

## **Corporate Startup Engagement: a vision of Brazilian scenario**

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## **CORPORATE-STARTUP ENGAGEMENT: A VISION OF BRAZILIAN SCENARIO OVERVIEW**

Much is discussed about the differences and problems of relationship between corporations and startups. Yu and Hang (2010) state there is a general asymmetry between them. While the startups have a risky and uncertain environment, longing for growth, the corporations have resources, credibility and a more stable environment, despite facing challenges such as inflexible culture and focus on incremental innovation. This asymmetry, like differences in power, structure and decision making, makes beneficial connections hard to achieve for both parties (Prashantham and Kumar, 2019). The corporation has the resources, scale, and all processes necessary for the business model to function efficiently. The startup often has promising ideas, organizational agility, a willingness to risk, and a fast-growing ambition. Each side has what the other does not have, however the difference between cultures makes the approach of companies complicated (Weiblen and Chesbrough, 2015).

In order to have access to disruptive innovations and solutions that startups can bring, corporate engagement is the most used way and it can have different means with different levels of commitment (100 open startups, 2017). Thieme (2017) argues that startups are no longer perceived as a threat by the corporation but as potential partners being this engagement an important part of their innovation strategy.

According to Bonzom and Netessine (2016), 68% of companies listed at Forbes Global 500 (<https://fortune.com/global500/2015/>) are engaging with startups and over 50% of the unicorns mentioned by Wall Street Journal (<https://www.wsj.com/graphics/billion-dollar-club/>) have some kind of relationship with at least one company.

In Brazil, according to ABStartups (<https://startupbase.com.br/home/stats>), in 2019 there were around 12000 startups registered, doubled from 2018. In 2019, the company 100 Open Startups mapped that 895 startups and 876 corporations were engaged in some kind of relationship through their platform, an exponential increase from 275 startups and 243 corporations in 2018 (100 OpenStartups, 2019). It has been clear that not only there was an increase in the number of startups in Brazil but also in engagements between corporations and startups.

For Thieme (2017), the focus on incremental innovation is also one of the reasons why companies fail to innovate radically as they prefer to focus on improving existing products with their structured business model targeted to known audience and to increase the profits of these technologies already explored. Usually corporations have bureaucratic processes and structures, and, with more formalities, innovation tends to slow down.

The objectives of this article are map the corporate-startup engagements in Brazil, quantifying the main engagements as well as identifying the business sectors that most stand out in number of companies, programs and engagements in 2019 and find out the reasons why companies engage with startups and vice-versa.

There is a huge amount of international literature about innovation and corporate startup engagements (Bonzom and Netessine, 2016; Kohler, 2016; Mocker, Bielli and Haley, 2015; Weiblen and Chesbrough, 2015), however this is not the same scenario in Brazil with scarce literature (100 open startups, 2017; Grando, 2016). The article's contribution is to shed more light on Brazilian startups and their engagements with incumbents (local and international). Both (startup and companies) can take results as a basis to start engaging and/or create a line of innovation and engagement strategy by understanding the nature of engagement and its programs. It can also be used by companies that are not yet engaged with startups to have an

insight into how to engage and what other companies are doing in Brazil and elsewhere in the world. The results will display the business sectors that most engage with startups, the types and quantities of relationships and which of them had the highest growth, obtaining a good vision of the Brazilian scenario.

## LITERATURE REVIEW

The following topics below are discussed so that corporate engagement can be better contextualized, such as disruptive and open innovation, aimed by companies; business model innovation, which seeks innovation in companies' value chain; a section on startups and finally the types of engagements corporations have with startups.

### Disruptive and Open Innovation

Corporations have used open innovation to enhance radical and disruptive innovation by searching partners (Pénin et al. 2011). This model, as introduced by Chesbrough et al. (2006), uses internal and external ideas and knowledge to speed the internal innovation and expand the markets to the external use of innovation. This model (figure 1) shows that innovation comes from internal and external technology basis where the resulting projects can be launched in the market, licensed to other parties and/or can origin a spin-off into a new market (Chesbrough et al. 2006).

