holds a B.Sc. degree in Business Administration from the European Business School, Oestrich-Winkel, Germany, and graduated with honors with a dual M.Sc. degree in Finance from the European Business School in Oestrich-Winkel, Germany, and the Copenhagen Business School in Denmark.

Source: Adapted from Silver Lake documents.

**Exhibit 2** Basic Macroeconomic Indicators, Brazil, 2002–2010

	2002	2003	2004	2005	2006	2007	2008	2009	2010
<b>Gross Domestic Product</b>									
Real GDP (R\$ billions)	811	820	867	894	929	986	1,037	1,030	1,108
Nominal GDP (R\$ billions)	1,478	1,700	1,942	2,147	2,369	2,661	3,032	3,185	3,675
Nominal GDP (US\$ billions)	506	552	664	882	1,089	1,366	1,653	1,595	2,088
GDP per capita (US\$ at PPP)	7,725	7,817	8,305	8,644	9,170	9,900	10,530	10,450	11,240
GDP (% real change pa)	2.6	1.2	5.7	3.2	3.9	6.1	5.2	-0.7	7.5
<b>Nominal GDP components (% of GDP)</b>									
Private consumption	61.7	61.9	59.8	60.3	60.3	59.9	58.9	61.7	60.6
Government consumption	20.6	19.4	19.2	19.9	20.0	20.3	20.2	21.8	21.2
Gross fixed investment	16.4	15.3	16.1	15.9	16.4	17.4	19.1	16.9	18.4
Stockbuilding	-0.2	0.5	1.0	0.3	0.3	0.9	1.2	-0.4	0.8
Exports of G&S	14.1	15.0	16.4	15.1	14.4	13.4	13.7	11.1	11.2
Imports of G&S	12.6	12.1	12.5	11.5	11.5	11.8	13.5	11.2	12.1
Gross national savings rate (%)	14.7	16.5	18.9	17.8	18.0	18.4	18.7	15.0	17.0
<b>Exchange rate</b>									
Exchange rate (Real:US\$)	2.9	3.1	2.9	2.4	2.2	1.9	1.8	2.0	1.8
Real exchange rate (CPI-based, 1997=100)	53.7	52.6	54.9	67.7	76.3	82.6	86.1	86.0	101.0
<b>GDP deflators</b>									
GDP deflator (% change; avg)	10.6	13.7	8.1	7.2	6.2	5.9	8.3	5.7	7.3
Consumer prices (% change pa; avg)	8.5	14.7	6.6	6.9	4.2	3.6	5.7	4.9	5.0
<b>Interest rates</b>									
Lending interest rate (%)	62.9	67.1	54.9	55.4	50.8	43.7	47.3	44.6	40.0
Deposit interest rate (%)	19.1	22.0	15.4	17.6	13.9	10.6	11.7	9.3	8.9
Money market interest rate (%)	19.1	23.4	16.2	19.1	15.3	12.0	12.4	10.1	9.8
<b>Financial indicators</b>									
Stock market index	11,269	22,236	26,196	33,456	44,474	63,886	37,550	68,588	69,301
<b>Labor, capital, and productivity</b>									
Growth of real capital stock (%)	2.2	1.6	2.2	2.2	2.8	4.1	5.1	2.9	4.8
Labour productivity growth (%)	-1.9	-0.3	0.2	0.2	2.4	4.3	2.3	-2.1	4.8
Total factor productivity growth (%)	-1.2	-0.4	1.3	0.5	2.0	3.0	1.8	-2.3	4.3
<b>Employment and labor cost</b>									
Recorded unemployment (%)	11.7	12.3	11.5	9.8	10.0	9.3	7.9	8.1	6.7
Unit labour cost index (US\$, 2005=100)	72.2	69.5	76.8	100.0	118.4	138.8	160.7	155.7	180.5
Labour costs per hour (US\$)	2.3	2.2	2.4	3.1	3.8	4.7	5.5	5.2	6.4
Minimum wage per month (US\$)	76.6	68.5	77.9	88.7	123.0	160.6	194.9	226.8	292.4
<b>Production indicators</b>									
Industrial production (2005=100; avg)	89	89	97	100	103	109	112	104	115
Industrial production (% change pa)	2.7	0.0	8.1	3.4	2.9	5.9	2.9	-7.3	10.5
Petroleum production (thousand b/d)	1,438	1,485	1,467	1,614	1,807	1,835	1,897	2,030	2,152
Petroleum reserves (million barrels)	9,805	10,602	11,243	11,364	11,591	11,722	12,161	12,600	13,200

Source: Adapted by casewriters from Economist Intelligence Unit, Country Data, www.eiu.com, accessed June 2011.

**Exhibit 3** Brazil's Balance of Payments, 2002–2009 (US\$ billions)

	2002	2003	2004	2005	2006	2007	2008	2009	2010
<b>Current account balance</b>	<b>-7.6</b>	<b>4.2</b>	<b>11.7</b>	<b>14.0</b>	<b>13.6</b>	<b>1.6</b>	<b>-28.2</b>	<b>-24.3</b>	<b>-47.4</b>
Trade balance	13.1	24.8	33.7	44.7	46.5	40.0	24.8	25.3	20.2
Goods: exports	60.4	73.1	96.5	118.3	137.8	160.6	197.9	153.0	201.9
Goods: imports	-47.2	-48.3	-62.8	-73.6	-91.3	-120.6	-173.1	-127.7	-181.7
Services, net	-5.0	-4.9	-4.7	-8.3	-9.7	-13.2	-16.7	-19.2	-30.8
Income balance	-18.2	-18.6	-20.5	-26.0	-27.5	-29.3	-40.6	-33.7	-39.6
Income: credit	3.3	3.3	3.2	3.2	6.4	11.5	12.5	8.8	7.4
Income: debit	-21.5	-21.9	-23.7	-29.2	-33.9	-40.8	-53.1	-42.5	-46.9
Current transfers	2.4	2.9	3.3	3.6	4.3	4.0	4.2	3.3	2.8
<b>Capital account</b>	<b>0.4</b>	<b>0.5</b>	<b>0.3</b>	<b>0.7</b>	<b>0.9</b>	<b>0.8</b>	<b>1.1</b>	<b>1.1</b>	<b>1.1</b>
<b>Financial account balance</b>	<b>-3.9</b>	<b>-0.2</b>	<b>-3.3</b>	<b>13.1</b>	<b>15.1</b>	<b>88.3</b>	<b>28.3</b>	<b>70.2</b>	<b>98.5</b>
Direct investment, net	14.1	9.9	8.7	12.5	-9.4	27.5	24.6	36.0	36.9
Direct investment abroad	-2.5	-0.2	-9.5	-2.5	-28.2	-7.1	-20.5	10.1	-11.5
Direct investment in Brazil	16.6	10.1	18.2	15.1	18.8	34.6	45.1	25.9	48.4
Portfolio investment, net	-5.1	5.3	-4.8	4.9	9.6	48.4	1.1	50.3	63.0
Portfolio investment assets	-0.3	0.2	-0.8	-1.8	0.5	0.3	1.9	4.1	-4.8
Portfolio investment liabilities	-4.8	5.1	-4.0	6.7	9.1	48.1	-0.8	46.2	67.8
Equity	2.0	3.0	2.1	6.5	7.7	26.2	-7.6	37.1	37.7
Fixed income	-6.8	2.2	-6.1	0.2	1.3	21.9	6.8	9.1	30.1
Other investments, net	-12.5	-15.2	-6.6	-4.3	14.6	13.1	2.9	-16.3	-1.3
Financial derivatives, net	-0.4	-0.2	-0.7	0.0	0.4	-0.7	-0.3	0.2	-0.1
<b>Net errors and omissions</b>	<b>-0.2</b>	<b>-0.9</b>	<b>-2.1</b>	<b>-0.2</b>	<b>1.0</b>	<b>-3.2</b>	<b>1.8</b>	<b>0.6</b>	<b>-3.2</b>
<b>Change in reserve assets</b>	<b>11.3</b>	<b>-3.6</b>	<b>-6.6</b>	<b>-27.6</b>	<b>-30.6</b>	<b>-87.5</b>	<b>-3.0</b>	<b>-47.6</b>	<b>-49.1</b>
<b>Memorandum items</b>									
Current account/GDP	-1.5%	0.8%	1.8%	1.6%	1.3%	0.1%	-1.7%	-1.5%	-2.3%
FDI/GDP	2.8%	1.8%	1.3%	1.4%	-0.9%	2.0%	1.5%	2.3%	2.3%
Reserves (US\$ bn)	37.8	49.3	52.9	53.8	85.8	180.3	193.8	238.5	288.6

