Internationalizing a Brazilian software development company: why, how, and room for improvements

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Abstract. The internationalization phenomenon has lately imposed some troublesome challenges to companies. On the one hand, several advantages can stem from internationalization, such as growth, cost and risk reduction. On the other hand, the company that decides to go international faces a number of setbacks, such as lack of knowledge of the foreign market and internationalizing its human resources. In this context, studying the internationalization process of a company can provide interesting insights for future experiences. Moreover, two other factors have drawn our attention: (i) paucity of studies of software development companies; and (ii) paucity of studies of companies in developing countries getting international. All this put together, the goal of this paper was to **describe the internalization process of a Brazilian company pertaining to the software development industry**. We have chosen the case study method and the case refers to a Brazilian informatics services and products provider owned by Brazilian partners with approximately 300 employees. Results show two distinct internationalization movements: one with own office in Canada and the second with a Portuguese partner. The Canadian experience is slower but more consistent while the Portuguese experience was very fast, but ended in failure. At last, we address some recommendations for future improvements.

Keywords: internationalization process, Brazilian software development company.

Introduction

Internationalizing has been a growth alternative for companies to reach new markets, gain scale and scope economies, increase security and profitability. Within the last two decades, the globalization of economies has promoted a new competitive reality, which is much more international, and has enabled unimaginable business models. Companies' initiatives regarding internationalization have boosted Foreign Direct Investments (FDI): in the late 1980s, the average growth was about USD 100 billion, while the 2000s have witnessed an average growth of approximately USD 600 billion. 30% of this amount is invested in developing countries.

Moreover, the relations between FDI, international trade, and innovation get closer: companies with remarkable international operations are also those leading both international trade and innovation. The vast majority of innovations—especially those related to high technology—comes from these companies. As a result, it renders an undoubting supremacy in ever competitive markets.

Nevertheless, beating competitors in foreign countries is not a simple goal to achieve: it is necessary to hold necessary competences to transfer competitive advantages from one country to another or to create completely new ones (Vasconcellos, 2008a). Challenges (thus, risks) are numerous and the International Business academia and practice may help to overcome them.

Lacerda (2006) claims internationalizing Brazilian companies is critical to promote Brazil's insertion quality in the international scenario. The country still lacks policies and initiatives that promote the internationalization of companies. As a result, there is currently only small elite of international Brazilian companies.

In this context, although internationalizing is a promising alternative for companies in an ever competitive marketplace—enabling them to reach potential competitive advantages—, challenges are still to be overcome. And this is especially true in developing countries, which lack structural conditions, such as infrastructure and pro-internationalization policies. Therefore, the goal of this paper is to **describe the internalization process of a Brazilian company pertaining to** the high technology industry, **the software development industry**.

Literature Review

Definition

Internationalizing a company refers to selling products in markets other than the domestic one and also to all involved activities (Paula, 2003; Hitt, 2002 as cited in Vasconcellos, 2008a). Grosse and Kujawa (1992) state internationalizing businesses encompasses several examples, such as exportation, importation, direct investments, licensing, portfolio investments, unilateral loans and transfers. Shi and Gregory (1998) define internationalization as the process by which a company increases its engagement with international operations. Vasconcellos (2008a) defines business internationalization as any initiative conducted by a company aiming at expanding its operations outside its country of origin. Therefore, internationalization is “the process of strategic planning—and its implementation—to a company to operate in countries outside where it is originally installed (Sousa, Neto, Oliva, & Armando, 2008, p. 108).

Basu (2000, p. 14) claims “the world of international business undergoes a transition in which companies are ignoring borders between countries and are considering the whole world as one single global marketplace. Such a break in geographic borders, time, and domestic barriers is converting current organizations in global organizations, which keep alliances and people worldwide.” Carneiro (2000, p. 14) states “the phenomenon know as globalization is forcing some Brazilian companies to review their expansion strategies. In a supposedly more opened economic system, these companies feel more and more threatened in the domestic environment by new and capable rivals and, at the same time, they consider better entry opportunities in the international marketplace.”