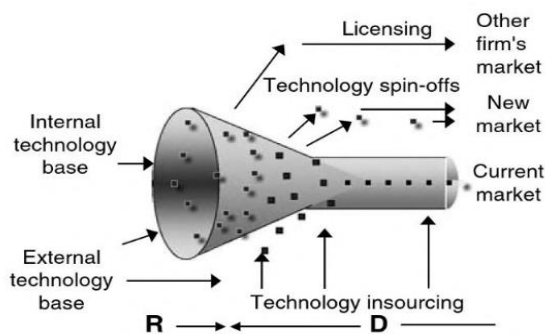


Figure 1 – Open innovation model

For Chesbrough et al. (2006), Bonzom and Netessine (2016) and Christensen (1997), open innovation is an alternative for companies to stay tuned to new market trends and protect themselves from disruptive innovation and loss of market share. On the other hand, closed innovation model is based on the concept that all innovations are developed internally by the R&D sector, where the approved projects are launched to a previously determined market. Before discussing disruptive innovation, the term disruption must be understood. It describes a process whereby a smaller company with fewer resources is able to successfully challenge established incumbent businesses. Entrants that prove disruptive begin by targeting those overlooked segments, gaining a foothold by delivering more sustainable functionality at a lower price (Christensen et al, 2015). Technological innovation can be separated in two types – the incremental and the disruptive:

Known as “sustaining innovation”, the most common is the incremental, where the company improves a technology to develop existing markets, thus creating more value to the consumer

(CHARLES, 2016). An example is the smartphone manufacturers that develop devices faster and with more features to users. This type of innovation is financially attractive by meeting well established markets and clients (Yu and Hang, 2010).

The second type, the disruptive, is the one that creates new markets with new value propositions to clients and values networks. This latter means that value is provided to people that were not consumers before, who could not afford the product or who appreciate new values that the product brings (Charles, 2016). For Charles (2016) and Christensen et al, (2015), disruptive innovation gets started in two types of markets that incumbents overlook:

Low-end disruption: innovation that begins by supplying the needs of a different group that corporations value and feel overserved by them. Companies with low-end disruption do not create products, instead create new business models that are able to lower cost and consequently offer cheaper products.

New-market disruptors: innovations that create a whole new market by focusing on consumer characteristics and providing something they want or need that was not perceived before.

For Nagy et al. (2016), disruptive innovation is defined by the adoption of its characteristics. To redefine the concept, the authors shift focus from market characteristics, new market and low-end innovations to an innovation with radical functionality, discontinuous technical standards and / or new forms of ownership that redefine market expectations. They define that radical functionality is an innovation that provides the user with the ability to accomplish something that would previously be impossible to do. Discontinuous technical standards are recognized as having the potential to change existing markets.

### **Innovative Business Model**

The journey that an innovative business model follows, according to Christensen et al (2016), has only three stages. One of creation, where a “work to be done” will be developed, something for which the consumer gives significant value, made by a group of people who are totally focused on that. This phase is one of questions, data gathering, “experimentation” as addressed by Chesbrough (2010), where the company will generate business. The second stage is “sustaining innovation” where the company has the ability to build a process by which the customer wishes to see developed. The journey will move to the last phase when what moves it is no longer what consumers want, but revenue, competitors, costs and gains of scale. After the three phases, the business model tends to become more rigid, with a well-defined structure and processes becoming increasingly inflexible to change.

De Jong and Van Dijk (2015), on the other hand, approach the business model in a different way, talking about the beliefs that need to be broken when developing an innovative business model and cite five steps for its development, as follows: 1st: describe the business model dominant in the sector studied; 2nd: break down the most important belief of this sector; 3rd: have a radical idea about the business model; 4th: make a sanity test (reason) on your idea; 5th: overcome common beliefs about doing business.

Chesbrough (2010) writes about the three phases that innovative business models have. In the experimentation phase, the company needs to estimate the cost of conducting a trial in the market (e.g. introduce a new product) and the time required to obtain the results data and information from experimenting the new business model. The Effectuation phase, where the people involved focus more on acting than analyzing, so that more information is generated. Organizational leadership, the third phase, in which the responsible for experimentation is

defined and he is in charge for the interaction between all areas. It may be that this involvement causes conflicts, so it requires a leader with skills for the interdependence.