Source: Adapted by casewriters from IMF, International Financial Statistics, www.imfstatistics.org, accessed August 2011.

**Exhibit 4** Comparative Indicators of Business and Economic Conditions in BRIC and Selected Countries, c. 2009

	BRIC Countries				Chile	USA	Japan	Germany
	Brazil	Russia	India	China				
Macroeconomic Indicators								
GDP per capita (2009, US\$, PPP)	10,520	14,867	3,230	6,930	14,390	46,020	32,450	33,868
Population (millions)	193.5	141.9	1,166.1	1,334.7	16.9	306.8	127.1	82.8
Domestic savings rate (2009, % GDP)	16%	23%	31%	54%	26%	9%	23%	22%
Interest Rates								
Lending interest rate (2010 average)	42.0%	11.5%	12.4%	5.6%	4.9%	3.3%	1.5%	8.0%
Money market interest rate (2010 average)	9.9%	6.5%	6.3%	2.3%	1.6%	0.3%	0.2%	0.8%
Development Indicators								
Shadow economy estimate (% GDP) <sup>a</sup>	40.0	46.9	24.6	13.9	20.5	8.0	8.9	15.4
Human development index (2007) <sup>b</sup>	0.813	0.817	0.612	0.772	0.878	0.956	0.960	0.947
Corruption (world ranking) <sup>c</sup>	69	154	87	78	21	22	17	15
Gini coefficient of income inequality	0.548	0.423	0.368	0.415	0.549	0.450	0.381	0.270
Doing Business Indicators								
Ease of doing business rank (of 183 countries)	129	120	133	89	49	4	15	25
Days to start a business	120	30	195	37	27	6	23	18
Difficulty of hiring a new worker index	78	33	0	11	33	0	11	33
Cost of firing a worker (weeks of wages)	46	17	56	91	52	0	4	69
Ease of tax system rank (of 183 countries)	150	103	169	130	45	61	123	71
Total tax rate (% profit)	69.2	48.3	64.7	78.5	25.3	46.3	55.7	44.9
Days to enforce a simple credit contract	616	281	1,420	406	480	300	360	394
Bankruptcy recovery rate (cents on the dollar)	17	28	15	35	21	77	93	52
Logistics Performance Indicators								
Logistics performance index rank	41	94	47	27	49	15	7	1
Infrastructure <sup>d</sup>	3.10	2.38	2.91	3.54	2.86	4.15	4.19	4.34
Quality of roads <sup>e</sup>	2.90	2.40	3.30	4.30	5.90	5.70	5.60	6.40
International shipments <sup>f</sup>	2.91	2.72	3.13	3.31	2.74	3.21	3.55	3.66

<sup>a</sup> Market-based legal production of goods and services that are deliberately concealed from public authorities to avoid paying taxes or social security or to avoid bureaucratic procedures.

<sup>b</sup> Scored from 0 to 1 based on equal weighting of life expectancy at birth, education opportunities and literacy, and the GDP per capita at purchasing power parity.

<sup>c</sup> Countries ranked 1–178 by Transparency International based on expert assessments and business opinion surveys.

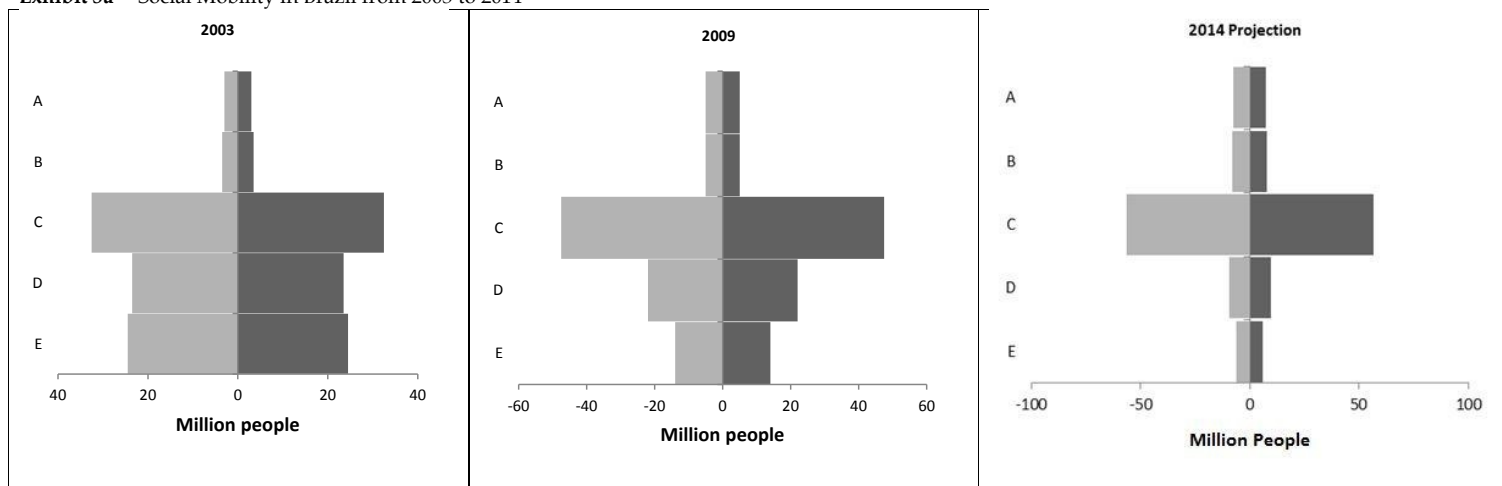
<sup>d</sup> World Bank index from 1 to 5 (1 is worst performance) of the quality of trade and transport-related infrastructure.