Regarding the classification of internationalized companies, Canals (1994) and Dyment (1987) suggest the following:

- *Exporting company*: during this primary phase of the internationalization process, the company usually concentrates initiatives in a single foreign country;
- *Multinational company*: the company tries to exploit important competitive advantages, first, domestically, and then in other countries. The multinational company aims to reproduce the same features of its headquarters in each of foreign subsidiaries;
- *Global company*: the previous model showed some deficiencies and in the end of the 1970s, there was an opposing trend, in which the company adopted coordinated strategies

with all other countries where it had operations, aiming to acquire competitive advantage. Critical activities were concentrated in one or few countries.

- *Transnational company*: it refers to the company that adequately combines maximum economic efficiency, maximum capability to respond to local markets, and flexibility to transfer experiences from some countries to the whole organization.

Models of the internationalization process

There are some theoretical models of company's internationalization process that try to "explain the internationalization strategic decision, but can also describe internationalization phases or stages, indicating a continuous strategy view" (Vasconcellos, 2008a, p. 134). Some of these models as presented next.

Hymer's Model: power of market. This model claims companies operate in more than one country because they have competitive advantages over foreign companies in its own markets. They exploit their advantages, first, in the domestic market, and then, they go international (Hemais, & Hilal, 2004).

Vernon's Model: life cycle of a product. Sequential models of internationalization were introduced by Vernon's life cycle of a product (Buckley, & Cassom, 1998). According to this, companies begin with exports before shifting to direct investments. Moreover, established products are manufactured in developing countries, because products with stabled technologies tend to be manufactured in countries where labor costs are lower. This theory also advocates the technology transfer as a means to reach new markets (Vasconcellos, 2008a).

Buckley and Casson's model: internalization. This model states that the company undergoes these steps during the internationalization process (Brasil, & Ortega, 2006): (i) direct exports; (ii) an agent in the foreign market; (iii) sales subsidiaries in the foreign market; and finally (iv) production subsidiaries in the foreign market. The focus of this model lies on the fact that companies internalize markets when the transaction costs of an administrative change are lower than market costs. Vasconcellos (2008a, p. 135) posits “the internalization theory states companies tend to internalize activities whose external transaction costs are high or whose transactions are inefficient.” Buckley and Casson (1998) consider two interdependent reasons for a company to launch operations in another country: (i) location; and (ii) control system. Location refers to where to internationalize: the choice of a country and region. Control system refers to the definition of the process. It can be: (a) exports organized and controlled in the country of origin; (b) licensing organized in the country of origin and contractually controlled; and (c) direct investment organized and controlled out of the country of origin.

Dunning’s Model: the eclectic paradigm. This model was created to sustain the idea that a whole explanation about international activities needs to have strict binds with several economic theories and FDI is only one of numerous alternatives of company’s international involvement (Vasconcellos, 2008a).

Uppsala School’s Model (Johanson and Vahlne). This theory highlights non-economic values in a company’s decision to whether invest abroad. Internationalization is developed gradually, with successive entries in new markets and greater engagement with each of these markets. According to Mazzola (2006), this approach has three premises: (i) lack of knowledge, an obstacle to internationalization; (ii) knowledge acquired through experience in previous markets; and (iii) the entry in a new market is the consequence of these knowledge. Johanson and Vahlne (1990) propose a four-stage for international involvement:

- Stage 1: non-regular exporting activities;
- Stage 2: exports through independent representative;

- Stage 3: launch of a foreign subsidiary; and
- Stage 4: launch of operating units (manufacturing, for instance)

As the process evolves, the company would be more committed to the international initiatives, which would include dedicated and specialized resources. These resources would be so specific that there is almost no use for other purposes. Such incremental development is a response to high risks that external markets represent and, as the company cumulates knowledge with this dynamic, risks get gradually lower.

The choice to which markets to enter would regard the perception of the cultural distance (discussed next): although the initial steps should include closer cultural markets, as the company gains experience, it would consider farther cultural markets (Vasconcellos, 2008a).

Bartlett and Ghoshal's Model. The authors propose an internationalization model based on the notion of the transnational corporation, which is a globally competitive company with a multinational flexibility and global learning ability.

Nordic School's Model (Andersson). This theory places the entrepreneur as key to the internationalization process of the company. This model also relates the environment and the moment in which the entrepreneur would act and what resources would be deployed (Vasconcellos, 2008a).

Network theory. It studies the relationships (i) between subsidiaries of the same company; and (ii) between subsidiaries and external entities, such as suppliers and competitors. Competitiveness is more and more related to the performance of networks than to the performance of isolated organizations (Fleury, & Fleury as cited in Mazzola, 2006).