## **Startups**

Blank (2010) defines startup as being a company, a partnership or temporary organization designed to search for a repetitive and scalable business model. For Linna Jr. (2016), startups involve more than just technology companies, and even new divisions in a company and/or nonprofit organization, based on an innovative business model, can be included in this category. It differs from a small business because this is focused in profit and stable growth in long term.

For Ries (2012), a startup is a human institution designed to develop new products and services under conditions of extreme uncertainty and considers only essential processes for their operation. It can also be defined as a company working to solve a problem where the solution is not obvious and success is not guaranteed (Robehmed, 2013). These essential processes involve hypothesis validation by rapid testing, customer knowledge, and a disciplined approach to product development (Grando, 2016). This is the concept of Lean Startup. It is a way of considering new and innovative product development that emphasizes fast interaction and consumer perception, great insight and great ambition all at the same time (Ries, 2012).

Bonzom and Netessine (2016) state that a corporation can help startup with credibility, offers the validation of startup services / products to potential investors, brand management and co-marketing as a form of partnership. Yet, distribution and production as well as access to suppliers can be shared with the startups.

## **Relationship or Engagement**

With startups increasingly driving disruptive innovations that are replacing technologies from large and traditional companies and also replacing their current business model, partnerships with these potential disruptors may be beneficial for both of them due to the difficulty of the large company getting disruptive innovations from themselves (Mocker, Bielli and Haley, 2015; World Economic Forum, 2018).

The common goal between them is to grow their companies, improve their competitive positions and generate revenue. Differences such as agility versus static processes, diverging work ethics and different levels of risk tolerance should be issues to consider when analyzing engagement proposals and their processes (World Economic Forum, 2018).

This section displays many common types of engagement or relationship between a corporation and a startup. Corporate Venture Capital (CVC) is one of most common types. According to Bonzom and Netessine (2015), based on Forbes Global, over 60% of companies engage with startups through investment funds. This investment, rather than being sold, can be increased in particularly promising startups. For Mocker et al. (2015), the acquisition of startups is a logical extension of Corporate Venturing and can be a fast and impactful way to buy complementary technology or capabilities that solve specific business problems and/or enter new markets. Well-known examples were the acquisitions of WhatsApp and Instagram by Facebook, Waze by Google, and LinkedIn by Microsoft (Bryan and Hovenkamp, 2019).

Another traditional mode of engagement that Weiblen and Chesbrough (2015) address is Corporate Incubation, which originates from ideas developed within the organization, called inside out. These ideas, however, do not fit the essence of the business model of the company, and therefore a spin-off is created to take them to market. This spin-off can even be considered a startup. They also advocate outside-in, which consists of adapting existing startup technology

to the corporation, making it accessible and useful by incorporating it into the current business model.

The Startup Program (or Platform) is the inside-out that seeks to encourage external innovation to drive an existing corporate innovation and its objective is to get startups to build their products using resources provided by the corporation to expand its market.

These two types of engagement – inside-out and outside-in – are illustrated in figure 2.

	<b>Innovation flow direction</b>	
<b>Equity</b>	<b>Outside-in</b>	<b>Inside-out</b>
<b>Yes</b>	<b>Corporate Venture Capital</b> Participate in the success of external innovation and gain strategic insights into non-core markets.	<b>Corporate Incubation (spin-off)</b> Provide a viable path to market for promising corporate non-core innovations.
<b>No</b>	<b>Startup Program (outside-in)</b> Insource external innovation to stimulate and generate corporate innovation. (like: corporate accelerators)	<b>Startup Program (platform)</b> Spur complementary external innovation to push an existing corporate innovation. (like: app stores and cloud-computing freemium startup programs)

Figure 2 – Types of engagement (source: Weiblen and Chesbrough, 2015)

Other types of engagements that have emerged over time, to complement traditional ones, are now essential for startups to thrive. They are described below.

Matchmaking and connections are one way of relationship that provide networking and connections between startups and large companies that want to engage with them (100 open startups, 2017). Training and mentoring, also known as support services, are relationships sponsored by large corporations to provide mentoring and training to startups, using their own experts or through external consultants (100 open startups, 2017; Bonzom and Netessine, 2016).

Contracting a pilot project is another type of engagement where a company implements a pilot project from a startup to prove the viability of the project, having in mind a future supply contract (100 open startups, 2017; Younis and Desai, 2019).