<sup>e</sup> World Economic Forum index from 1 to 7 (1 represents extremely underdeveloped) of the extent and quality of paved roads in 2009–2010.

<sup>f</sup> World Bank index from 1 to 5 (1 is worst performance) of the ease of arranging competitively priced shipments.

Sources: Adapted by casewriters from Economist Intelligence Unit, Country Data, [www.eiu.com](http://www.eiu.com); Transparency International, “Corruption Perceptions Index 2010,” <http://www.transparency.org>; UNDP, “Human Development Report 2009,” <http://www.hdr.undp.org>; The World Bank, “Doing Business Report 2010,” <http://www.doingbusiness.org>; The World Bank, “Logistics Performance Index 2010,” <http://www.worldbank.org>; CIA, *The World Factbook*, <http://www.cia.gov>; and F. Schneider and A. Buehn, “Shadow Economies and Corruption,” October 2009; all accessed October 2010.



**Exhibit 5a** Social Mobility in Brazil from 2003 to 2014

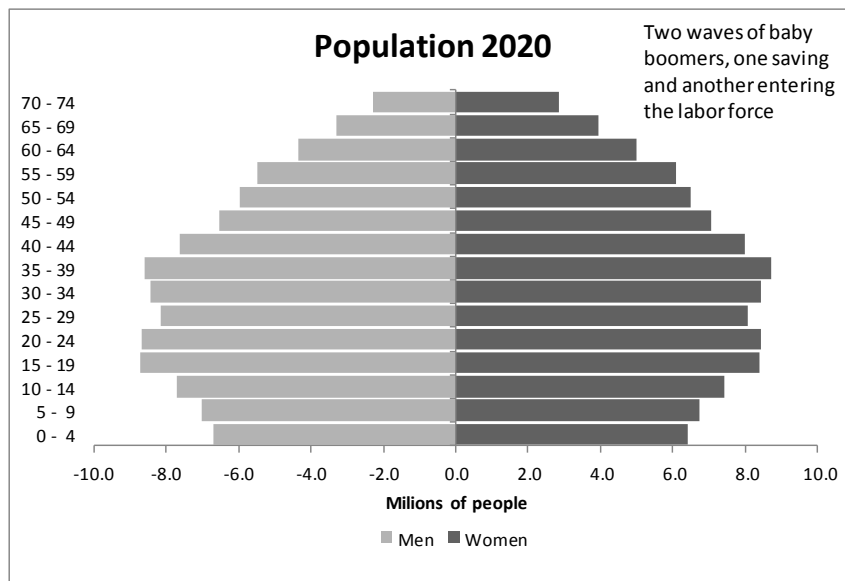
Source: Adapted by casewriters using data from Alexandre Pizarro and Thomas Humpert, "Brazil Demographics Primer," Bank of America-Merrill Lynch Country Overview, October 20, 2010; and Roberta Paduan, "Classes A e B: O mercado que mais cresce," *Exame*, June 29, 2011.

Note: Social classes defined according to household income per month in the following way: Class E, R\$0–R\$705; class D, R\$705–R\$1,126; class C, R\$1,126 –R\$4,854; class B, R\$4,854–R\$6,329.

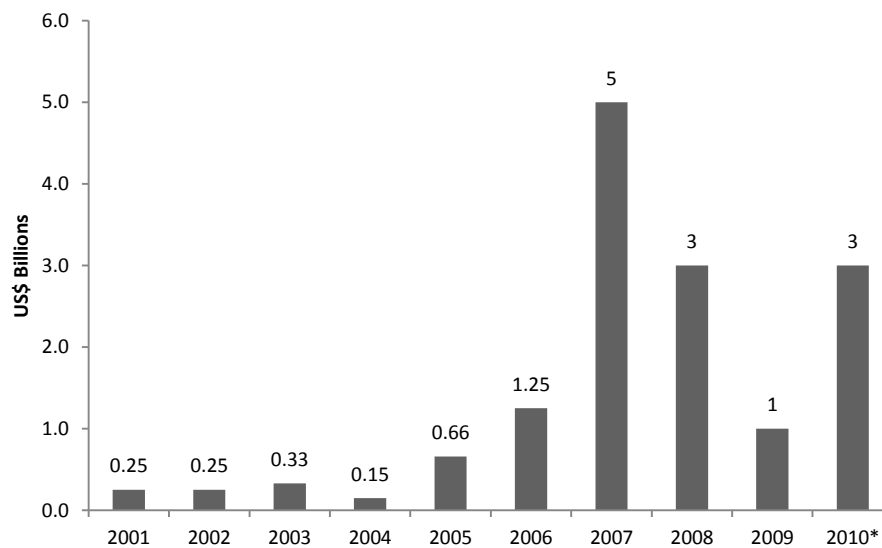
**Exhibit 5b** Definition of Social Classes in Brazil, 2011

	Monthly income	
	From	To
A	> \$R 5,656	1
B	\$R 4,338	\$5,656
C	\$R 1,006	\$4,338
D	\$R 630	\$1,006
E	< \$R 630	1

Source: Adapted by casewriters from Roberta Paduan, "Classes A e B: O mercado que mais cresce," *Exame*, June 29, 2011.

**Exhibit 6** Expected Waves of Baby Boomers by 2020

Source: Created with population estimates for 2020 from the United Nations Economic Commission for Latin America, available at [http://www.eclac.cl/celade/proyecciones/basedatos\\_BD.htm](http://www.eclac.cl/celade/proyecciones/basedatos_BD.htm).