Comparing theoretical approaches. Table 1 offers a summary of main features of these theoretical approaches.

Table 1 – Main features of theoretical approaches

Theoretical approaches	Main features
Hymer's Model: power of market	- Internationalization of a company occurs due to competitive advantages over foreign companies in its own market. - Advantages are first exploited in the domestic market and then in international markets.
Vernon's Model: life cycle of product	- Internationalization occurs sequentially: first, exports, then, FDI. - Established products are manufactured in developing countries.
Buckley and Casson: internalization	- Internationalization occurs when transaction costs are lower than market costs.
Dunning's Model: the eclectic paradigm	- Internationalization occurs when the company perceives propriety, internalization, or location competitive advantages.
Uppsala School's Model (Johanson and Vahlne)	- Internationalization occurs gradually. - Preference for countries with lower psychic distance in relation to the origin.
Bartlett and Ghoshal's Model	- Organizational structures based on: companies' need to develop competences for strategic demands and administrative heritage.
Nordic School's Model (Andersson)	- Focus on the role of the entrepreneur. - Personal and professional networking.
Network Theory	- Internationalization is viewed from the whole chain perspective, not isolated.

Source: Vasconcellos (2008a).

Buckley and Casson (1998) present the entry stage model, which suggests that organizations hold a sequential entry pattern in foreign markets and it comes together with a progressive engagement with each market. This line of thought refers to the gradual entry concept as an adequate strategy for the internationalization process of organizations proposed by the Uppsala School (Johanson, & Vahlne, 1997). According to the Uppsala Model, there are degrees of commitment to the entry modes, ranging from the least committed to the most committed (Vasoncellos, 2008a).

Why getting international?

Tanure (2005) suggests companies may have the following reasons to go international:

- Growth: domestic market saturation and search for new opportunities;
- Market: proximity with strategic clients and markets;
- Competition: competing with the worldwide best and be among market leaders;
- Cost: products and processes economy of scale;
- Risk: reduction of country-risk and reduction of capital cost; and

- Others: economy of scope and stockholders' ambition.

Kotler and Keller (2006) posit the majority of companies would prefer to remain in the domestic market, if it were large enough. In this context, managers would not have to learn other languages and laws, cope with floating currencies, face political and legal uncertainties, or change the design of products to meet different needs and expectations of customers. It would be much easier and safer to conduct business domestically. Nevertheless, many factors are leading more and more companies to the international battlefield. They include:

- The company finds out that international markets offer opportunities of higher profits when compared to domestic markets;
- The company needs larger base of clients to achieve adequate economy of scale;
- The company needs to be less dependent of one single marketplace;
- Global companies with better products or lower prices can invade and attack the domestic market. The company can counterattack these competitors in their own domains; and
- Clients of the company are conducting business abroad and they need international attendance.

Brazil is considered a late mover within the globalization process and its participation in international markets is still very limited (Fleury, & Fleury, 2007). Rocha (2003) posits that Brazilian companies do not go international due to four reasons: (i) geographic, since Brazilian territory has borders along insurmountable natural obstacles; (ii) environmental, in which political and economic macroenvironment issues are dominant; (iii) motivational, since Brazilian domestic market is huge and it refrains motivation from going international; and (iv) cultural, because, in general, Brazilians tend to be predominantly local and they consider themselves culturally farther in relation to other nations—excluding Latin Americans and Portuguese people.

These lines of thoughts highlight how important are cultural issues and they are real impediments during the internationalization process of Brazilian companies (Vasconcellos, 2008a).

How to get international?

Attracting clients. Whenever a company decides to go international, it has to define goals and marketing policies. What percentage of total revenues will come from international operations? Most of companies start with a small venture when they go international. Some plan to remain small while others have greater ambition (Kotler, & Keller, 2006).

Fleury and Fleury (2007, p. 204) state “once a company decides to go international, the key issue is to define to which markets should it converge efforts.” If the option is to enter a developed country, it is necessary to consider that there will be barriers to entry, such as high levels of standards. Moreover, there will be already established competitors, larger and more aggressive.

Another potential setback is that companies do not master the language spoken in the country where they are planning to invest. They do not know the market structure, clients’ preferences, legislation, technical norms or business local practices. Furthermore, managers need to synchronize different time zones.