Accelerators are short term programs consisting of education, mentoring, workspace and resources that the company provides to help startups during the construction and launch of their ventures (Kohler, 2016; Cohen et al., 2019). It focuses on small teams and not individuals (100 open startups, 2017).

Co-working spaces are places where corporations and startups can work side by side (Mocker et al, 2015). Google Campus is a space for startups with connection programs and mentoring, mixing training with mentoring relationship and coworking. Another well-known example is Itaú's CUBO, where several companies and startups share the same space in search of innovation, learning and partnerships, developing ideas and relationships in a very similar to Google Campus (100open startups, 2017)).

Events such as hackathons and competitions are promoted by corporations to attract startups. Hackathons are movements that foster the partnership of large companies and small groups in the creation of startups (100 open startups, 2017). Consisting of a marathon in which several

teams, with experts such as programmers and graphic designers, have an intense collaboration, with limited time, to develop a project that solves with innovation a challenge that a corporation has (Newton, 2015; Briscoe and Mulligan, 2014; Mocker et al., 2015).

Figure 3 displays some types of engagement between corporation and startup and their main objectives and expectations (Brigl et al., 2019).

	Tool >	Rationale	Primary objective	Functional benefits	Degree of control over investment	Timing of revenue impact
Time to impact Shorter Longer	<b>M&amp;A</b>	Gain access to resources, capabilities, revenue, or clients	Acquire established or startup companies	Gain transaction and integration experience	Significant control (if a majority stake is acquired)	New short- and long-term revenue
	<b>Partnership</b>	Increase the competitiveness of an offering	Gain access to a complementary technology, product, or service, usually without a large financial commitment	Learn agile ways of working and the latest developments in an industry segment	Joint control	New short- and long-term revenue
	<b>R&amp;D</b>	Develop core or adjacent businesses	Incrementally improve existing products or services	Continually develop expertise in a core or adjacent business	Full control	New short- and long-term revenue
	<b>Innovation lab</b>	Rapidly prototype new products and services, and test new ways of working for the company	Convene teams of in-house innovators for rapid prototyping and market testing of new products and services	Build digital capabilities and a startup methodology; win and retain talent	Full control	New long-term revenue
	<b>Incubator</b>	Find and nurture startups that can fill a specific need	Strengthen the core business, and leverage external R&D potential	Become part of the startup ecosystem; win and retain talent	Full control	New long-term revenue
	<b>Accelerator</b>	Promote business development, and capture new thinking	Explore wider search fields for corporate development and growth options; have first pick in case of promising startup business	Become part of the startup ecosystem, and create a deal pipeline; win and retain talent	Full control if internal; limited or no control if external	New long-term revenue
	<b>Corporate venture capital</b>	Learn about or gain access to disruptive and new opportunities	Invest in disruptive and new business opportunities, and create growth options	Become part of the startup ecosystem, and create a deal pipeline; win and retain talent	Limited or no control if small share	New long-term revenue

Legend:  Traditional innovation tools

Figure 3: The most common types of engagement

## METHODOLOGY

We started verifying the evolution, from 2017 to 2019, of the existing engagements that Brazilian corporations had with startups. We used the database of the e-book “100 Open startups” (2017), where 111 companies had engagements with startups back in 2017, thirteen were discontinued totaling 98 companies in 2019.

In order to increase this sample, we used the 2019 edition of magazine “Exame” with the list of 500 Melhores e Maiores (Best and Biggest companies). We run through this list till position top 65th company. The revenue of these top 65 companies represents 54% of the 500 Melhores e Maiores total revenue. Eighteen of them were already in our initial database of 98 companies, eighteen had no single type of engagement with startups and only 29 (with engagements) were added to our sample, totaling 127 companies

The search for companies, programs and relationships happened in 3 steps, which were repeated for each company of the database:

a) look into search tools like Google, LinkedIn, Facebook, with company name followed by “startup” e.g. “Accenture Startup” to find some news, like articles in newspapers, magazines and blogs about possible engagements. If nothing was found, other words were added after the company name, such as “innovation” or “digital transformation”;

b) another way was to look into the company's institutional channel for programs and relationships it has with startups. As an example, see figure 4:

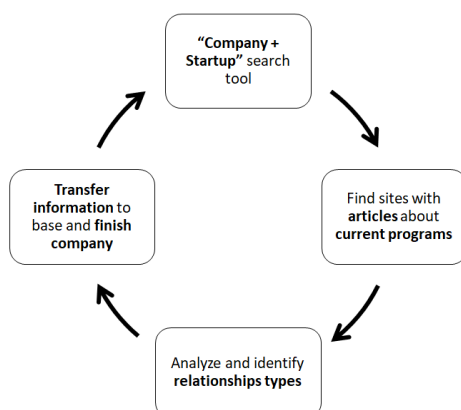


Figure 4 – Benefits for the participants of Mining Lab of the company Nexa (access on 10/25/2019 <http://www.mininglab.com.br/pt/>)

After searching for the company “Nexa startup”, the site Mining Lab was found, in the tab “benefits for participants” it was possible to see the various types of engagement: expert mentoring, project development investment, in line with the “pilot project development resources” relationship, Matchmaking and connections, i.e., access to company’s network and partnerships, which fall into "pilot project contracting" and "providing innovative service or product".

c) once the programs are found, they were connected with the respective relationships and start the process again.

Figure 5 displays the research cycle used.





## Figure 5 – Research cycle

The programs are the means by which a company engages with the startups and are classified in this paper in three types:

- Own program: Corporations like Itaú, Bradesco, Votorantim and Natura created their own entrepreneurial hub (named Cubo, Inovabra, Votorantim Hub and Natura Startups respectively) to connect in the same space entrepreneurs, investors and startups in search of new business opportunities. For a startup to be a resident or a member of a hub, it must offer a scalable solution that has already been tested by customers or in process of testing.
- Shared Programs: Several companies sponsor a program that is fitted to specific startups that would probably evolve to partnership. These programs are usually run by another non-profit or profit organization (Program Startup-Indústria has sponsors from 3M and Natura).
- Program / Company: acting in two ways: like a corporate accelerator that helps companies create open innovation programs with startups and internal entrepreneurship actions (Liga Ventures and ACE) and/or as a platform connecting companies and startups (100 Open Startups).

We also sent a qualitative questionnaire to corporations asking the reasons for engaging with startups and the disadvantages for doing so. The same with startups asking their reasons for engaging with corporations. We sent it to 80 corporations and 130 startups and received only 7 and 13 responses respectively from them.

## RESULTS

We divided this section in 3 parts – results from the database of 100 Open Startups, results expanded with the 2019 edition of magazine “Exame” and the qualitative responses from corporations and startups.

### Results from the database of 100 Open Startups

There were 111 companies with 300 engagements with startups through 129 programs in this database back in 2017. Thirteen companies were discontinued along with 33 programs and 44 engagements. On the opposite direction, 94 new programs and 294 new engagements were added as can be seen in the table 1. There was a huge increase in programs and engagements (47% and 83% respectively) despite the decrease in number of companies.

Table 1: Evolution from 2017 to 2019

	2017	Discontinued	New	2019
Company	111	13	-	98
Program	129	33	94	190
Engagement	300	44	294	550

This position in 2019 can be broken down by industry sector (see table 2). No surprise the Technology and Innovation is the leading sector in number of companies / programs /

engagements. High tech equipment industry and Communication can fit into this sector. This is followed by Financial Service, considering the activities performed by the banking system, insurance services and real estate services, and Energy because these companies are searching new alternative and clean sources, biofuel and renewable energy. These five sectors represent 48% of companies of our sample, 51% of the programs and 49% of engagements.

Table 2: Break down by industry sector

	Company	Program	Engagement	New programs	New engagem.
Technology and innovation	21	42	115	21	62
Financial Services	12	26	74	14	57
Energy	6	14	39	8	22
Telecommunication	4	10	29	6	19
Automakers	4	5	13	1	4
Others	51	93	280	44	130
Total	98	190	550	94	294

Looking to the engagements (total of 9 types), the top seven types represent 78% of the total. See table 6.

Engagements being matchmaking and mentoring the top two of the list followed by pilot project contracting, coworking and corporate venture.