**Exhibit 7** PE Transaction Volumes Through 2010 (US\$ billions)

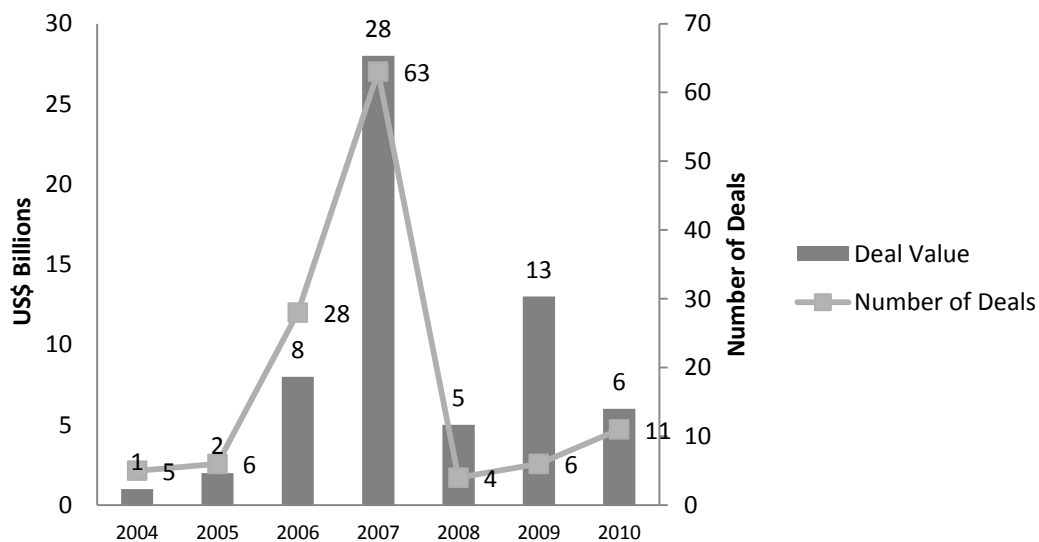
Source: Adapted by casewriters from "Private Equity in Brazil – Ready for its Moment in the Sun" (New York: Ernst & Young, 2010).

\* 2010 Annualized.

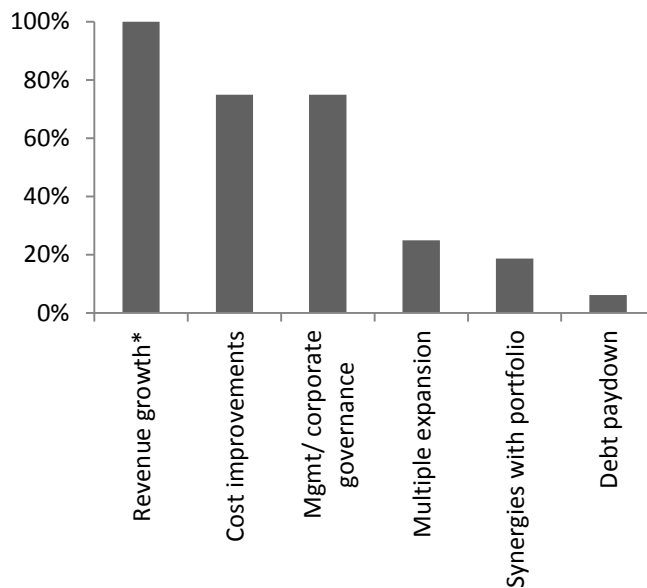
**Exhibit 8** Significant Recent PE Transactions in Brazil (2010)

Company	Industry	Acquirer	Announced	Deal value (\$ mm)
Qualicorp Group	Health Care	Carlyle Group	7/19/2010	1,200
Tivt Tercerizacao de Tecnologia e Servicos S.A.	Technology	Apax Partners	5/10/2010	921
CVC Brasil Operadora e Agencia de Viagens S.A.	Travel Agencies	Carlyle Group	12/8/2009	250
Romo Logistica SA	Sugar/Ethanol	TPG. Gavea Investimentos	7/5/2010	225
CETIP SA, Balcao Organizado de Ativos e Derivativos	Brokerage/Clearing house	Advent Int'l	5/8/2009	170
Pitagoras Administracao e Participacao S.A., Controlling Holding Co. of Kroton Educacional S.A.	Schools/ Universities	Advent Int'l	6/25/2009	142

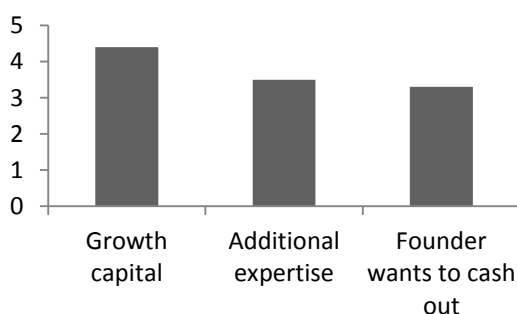
Source: Adapted by casewriters from "Private Equity in Brazil—Ready for its Moment in the Sun" (New York: Ernst & Young, 2010).

**Exhibit 9** IPO Activity in Brazil, 2004–2010

Source: Adapted by casewriters from "Private Equity in Brazil—Ready for its Moment in the Sun" (New York: Ernst & Young, 2010).

**Exhibit 10** Survey Results: What do you think will be the three main drivers of value creation? (percent of mentions)

Source: Aldo Musacchio, Klaus Koenigshausen, and Stephen Goldstein, "Private Equity in Brazil: Survey Results," PowerPoint Presentation, Harvard Business School, May 2011.

**Exhibit 11** Survey Results: Why Do Brazilian Firms Seek PE Capital? (Scale of 1-5)

Source: HBS Survey on Private Equity in Brazil, 2011.

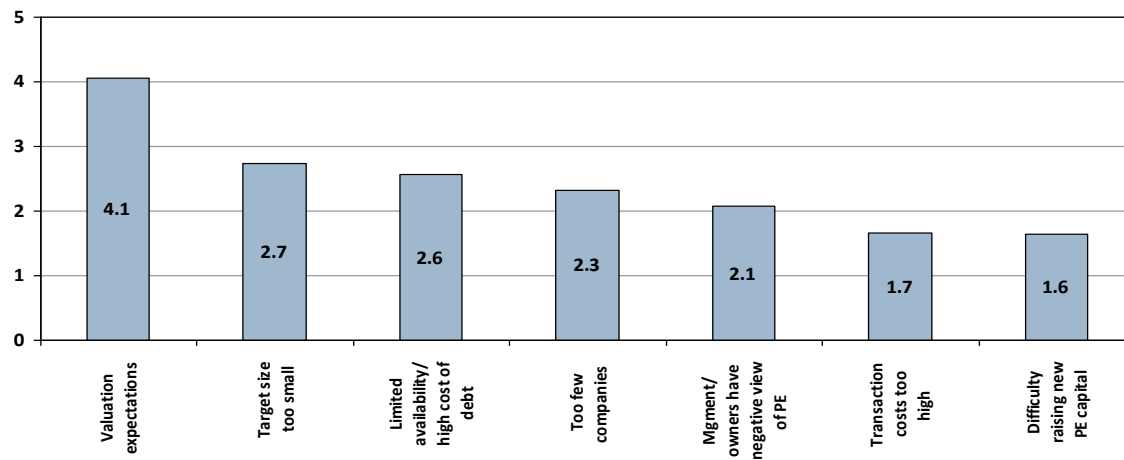
\* Includes organic and inorganic.