Therefore, a good option to launch the internationalization process is choosing a market with institutions and culture similar to those in the domestic market (Fleury, & Fleury, 2007). Evidence is the findings of a research conducted in 2005 by Cyrino, Tanure and Penido (2005 as cited in Fleury, & Fleury, 2007) that unveils that 47% of Brazilian companies launched their first operation in Latin America, 21% in Europe—many of them selected Iberian countries, Portugal and Spain, or those of the catholic Europe—, and 18% in North America. Fleury and Fleury (2007) claim “as they learn with closer countries, companies diversify the geographic portfolio and start exporting to culturally farther locations. Regarding foreign investments, the trend is much the same.” Cultural distance can be defined as the difference between the culture of the country of origin and the country where the internationalization will be conducted (Kogut, & Smith, 1998; Hofstede, 1989 as cited in Vasconcellos, 2008a). Cultural distances act to increase or reduce the effectiveness of management of the company’s specific advantages in a certain location (Hofsted, 1989; Dunning, 1993; Brouthers, & Brouthers, 2000 as cited in Vasconcellos, 2008a).

Understanding the culture is important to define strategies both in relation to external adaptation and internal coordination, which includes relations of power to be established (Vasconcellos, 2008a).

Nevertheless, companies need to be careful while choosing a market only based on the cultural proximity. They risk neglecting potential better markets and superficial analysis can lead to misperceptions about real differences between countries. It can also lead to predictable marketing initiatives that constitute a disadvantage in terms of competitiveness (Kotler, & Keller, 2006).

Attitude toward a group, abilities to deal with diverse cultures and promotion of international integration are conditions that associated with political, economic, and legal environment knowledge of those countries where the company is launching operations contribute to an internationalization process in line with the company’s organizational culture (Vasconcellos, 2008b).

Finally, Vasconcellos (2008b, p. 194) advocates “the structure of an organization focused on internationalization is intrinsically based on the development of human relations, may they be individual, group, inter-group, organizational, and inter-organizational. As a result, it is relevant to consider the cultural aspect, with focus on the analysis of the social group and the structures based on its routines and on its inter-relations."

Partnerships

Armando (2008, p. 63) posits "there are many ways to establish relations with global networks. One possibility is through attracting and developing jointly initiatives with multinationals. When multinationals launch an operation, they provide a ready channel to be used by local companies. They also bring incentives for local companies to reach the so-called world class standard to compete or to sell to multinationals."

Another benefit is the flow of technology to local products through interaction with multinationals (Armando, 2008). Dedrick and Kraemer (1998 as cited in Armando, 2008) studied the Asian informatics industry and they checked the rewards that emerge from the relation with the global production system: the most evident is the access to foreign markets, through both multinationals' distribution channels and direct exports to local distributors.

Methodological procedures

In order to comply with the goals of this work—describe the internationalization process of a Brazilian software development company—we have selected the case study method to conduct the research, which is essentially exploratory (Yin, 2001). The exploratory research aims at developing hypothesis and propositions that will be further investigated.

Hair Jr, Money, Samouel, & Page (2007) advocates the exploratory nature of a research stems from a good literature review: when the researchers identify there is little available information about a subject, as it was the case of this research, it can be considered exploratory because new relations, new patterns, new topics, and new ideas are pursued. Literature review has presented theories on internationalization of companies and also on some Brazilian companies; however, it is evident that few research was conducted on developing countries software development companies.

Criteria employed to this instrumental case, which was used to meet this research's needs are followed described:

- Company pertaining to the software development industry, due to its strategic importance in the world's current economy;
- Company with headquarters in a developing country, due to lack of studies addressing developing countries, but more severe, due to lack of studies addressing the South-North internationalization movement;
- Company internationalizing or with already internationalized operations, due to the main subject covered by this research—internationalizing strategies; and
- Convenience, in order to unlock access to the company, both in terms of interviewees (criteria described next) and of relevant internal documentation.

The selected company that served as the case for this study did not allow its name to go public or any information that could identify it, what certainly included interviewees' identification. The main reason for this constraint was that the internationalization topic addresses strategic decision that may muddle current negotiations with suppliers and partners. As a result, for purposes of this work, the company will be hereafter referred as **SD Co**. (Software Development Company) and no relevant information for the presentation, study, and understanding of the case was omitted.