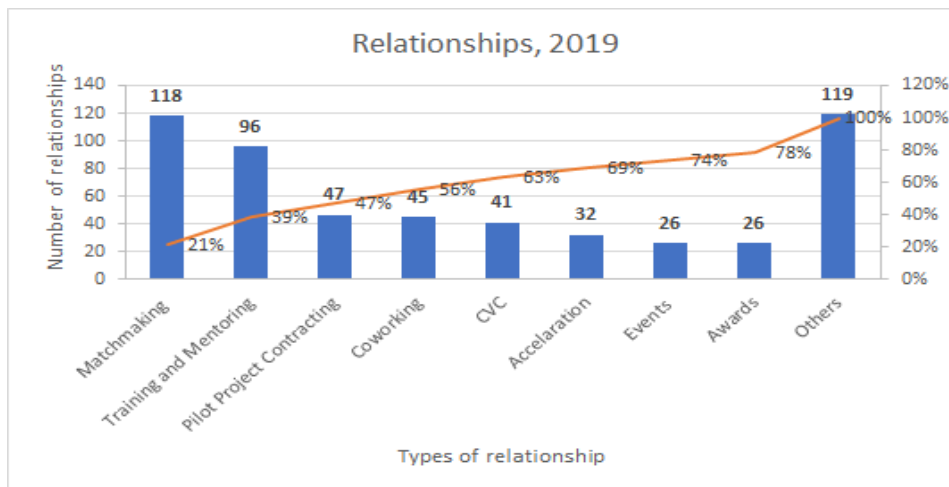


Figure 6: Types of engagement / relationships

Results expanded with the 2019 edition of magazine “Exame”

This sample of the 98 companies was expanded with the 2019 edition of magazine “Exame” and resulted in addition of 29 companies, 40 programs and 108 engagements making the sample bigger. It can be seen on table 3.

Table 3: Position in 2019

	2019	Additions	2019 plus Exame magazine
Company	98	29	127
Program	190	40	230
Engagement	550	108	658

This sample post Exame Magazine can also be broken down by industry sector (see table 4). The top 3 sectors in the previous breakdown continue the same – Technology and Innovation, Financial and Energy. Retail sector did not stand out in the previous database (there were only three companies in 100 Open Startup database) and shows now as the 4<sup>th</sup> most important sector in companies, programs and engagements with startups. There is a growing interest by them in exploring new ways of digital trade marketing and distribution and in new platforms such as omnichannels in order to face fierce competition and cut cost. Energy and Retail were the sectors that had the most new companies (8 and 5 respectively), programs (9 and 11) and engagements (36 and 30). Two sectors that did not appear in this research and should be part due to Brazil relevance are Oil and Nature Gas and Health Care. Oil and Nature Gas contemplating fossil fuel market and natural gas and Health Care with the areas of molecular biology, medical biotechnology, pharmacology and medical devices.

Table 4: Break down by industry sector post Exame Magazine

	Company	New Companies	Programs	New programs	Engagements	New engagements
Technology and Innovation	21	0	42	0	115	0
Financial Services	13	0	26	0	74	0
Energy	14	8	23	9	75	36
Retail	8	5	13	11	32	30
Automotive	6	2	7	2	15	2
Telecommunication	5	1	12	2	33	4
Others	60	13	107	16	314	36
Total	127	29	230	40	658	108

Focusing now on engagements post Exame Magazine, the types of engagements follow the same pattern as of the previous database. The top seven types are the same compared with the

previous database and continue representing 78% of the total engagements. Matchmaking and mentoring continue the top two of the list followed by pilot project contracting, coworking and corporate venture. See figure 7.