**Exhibit 12** Median Internal Rate of Return and Multiple of Money in PE, 2004–2009

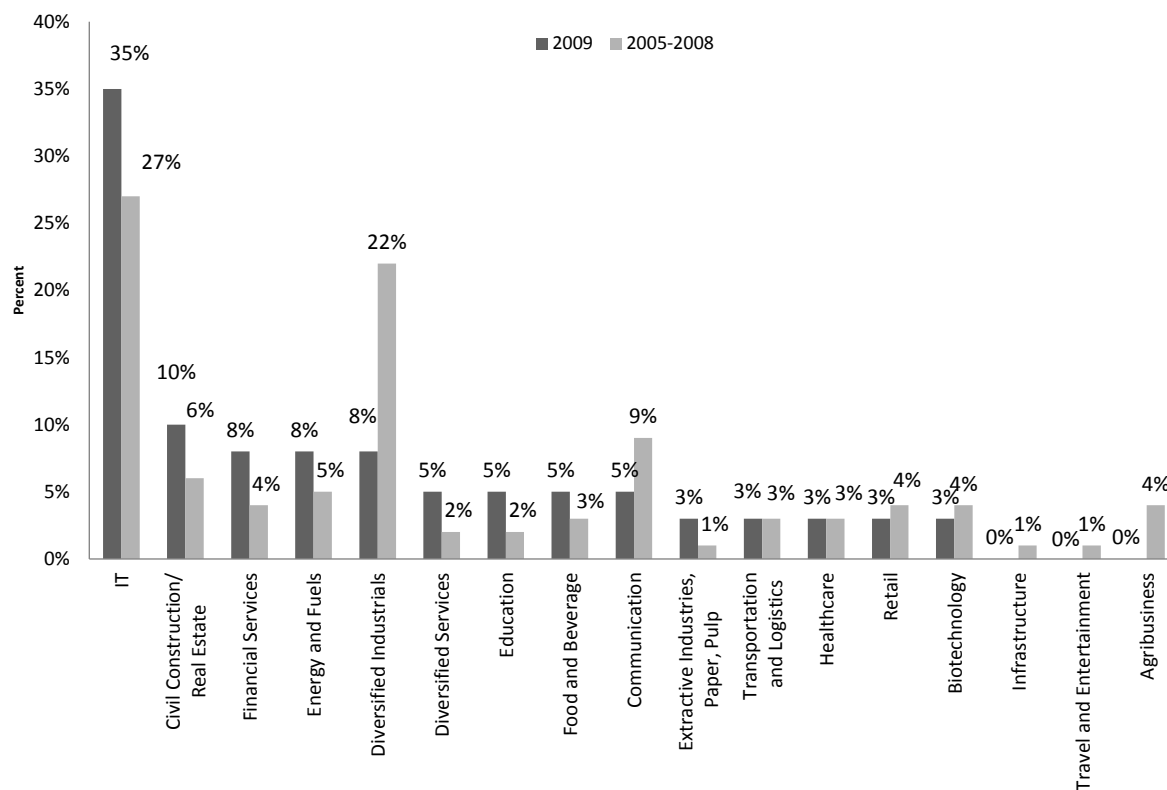
Quartile	IRR		Multiple of Money	
	Range	Median	Range	Median
1	>100%	162.0%	>10x	13.4x
2	50-99.9%	66.0%	5-9.9x	6.6x
3	25-49.9%	37.0%	2-4.9x	3.5x
4	0-24.99%	18.0%	0-1.9x	2.0x

Source: Adapted by casewriters using data from Fundação Getúlio Vargas, PE Census, available at <http://www.fgv.br/cepe/>; accessed August 2011

Note: Calculations based on 25 Deals, out of which 15 were IPOs and 10 were trade sales

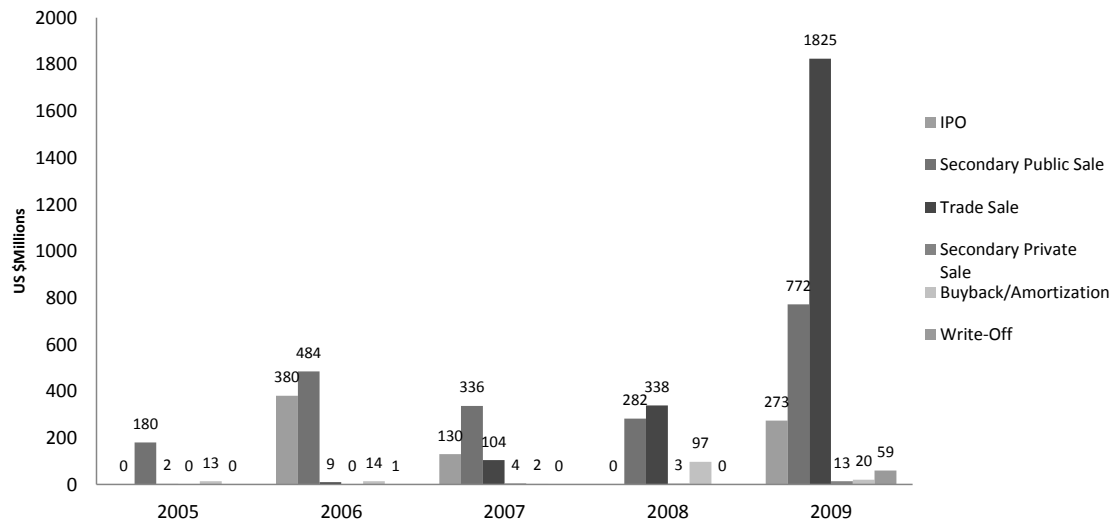
**Exhibit 13** Survey Results: What do you think will be the main Challenges for PE Expansion in Brazil?

Source: HBS Survey on Private Equity in Brazil, 2011.