Primary data collection included in-depth semi-structured interviews and documental analysis. Vasconcellos (2008a) claims the interview is a basic tool for all data collection process, mainly those with qualitative nature, which is our case. Interviewees selection criteria followed what Cyert and March (1963) named dominant coalition, which means those embodied with power to make decisions. Therefore, from the organizational chart (detailed next), we identified and selected the key-interviewee with whom an in-depth interview was conducted. He is the Chief Officer responsible for SD Co's internationalization process.

Interview research protocol includes three discrete sections: (i) basic information on the internationalization background: how was the process started and what were the first results; (ii) information on the current internationalization situation, which includes information on current partners and projects, and (iii) perceptions and forecasts about the internationalization future, which includes the next steps to be adopted.

Documental analysis was employed to enrich the understanding on SD Co's internationalization process. Sources include: internal presentations (slides) about internationalization and SD Co's website, where some public information could be gathered. The most important document was the organizational chart, which allowed us to select the main interviewees. Interviews were transcripted and analyzed, and relevant documents were also analyzed according to the theoretical background previously presented.

We will next present the main results and analysis from the adopted codification.

Results e Analysis

DS Co.

DS Co. was founded in 1995 and its headquarters is located in São Paulo metropolitan region, which includes the city of São Paulo itself and also some surrounding cities. About 300 employees are distributed in its headquarters and three branch offices, all located in Brazil. Main focus include: system developments, software licensing, training, infrastructure and development of information security products and services. Besides, it also offers skilled workers to big companies in order to overcome specialized labor shortage.

It is 100% controlled by Brazilian stockholders. In December 2007 the company started receiving funds from Intel Capital, Intel's investment venture business. Since its foundation in 1991, Intel Capital invested more than USD 4 billion in approximately 1 thousand ventures in more than 30 countries. It is focused on the growth of the Internet economy; thus supporting strategic interests of Intel, including Brazil. Intel Capital invests in hardware, software, and service suppliers in several industries, such as computing, networking, and wireless communications. Such investments aim at co-operating with the target company both in terms of marketing and technological development, supporting it to reach new clients worldwide, to optimize new products and services, and to expand its exposure to innovations and state-of-the-art technologies.

In 2000, SD Co. decided to open an office in Canada aiming at reaching the Canadian and US markets. This constituted the first initiative toward internationalizing the company. Recently, it has also developed an initiative—jointly with a Portuguese company—to enter the European market—focused on the Portuguese and Spanish markets—, exploiting this partner's brand and also its base of clients.

Why did SD Co. decide to go international?

The Brazilian banking system is concentrated on few and large institutions. Additionally, it was only in 1994 that the Brazilian economy witnessed inflation stabilization. As a result, there is a great set of complex computing and networking systems to deliver several services to numerous clients.

Since its foundation, SD Co. has developed software solutions to major Brazilian banks and it provided the company a rare know-how in developing solutions for this industry. When a company reaches and acknowledges this advantage it tends to decide for internationalizing itself. The foreign landscape showed banks with smaller base of clients and services less complex than those of SD Co.'s. Competition was also fierce, but different: the market was not so concentrated and software solutions did not need to be as agile and as complex as those in the Brazilian marketplace.

SD Co.'s internationalization process is being conducted gradually, as stated by the Uppsala School (Johanson and Vahlne): first steps included the opening of an office in Canada, in 2000, and a partnership with a Portuguese company. It is currently being considered the opening of an office in Europe in order not to share revenues with the Portuguese partner: this office's goal would be to sell projects, retaining clients and attracting new ones. Stockholders' decision on developing gradual initiatives is in line with Mazzola's (2006) premises on new markets: (i) lack of knowledge of the market; (ii) knowledge acquired by experiences in other markets; and (iii) entry in a new market is a consequence of this knowledge.

SD Co.'s founder is also the main executive and he is the entrepreneur responsible for internationalization. Not only is the internationalization process being developed gradually but it also depends on this executive's personal and professional networking. This highlights the importance of the role of entrepreneur in the internationalization process, as already claimed by the Nordic School (Andersson).