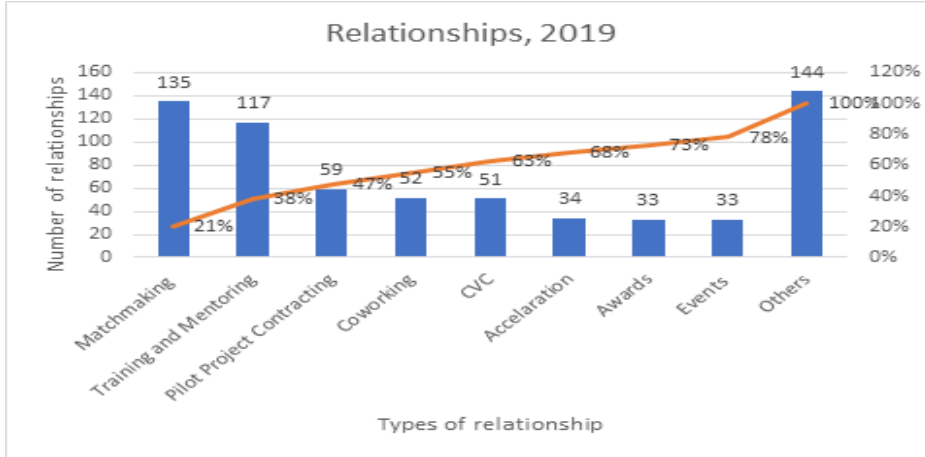


Figure 7: Types of relationship post Exame Magazine database

Comparing the results of relationships of the two databases, the biggest increases were in pilot project contracting (25,5%), corporate venture (CVC) (24,3%), awards (26,9%) and events (26,9%). See table 5.

Table 5: two databases compared

Types of relationship/ engagement	100 Startup database	Open post Exame Magazine database	% variance
Matchmaking	118	135	14,4
Training and mentoring	96	117	21,8
Pilot Project contracting	47	59	25,5
Coworking	45	52	15,5
CVC	41	51	24,3
Acceleration	32	34	6,2
Awards	26	33	26,9
Events	26	33	26,9
Others	119	144	21
Total	550	658	19,6

Bonzom and Netessine (2016), using the ranking of Forbes Global 500 (top 500 world listed companies), found that 52% of them were engaged with startups. The top three types of engagement were CVC (62,6% of them), 29% through events and 24,4% through acceleration.

As far as programs are concerned, Own Program is the top with 110 programs out of 230 (48%) followed by Program/Company with 75 (33%) and Shared Program with 45 (20%). It is clear that companies prefer to create their own entrepreneurial hub to connect in the same space entrepreneurs, investors and startups. See table 6

Table 6: types of program

types of program	Quantity	%
Own program	110	48
Shared program	45	20
Program / Company	75	33
Total	230	100

The programs and industry sector are detailed by types of program (table 7). The ranking of each of the program types follows the same ranking of industry sector, being T&I the top with 42 programs followed by Financial with 26 and Energy with 23.

Table 7: Programs and industry sector

Sector	Own program	Shared program	Program / Company	Total
T&I	21	7	14	42
Financial Services	10	4	12	26
Energy	12	3	8	23
Retail	4	3	5	12
Automotive	1	1	5	7
Telecommunication	6	2	4	12
Others	56	25	27	108
Total	110	45	75	230

### **Qualitative responses from corporations and startups.**

We have asked companies and startups the reasons for engaging with each other and the disadvantages for doing so. Table 8 displays the results of our questionnaires from corporations and startups.

Table 8: Results from the questionnaires

Responses from corporations	Responses from startups
<ul style="list-style-type: none"> <li>- working with people with outside “the box” thinking</li> <li>- have freedom to make mistakes in the creation/development process</li> <li>- create and promote an innovation environment and digital transformation inside the organization</li> <li>- have flexibility to form strategic partnerships to meet the final consumers market</li> <li>- become eligible to challenges exposed to startups community, thus following the market opportunities</li> <li>- capillarity, knowledge of small business, appropriate innovation culture inside the organization</li> </ul>	<ul style="list-style-type: none"> <li>- favorable environment to interact with other companies and gain visibility</li> <li>- higher status, success case, get knowledge and open doors to the market</li> <li>- positive reputation to be associated with relevant companies/brands, besides validating the quality of our products and services</li> <li>- allow us to develop and test our solutions on a bigger base of consumers</li> <li>- increase visibility and credibility in our clients, strengthening the brand and expanding customer base</li> <li>- win / win situation for both parties</li> </ul>

From Younis and Desai survey (2019), most companies engage with startup to gain access to new technology (92%), 56% of companies are trying to execute a pivot or transformation of their business, gain access to talent (46%) and reach new customers (45%). These responses expanded what is written in the Introduction providing new reasoning of why the corporations engage with startups.

However, there are some few disadvantages for engaging that corporations mentioned:

- High mortality rate of the startups
- Lack of processes in the startups
- Few cases to validate the performance or success of the products and services
- Risk of non continuity / business interruption
- Low business volume
- Tradeoff between the efforts and resources put into startups versus financial results obtained can be no beneficial to corporation.