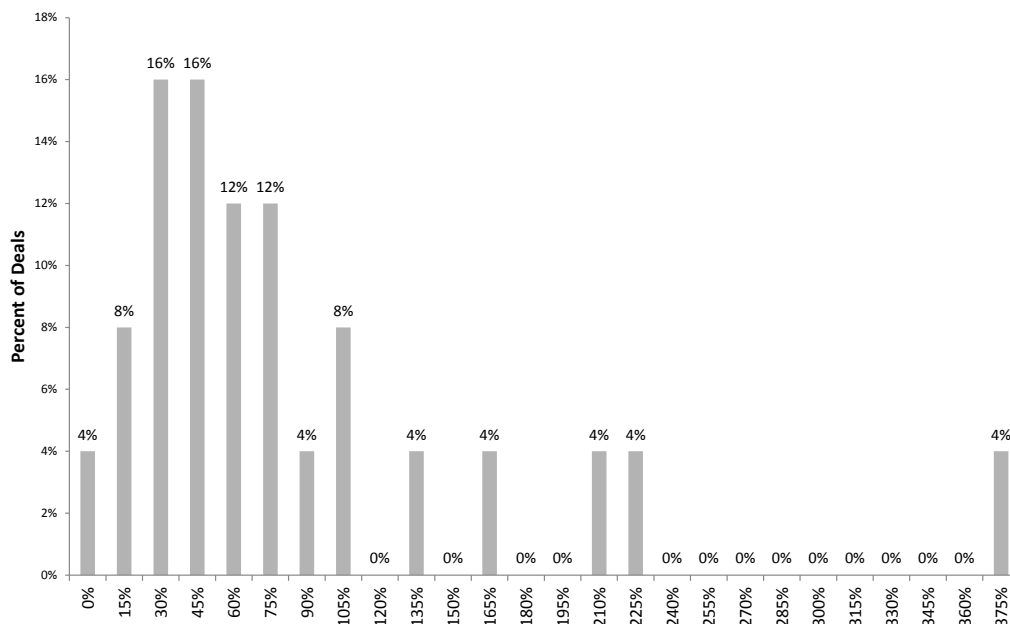
**Exhibit 14** Percentage of PE Divestments by Sector, 2005–2008 and 2009

Source: Adapted by casewriters with data from Fundação Getúlio Vargas, PE Census, available at <http://www.fgv.br/cepe/>; accessed August 2011.

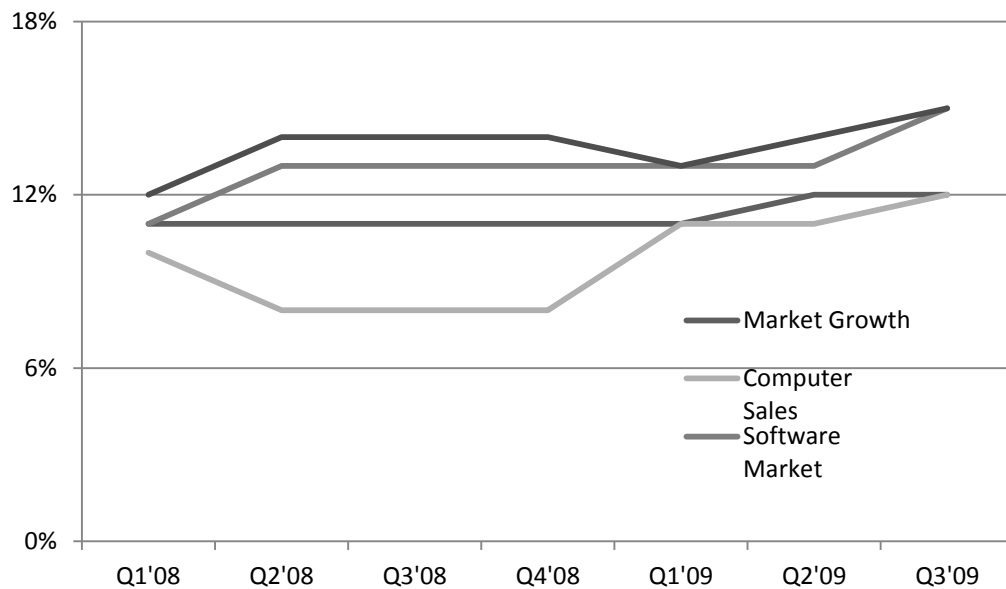


**Exhibit 15** Private Equity Monetization Segmented by Exit Mechanism (US\$ millions)

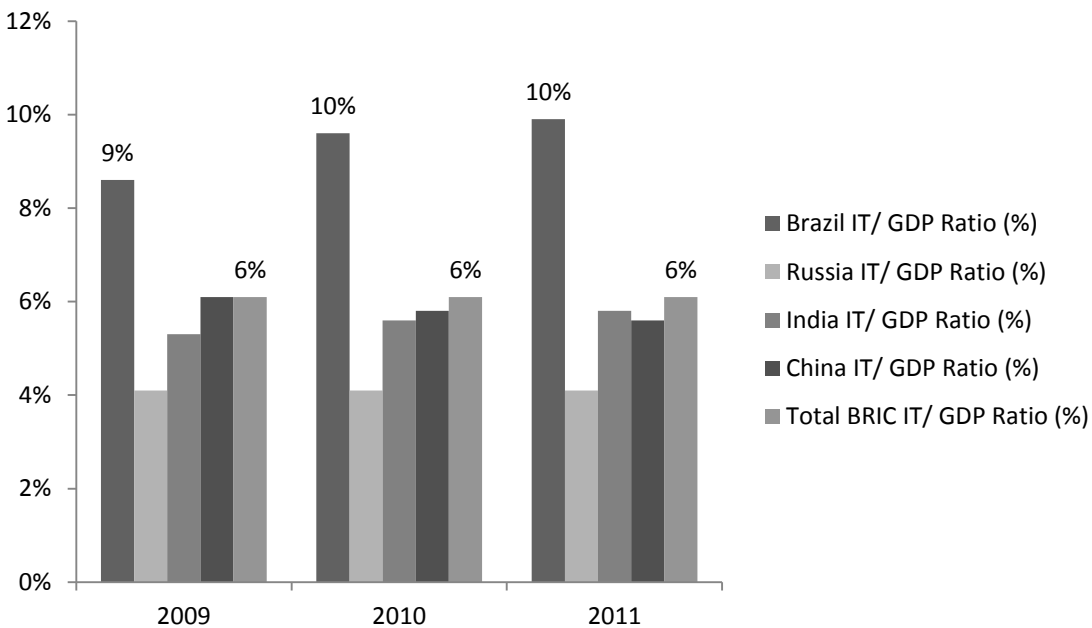
Source: Adapted by casewriters with data from Fundação Getúlio Vargas, PE Census, available at <http://www.fgv.br/cepe/>; accessed August 2011.

**Exhibit 16** Individual Deal IRRs (25 Deals, 15 IPOs and 10 Trade Sales), 2004–2009

Source: Adapted by casewriters with data from Fundação Getúlio Vargas, PE Census, available at <http://www.fgv.br/cepe/>.

**Exhibit 17** Growth in Spending in the Information Technology Sector in Brazil, Quarterly, 2008–2009

Source: Silver Lake.

**Exhibit 18** IT Spending to GDP in Brazil, Russia, India, and China (BRIC), 2009–2011

Source: Silver Lake.