The main reasons to go international include some of those proposed by Tanure (2005). Regarding growth, domestic saturation does not seem to be a good reason, because the Brazilian market is promising for information technology solutions: there are several industries where processes are done manually and they need to be automated soon. However, search for new opportunities does seem to be one of the major reasons why SD Co. decided to go international because becoming known as a company that sells solutions for developed and economic stabled countries is perceived as important.

Regarding market, being close to clients is relevant while launching an international operation: opening an office in Canada and engaging in a partnership agreement with a company in Portugal are evidence that SD Co. tried to be closer to its clients, both current and future ones. Strategic markets included important demand market (Canada and US) and also countries with cultural proximity (Portugal).

Regarding competition, because SD Co. held know-how to offer services to Brazilian banks, with their complex and sophisticated systems, SD Co.'s executives perceived it as an advantage in relation to international strong competitors and an opportunity to figure among the leaders of this market.

Regarding cost, the company tried to expand its production capacity through internationalization in order to reduce production costs, enabling products and processes economies of scale.

Regarding risk, it is true that changes in the Brazilian marketplace may impact adversely on the company's performance, since all its current revenues are expressed in Brazilian Reais. This is a good reason to look for other currencies to compose its revenues; thus, reducing the country-risk effect. It is also perceived that investing in international operations pay off better than the traditional financial system; thus cost of capital is reduced.

Another reason to go international is related to gains of scope economies, because SD Co. tries to use, as many as possible, the same practices, processes, and tools in the development of both domestic and foreign projects. Moreover, it was observed that SD Co.'s main executive had a personal desire to lead the company to international operations.

As the internationalization process has evolved, SD Co.'s commitment to this process was also increased. Evidence includes resources dedicated exclusively to these purposes. However, both the internationalization process and the company's commitment to it were incremental, because risks were considered high in the beginning and they were lowering as SD Co. got experience.

The entry of new competitors has stimulated the search for new markets to diversify risks, strengthen businesses and, above all, learn the rules of globalization (Rocha, 2003). To sum up, even if gains of scale and cost reduction of products developed exclusively for the Brazilian market seemed attractive, the main reason to go international was financial.

How did SD Co. go international?

Software development processes, management methods and controlling styles were already well defined when SD Co. decided to go international. Therefore, the only goal was to reach new markets. Company's name, logo, nationality, commercial brands were not only maintained but also enhanced in advertisements. The foreign office is also concerned with narrowing local employees with the headquarters language and habits.

According to the classification of international companies (Canals, 1994; Dyment, 1987), SD Co. is an exporter, since it is still in the initial phase of the internationalization process and with initiatives concentrated in one sole country. However, it is gradually becoming a multinational, as it aims at exploring and exploiting important domestic competitive advantages in other countries.

According to the international involvement stages (Johanson & Vahlne, 1990), SD Co. is both in the second and third stages. The second stage refers to SD Co.'s European experience, because it just exports software and other Information Technology products through a partner company in Portugal. The third stage refers to SD Co.'s Canadian experience, because there is a subsidiary in a foreign country. Nevertheless, it is important to highlight the number of projects sold and the amount of efforts toward the Portuguese and Spanish markets are many times greater when compared to the Canadian and US markets.

Attracting clients. The majority of companies launch a small venture when they go international. In our case, the main service sold in Brazil—software development for the banking system—was selected as the principal platform to launch the company abroad. As the goal was to export to developed countries, where the quality standards are the highest and where there are stronger and more aggressive competitors already established, the option for services already know in the domestic market and labeled as of high quality was of utmost importance.

The Portuguese market is currently SD Co.'s exports main focus, due to the language: there is no extra cost in international transactions regarding idiomatic differences. Moreover, Portugal is both an Iberian country and belongs to the catholic Europe, confirming Cyrino et al.'s (2005 as cited in Fleury & Fleury, 2007) findings that unveil that 21% of Brazilian companies debut the international presence in Iberian or catholic European countries, because they have institutions and culture closer to those found in Brazil.

SD Co. usually standardized its products, advertising, and distribution channels, because it is cheaper. As a consequence, it does not tune its marketing mix for each market target. If on the one hand attracting and retaining clients in a profitable way is key to any company's success, on the other hand, it demands appropriate, timely, and customized offer, because potentially more interesting markets can be neglected or real differences between countries can be superficial. It can also result in marketing initiatives too predictable, which is a disadvantage in terms of competitiveness (Kotler & Keller, 2006).