In this same line, Brigl et al. (2019) listed various reasons why this partnership fails on both sides. The top two reasons on corporate side were no mutual recognition or cooperation on an equal footing and no clear steering and governance. On the startup side hard and lengthy decision making and no ability and willingness to move at same speed. Please see figure 8 for the complete list of reasons.

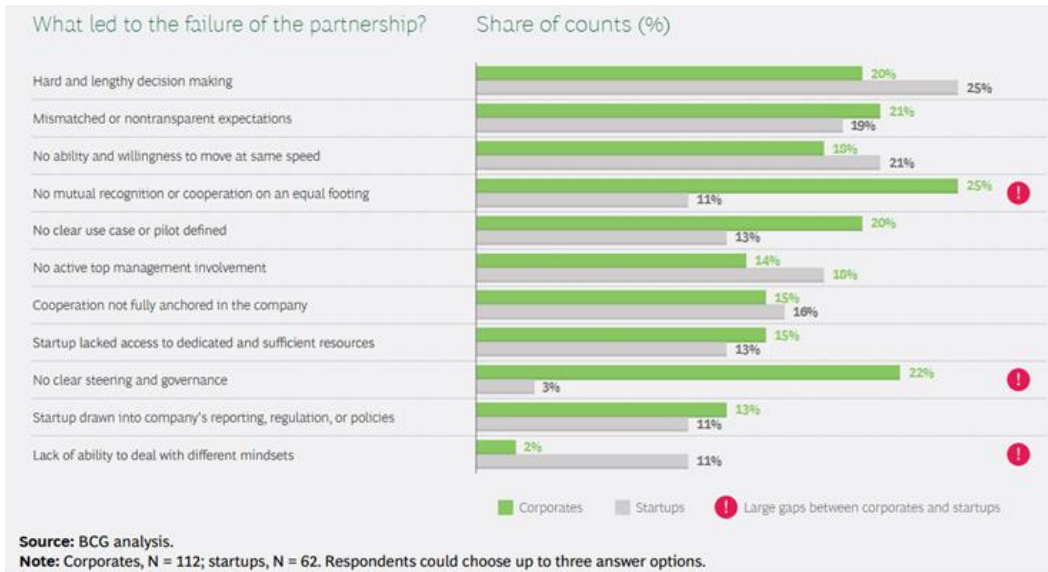


Figure 8: Reasons of failure

## CONCLUSION

According to the site Get2Growth (<https://get2growth.com/how-many-startups/>), startups are everywhere, and the number of startups is growing at a faster rate than ever before. The global startup economy continues to grow, creating \$2.8 trillion in value between 2016 and 2018. This is a 20.6% increase from the previous period and more than double what it was just five years ago. (Startup Genome, 2019). This is also true in Brazil where besides the growth of number of startups there was also an increase in the programs and engagements between corporations and startups. According to Salles (2018), using the 2017 edition of magazine “Exame”, 30% of the top 100 companies had engagement. As mentioned in the Methodology section, 47 companies of the top 65 (72%) in the 2019 edition of magazine “Exame” were involved in any type of engagement. Considering that the base of companies (100 versus 65) is similar, we can state that there was a significant increase in two years.

Both corporations and startups can use the results of this research to outline a strategy for innovation and engagement in order to improve their performances. Startups everywhere are experimenting with new business models to reinvent traditional industries — or create entirely new ones. On the corporation side, the companies can also build on the key relationships, mentioned in this research, to create programs that aim to achieve the same goals.

Creating a successful startup is a balancing act amongst many variables simultaneously often amidst environments of extreme uncertainty and volatility. One of the most important balancing acts is between The Inner Dimensions Customer (Relationship, Product, Team, Finance and Legal) and The Outer Dimensions (Users, Customers, Product Usage and Revenue) of a startup. Startup Science discovered that the primary reason startups fail is that their Inner Dimensions get ahead of their Outer Dimensions (Startup Genome, 2019). This is one strong reason for startups to engage with corporation and gain experience in scaling and sustaining the business.

A limitation of this study was the small number of responses from companies and startups. A bigger number would provide a more in-depth insights and help to outline the strategy for innovation and engagement as mentioned above. Suggestion for a future research is to have personal interviews with the executives responsible for the engagements in both sides.

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