## Endnotes

- <sup>1</sup> Josh Lerner, Felda Hardyman, and Ann Leamon, *Venture Capital & Private Equity – A Casebook* (New York, NY: J. Wiley & Sons, 2007), 1-12.
- <sup>2</sup> Josh Lerner, Felda Hardyman, and Ann Leamon, *Venture Capital & Private Equity – A Casebook* (New York, NY: J. Wiley & Sons, 2007), 1-12.
- <sup>3</sup> For more information, see David J. Collis, “Silver Lake,” HBS No. 711-420 (Boston: Harvard Business School Publishing, 2010).
- <sup>4</sup> “Silver Lake Sumeru Announces Investment in Locaweb,” press release (Sao Paulo, Brazil and Menlo Park, CA), September 20, 2010, [http://www.silverlake.com/pdfs/locaweb\\_0.pdf](http://www.silverlake.com/pdfs/locaweb_0.pdf),
- <sup>5</sup> See Laura Alfaro, “Brazil: Embracing Globalization?” HBS No. 701-104 (Boston: Harvard Business School Publishing, 2001).
- <sup>6</sup> Fundação Getúlio Vargas, Centro de Políticas Sociais, “Poverty, Inequality and Stability: The Second Real,” available at [http://www.fgv.br/cps/pesquisas/site\\_ret\\_eng/](http://www.fgv.br/cps/pesquisas/site_ret_eng/).
- <sup>7</sup> Interview with Álvaro Gonçalves, Grupo Stratus, São Paulo, March 2011.
- <sup>8</sup> Laura Alfaro, “Brazil 2003: Inflation Targeting and Debt Dynamics,” HBS No. 704-028 (Boston: Harvard Business School Publishing, 2006).
- <sup>9</sup> Sue Branford and Bernardo Kucinski, *Lula and the Workers Party in Brazil* (New York: The New Press, 2005), p. 7.
- <sup>10</sup> Interview with Juan Carlos Felix, Carlyle Group, São Paulo, March 2011.
- <sup>11</sup> Interview with Armínio Fraga, Gávea Investimentos, Rio de Janeiro, April 2011.
- <sup>12</sup> Interview with Marcelo Hallack, BTG Pactual, São Paulo, April 2011.
- <sup>13</sup> <http://www.doingbusiness.org/~media/FDPKM/Doing%20Business/Documents/Profiles/Country/DB11/BRA.pdf>.
- <sup>14</sup> <http://www.doingbusiness.org/data/exploreeconomies/united-states#closing-a-business>, <http://www.doingbusiness.org/~media/FDPKM/Doing%20Business/Documents/Profiles/Country/DB11/BRA.pdf>.
- <sup>15</sup> Interview with Marcelo Naigeborin, Morgan Stanley, São Paulo, March 2011.
- <sup>16</sup> Extracted from Ministério da Fazenda, “Evolução e Perspectivas da Economia Brasileira,” a presentation to the Council of the Americas, São Paulo, August 2006.
- <sup>17</sup> Sourced from materials provided by JGP Global Gestão de Recursos Ltda.
- <sup>18</sup> Bank of America Merrill Lynch “Brazil Demographics Primer,” October 20, 2010.
- <sup>19</sup> Sourced from materials provided by Silver Lake.
- <sup>20</sup> Sourced from materials provided by JGP Global Gestão de Recursos Ltda.
- <sup>21</sup> Interview with Henrique Alhante, JGP Investimentos, Rio de Janeiro, April 2011.
- <sup>22</sup> Interview with Doug Scherrer, General Atlantic, São Paulo, March 2011.
- <sup>23</sup> Bank of America Merrill Lynch, “Brazil Demographics Primer,” October 20, 2010.

- <sup>24</sup> Bank of America Merrill Lynch, "Brazil Demographics Primer," October 20, 2010.
- <sup>25</sup> Sourced from materials provided by JGP Global Gestão de Recursos Ltda.
- <sup>26</sup> Joe Leahy, "Brazil and China trade tensions set to rise," FT.com, January 30, 2011, <http://www.ft.com/cms/s/0/5efdeffc-2c99-11e0-83bd-00144feab49a.html#axzz1LAaH8K3y>.
- <sup>27</sup> Interview with Jes Staley, JP Morgan, New York, March 2011.
- <sup>28</sup> Interview with Gabriel Felzenszwalb and Pedro Quintella, Vinci Partners, São Paulo, March 2011.
- <sup>29</sup> As a percent of GDP.
- <sup>30</sup> Musacchio, Aldo and Daemmrigh, Arthur. "Brazil: Leading the BRICs" Harvard Business School case 711-024.
- <sup>31</sup> Veronica Navarro Espinoza, "Brazil Infrastructure in 'Terrible Shape,' Fraga Says," Bloomberg News, February 4, 2010.
- <sup>32</sup> Interview with Marcelo de Paiva Abreu by Teresa de Sousa, "O Brasil (ainda) é um BRIC muito especial que cresce pouco," *Público*, August 8, 2010.
- <sup>33</sup> Interview with André Jakurski, JGP Investimentos, Rio de Janeiro, April 2011.
- <sup>34</sup> Interview with Armínio Fraga, Gávea Investimentos, Rio de Janeiro, April 2011.
- <sup>35</sup> Sourced from materials provided by JGP Global Gestão de Recursos Ltda.
- <sup>36</sup> Interview with Alexandre Behring, 3G Capital, New York, April 2011.
- <sup>37</sup> Interview with Eduardo Mufarej, Tarpon Investimentos, Boston, March 2011.
- <sup>38</sup> "Cyrela sees Brazil wages pressuring costs for 4 yrs," Reuters, March 29, 2011, <http://www.reuters.com/article/2011/03/29/cyrela-idUSN2927717520110329>, accessed October 2011.
- <sup>39</sup> Alex A. Salomão and Tatiana Gianni, "Um país em busca de gente," *Exâme*, April 6, 2011.
- <sup>40</sup> "Currency Comparisons, To Go," *The Economist*. July 28, 2011.
- <sup>41</sup> Matthew Brislow, "Brazil Economists Predict Faster Inflation in 2011 and 2012," Bloomberg Businessweek, July 11, 2011, <http://www.businessweek.com/news/2011-07-11/brazil-economists-predict-faster-inflation-in-2011-and-2012.html>.
- <sup>42</sup> Interview with Gabriel Felzenszwalb and Pedro Quintella, Vinci Partners, São Paulo, March 2011.
- <sup>43</sup> "Brazil: Old or New Paradigm?" BCA Research Report, March 8, 2011, p. 8.
- <sup>44</sup> Joe Leahy, "Brazil credit bubble fear as defaults rise," *Financial Times*, June 19 2011, <http://www.ft.com/cms/s/0/c0b3beb8-9a9c-11e0-bab2-00144feab49a.html#ixzz1Vx7iuiCS>, accessed August 24, 2011.
- <sup>45</sup> Interview with André Jakurski, JGP Investimentos, Rio de Janeiro, April 2011.
- <sup>46</sup> Interview with Persio Arida, BTG Pactual, São Paulo, April 2011.
- <sup>47</sup> Interview with Persio Arida, BTG Pactual, São Paulo, April 2011.
- <sup>48</sup> Interview with Armínio Fraga, Gávea Investimentos, Rio de Janeiro, April 2011.
- <sup>49</sup> Interview with Armínio Fraga, Gávea Investimentos, Rio de Janeiro, April 2011.