Partnerships. Building strategic partnerships and alliances bring jointly strengths and resources for all companies and help them to compete. It enables the company to fill the gap between what it would like to accomplish and what its resources really allow it to do: strengths can be leveraged and weaknesses overcome.

SD Co. has elected a partner in Portugal because it possessed no previous knowledge on the European market and also for not having a known international brand. The partner acknowledged that the Brazilian banking and information security systems were sophisticated and offering these services in its own market would be an advantage.

Developing a partnership was critical to SD Co.'s internationalization process. Several variables were considered about the partner: current initiatives, time in market, credibility, image, mission, values, ethics, investment capability, financial health, management of people and projects already being developed. Stockholders of the Portuguese partner were introduced to the Brazilian executives by a software multinational company during an important international fair, where all three companies were exhibitors. Prior to engaging into an agreement, Brazilian main executive traveled numerous times to Portugal.

Nevertheless, as the operation was launched, a lack of alignment between the two companies became evident: in the internationalization process, they did not consider a success critical factor the search for attractive clients for both companies. Each one tried to choose those clients more interesting regarding its own interests. As a result, recently—and during the writing of this paper—, the partnership agreement was scrapped. Brazilian executives continue to travel inside Brazil and also abroad to find new partners.

Cost structure. All software development is done in its Brazilian headquarters and it results in cost reduction, because Brazilian specialized labor is cheaper than its peers in North America and Europe.

The Portuguese partner earned just part of the revenues from sales in market. Therefore, the cost structure was very simple and lean. On the contrary, the Canadian office has an extended cost structure, because a larger fixed structure was necessary to support clients in the North American markets.

Companies need to add several costs to production costs and these costs vary from country to country. They encounter three options: (i) to determine a flat price in all countries; (ii) to determine a price in each country according to the market; or (iii) to determine a price in each country according to the costs in each country (Kotler & Keller, 2006). SD Co. decided to determine a price in each country according to the market.

Structure to go international. According to Kotler and Keller (2006), sooner or later, all companies create internal divisions to cope with all activities that involve internationalization.

SD Co. has created an International Department with its own Chief Officer. This department is responsible for the internationalization process and development, defining the goals to be reached in each market, the budget, and the allocation of resources both for attracting new clients and developing overseas projects.

The company adopted an organizational strategy described by Kotler and Keller (2006, p. 692) as "a local strategy that standardizes a number of essential elements and adapts others to local markets: this strategy is applicable to one industry (such as the telecommunications) in which each country requires a certain adaptation of its device, but the supplier can also standardize some of the core components." SD Co. has developed an information security solution for the Brazilian banking industry and it has adapted the software to meet the requirements of international markets and clients.

The internationalization process caused changes in formal and interpersonal structure and responsibilities, besides a change in attitude and mindset of people. Once it was noted as irreversible, the company had to re-structure itself, looking for new partners and opening new offices. Moreover, it was necessary to train people, invest in technology, improve software development processes, and acquire knowledge of each country where it intended to trade its brands and meet the demand.

For the organization, the main result of this process was the need to improve product quality to meet international standards, which are higher than those in Brazil.

Obstacles to entry. SD Co. has cited some of Tanure's (2005) challenges companies should overcome during their internationalization process:

- Low standardization of international people and operations;
- Non-priority platform of global products;
- Organizational structure and managerial systems focused on the domestic operation;
- Lack of systematic investments in attracting and training skilled people with international mindset;
- Managerial board composed by Brazilians without prior international background; and
- Mastery of language not systematically controlled.

According to Kotler and Keller (2006), before deciding whether to go international, it is necessary to weigh several risks. Evidence shows that during its internationalization process, SD Co. faced the following difficulties:

- SD Co. had difficulty to understand preferences of foreign customer and it may not offer a product which is competitive or appealing enough;
- SD Co. could not easily understand business culture of foreign countries or it did not know how to properly deal with foreigners; and
- SD Co. acknowledged the board of managers was not internationally experienced.

Another challenge faced by SD Co. is internationalizing its human resources. According to a research conducted by Permutter and Heenan (1979), there are three levels for companies to evolve in its respect and it refers to three different mindsets: (i) ethnocentric, which concentrates decision in the country of origin and shows high control over international operations; (ii) polycentric or regioncentric, which has specific strategies for each market and shows autonomous decentralized global operations; and (iii) geocentric or global, which has strategies with domestic and international operations interdependency. SD Co. can be classified as ethnocentric, because decisions are centralized in Brazil and high control of international operations prevails. Systems and procedures of its headquarters are replicated in foreign operations.

According to Keegan (2006), there are some criteria to look for international businesses. The primary is the political risk, which involves analyzing the risks of governmental political changes that may impact on the business. Political risk was one of the determinant factors for the company to select foreign markets: both markets, Portugal and Canada, showed low risk of governmental changes that may impact on SD Co.'s business. They were also selected because they were more developed countries and close to the American and European markets.

Environmental Analysis. We have conducted a SWOT analysis to assess SD Co.'s current position and the competitive ability regarding internal and external environments. Strengths include:

- Expertise in the Brazilian banking market, with solid brand and relative large base of clients in a large and sophisticated domestic market;
- Good relationship with clients, flexibility and agility. Good networking;
- Lower prices when compared to information security products offered by competitors, because SD Co.'s solution is 100% developed by domestic labor;
- Wages relatively competitive;
- Sound financial situation and steady growth;
- Cultural proximity with American and European markets; and
- Technical team highly skilled (know-how and expertise).

Weaknesses include:

- Need to automate processes;
- Many pilot projects, but few effective contracts;
- Dependent upon skilled workers;
- No managerial integrated systems, such as CRM or ERP;
- Focused only on software; it does not develop hardware solutions;
- Employees do not master other languages, but Portuguese;
- Lack of international name and brand; and
- Limited internal structure to meet market's demands.

Opportunities can be so summarized:

- Investment in knowledge management technologies to promote organizational knowledge and not individual knowledge;
- Search for domestic and international partnerships;
- Investors interested in SD Co.'s products and in the company's potential;
- Information security is still being developed and it is promising; and
- International competition in higher value-added segments.

However, following threats were identified:

- Aggressive job offers by competitors to skillful employees;
- Chinese companies entering international markets with low costs;
- Mergers and acquisitions of companies in this industry: resulting companies are larger and they will eventually buy Brazilian software development companies; and
- Fast changes in technology, forcing companies to continuously innovate.

Final considerations

When a company launches operations in different countries, problems are more complex. Differences regarding market needs, legislations, patterns and regulations, and role of government demand a constant appropriate tradeoff between adapting products and services to local priorities versus the benefits due to global products and services scale (Vasconcellos, 2008a).

The goal of an internationalization process is to gain competitiveness, reaching better financial performance and deepening the understanding of the culture of countries where the company has operations. The internationalization process should consider values, attitudes, and behaviors (Vasconcellos, 2008b).

Top management's support was considered a success critical factor while implementing its internationalization process because conflicts tend to be reduced. On the other hand, the influence of its organizational structure was only fair, because several times the expansion was neglected to focus on domestic clients.

The Chief Officer responsible for internationalization was also responsible for domestic sales. This is at least questionable, because commercial businesses already established had higher priority in detriment to expanding foreign markets. Defining objectives for these markets, budgeting and allocating resources to prospect new clients and projects were given low priority.

Partnerships should address mutual goals and these goals must be clear for both sides since the beginning of the process. If not, after some time working together, the companies realize they have just lost effort. This was the case of the SD Co.'s Portuguese experience.

SD Co. has only limited competence to manage mergers and acquisitions and it shall seek outside help, such as hiring experts or specialized consultants, which may boost this process.

SD Co.'s main motivational factors to consider going international were: (i) spreading risks (not being dependent on a single market and single currency); (ii) increased productivity (by technological renewal and gains from scale); and (iii) learning through the continuous contact with other markets (many times, much more developed ones).

Limitations of this work include the study of only one company and during a limited time period. Moreover, as we visited only the Brazilian headquarters, other sites—including international offices—were neglected. We suggest that time periods of future studies are longer enough to capture the on-going internationalization process since its beginning. On-going situations may lead to far more interesting findings, especially when they can be compared to *ex-post* facts. We also suggest that related industries, such as the hardware, are included in future research.

Finally, although the results of this work can be clearly adapted and somehow used in future research and in the practice, it is limited in terms of generalization, a typical constraint of the case study method.

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