- <sup>50</sup> Michael J. de la Merced, "Blackstone Says Plain L.B.O.'s Are Too 'Pricey,'" DealBook, *New York Times*, April 21, 2011, <http://dealbook.nytimes.com/2011/04/21/blackstone-plain-l-b-o-s-are-tougher-to-do/?partner=rss&emc=rss>.
- <sup>51</sup> Interview with Martin Escobari, Advent International, São Paulo, April 2011.
- <sup>52</sup> "Private Equity in Brazil – Ready for its Moment in the Sun" (New York: Ernst & Young, 2010).
- <sup>53</sup> Aldo Musacchio, Klaus Koenigshausen, and Stephen Goldstein, "Private Equity in Brazil: Survey Results," PowerPoint Presentation, Harvard Business School, May 2011.
- <sup>54</sup> Tarpon Investimentos, Quarterly Report – Q4 2010, <http://www.tarponinvest.com/tarpon/en/tarpon/web/arquivos/TarponAllEquitiesFund-MgmtReportQ410.pdf>, accessed November 2011.
- <sup>55</sup> GP Investments, Annual Report 2009, [http://www.mzweb.com.br/gp2009/web/arquivos/GP\\_AR\\_09.pdf](http://www.mzweb.com.br/gp2009/web/arquivos/GP_AR_09.pdf), accessed November 2011.
- <sup>56</sup> Adriana Brasileiro and Adriana Chiarini, "JPMorgan's Highbridge Buys Ex-Central Banker Fraga's Gavea Investimentos," Bloomberg.com, October 27, 2010, <http://www.bloomberg.com/news/2010-10-27/jpmorgan-s-highbridge-buys-fraga-s-gavea-investimentos-update1-.html>, accessed November 2011.
- <sup>57</sup> "KKR and TPG look to move into Brazil," *Financial Times*, May 3 2011.
- <sup>58</sup> Thompson One Banker.
- <sup>59</sup> [www.unctad.org](http://www.unctad.org)
- <sup>60</sup> Interview with Veronica Serra, Pacific Investimentos, São Paulo, March 2011.
- <sup>61</sup> Interview with Alexandre Behring, 3G Capital, New York, April 2011.
- <sup>62</sup> Interview with Eduardo Mufarej, Tarpon Investimentos, Boston, March 2011.
- <sup>63</sup> Interview with Fernando Borges, Carlyle Group, Boston, March 2011.
- <sup>64</sup> Executive profile of Antonion Carlos A. Ribeiro Bonchristiano, Bloomberg Businessweek, <http://investing.businessweek.com/research/stocks/people/person.asp?personId=1192339&ticker=GPIX:LX&previousCapId=752381&previousTitle=ALL%20AMERICA%20LATINA%20LOGISTICA>.
- <sup>65</sup> Interview with Antonio Bonchristiano, GP Investimentos, São Paulo, April 2011.
- <sup>66</sup> Interview with Corrado Varoli, G5 Advisors, São Paulo, April 2011.
- <sup>67</sup> Interview with Carlos Piani, Vinci Partners, Rio de Janeiro, April 2011.
- <sup>68</sup> Interview with Corrado Varoli, G5 Advisors, São Paulo, April 2011.
- <sup>69</sup> Interview with Álvaro Gonçalves, Grupo Stratus, São Paulo, March 2011.
- <sup>70</sup> Interview with Álvaro Gonçalves, Grupo Stratus, São Paulo, March 2011.
- <sup>71</sup> Interview with Persio Arida, BTG Pactual, São Paulo, April 2011.
- <sup>72</sup> Interview with Luca Molinari, Warburg Pincus, São Paulo, March 2011.
- <sup>73</sup> Interview with Persio Arida, BTG Pactual, São Paulo, April 2011.
- <sup>74</sup> Interview with Álvaro Gonçalves, Grupo Stratus, São Paulo, March 2011.



- <sup>75</sup> Interview with Veronica Serra, Pacific Investimentos, São Paulo, March 2011.
- <sup>76</sup> Interview with Marcelo Hallack, BTG Pactual, São Paulo, April 2011.
- <sup>77</sup> Interview with Jes Staley, JP Morgan, New York, March 2011.
- <sup>78</sup> Interview with Gabriel Felzenszwalb and Pedro Quintella, Vinci Partners, São Paulo, March 2011.
- <sup>79</sup> Interview with Doug Scherrer, General Atlantic, São Paulo, July 2011.
- <sup>80</sup> Interview with Doug Scherrer, General Atlantic, São Paulo, July 2011.
- <sup>81</sup> Interview with Luca Molinari, Warburg Pincus, São Paulo, March 2011.
- <sup>82</sup> Interview with Eduardo Mufarej, Tarpon Investimentos, Boston, March 2011.
- <sup>83</sup> Interview with Juan Carlos Felix, Carlyle Group, São Paulo, March 2011.
- <sup>84</sup> Interview with Antonio Bonchristiano, GP Investimentos, São Paulo, April 2011.
- <sup>85</sup> Interview with Marcelo Hallack, BTG Pactual, São Paulo, April 2011.
- <sup>86</sup> Interview with Antonio Bonchristiano, GP Investimentos, São Paulo, April 2011.
- <sup>87</sup> Interview with Fernando Borges, Carlyle Group, Boston, March 2011.
- <sup>88</sup> Interview with Doug Scherrer, General Atlantic, São Paulo, March 2011.
- <sup>89</sup> Interview with Dr. Persio Arida, BTG Pactual, São Paulo, April 2011.
- <sup>90</sup> Interview with Álvaro Gonçalves, Grupo Stratus, São Paulo, March 2011.
- <sup>91</sup> Interview with Fernando Borges, Carlyle Group, Boston, March 2011.
- <sup>92</sup> Thiago Bronzatto, "CVC planeja IPO para setembro," Exame.com, July 1, 2011, <http://exame.abril.com.br/blogs/blue-chips/2011/07/01/cvc-planeja-ipo-para-setembro/>, accessed November 2011.
- <sup>93</sup> Interview with Corrado Varoli, G5 Advisors, São Paulo, April 2011.