The Political Economy of Brazilian Industrial Policy (2003 - 2014): Main Vectors, Shortcomings and Directions to Improve Effectiveness*

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INTRODUCTION

Industrial policy was a key component in the brazilian industrial development process from the 1930s to the 1970s. In the 1980s, a severe macroeconomic crisis led to the abandonment of the strategy, while industrial policy was an afterthought under liberal policies in the 1990s. In 2003, the victory of a center-left government resulted in the revival of the policy. The objective of this paper is to investigate the main vectors of the industrial policy adopted during the 12 years (2003-14) of Workers' Party (Partido dos Trabalhadores - PT) governments. It addresses how the efforts were undertaken, the main problems involved and how the policies should be improved to deal with the serious shortcomings of brazilian industry. In doing so, the article also represents a general reflection about industrial policy and its role in promoting development.

Firstly, I intend to summarize arguments regarding the need for industrial policy, how it should be implemented, and how to avoid the mistakes that characterized previous experiences. The success of the

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policy is favored when it reaches a certain degree of social consensus. I argue that it is possible to agree on several matters related to procedures, institution building and instruments that tend to increase the chances of success.

Industrial policy tends to be very controversial. This is explained in part by it touching upon a key issue that has marked economic science since its foundation: the division of responsibilities between the State and the market. Secondly, the controversy has to do with methodological issues: many economists are trained in both deductive and quantitative methods, while others tend to rely largely on both historical and institutional approaches. Thirdly, there is a strong ideological element to the debate and the fact that different policies have distinct political impacts. Monetary, regulatory and exchange rate policies, for example, have very distinctive effects upon different economic groups, including both international banks and firms. For all these reasons, industrial policies have a strong element of political economy, which is critical to understand national trajectories and their respective chances of success.

Divergence is paramount in the history of economic development. Since the end of World War II, there has been many strategies attempting to promote industrialization, but only a few are considered uncontested successful cases. There is huge controversy about the role State intervention plays. Neoclassical economists tend to be skeptical: they argue that industrial policies were applied everywhere and in most cases the results were negative. In the few success cases, such factors as human capital and correct macroeconomic policies are claimed to be the responsible (Pinheiro, Ferreira, Pessoa and Schymura, 2006)

By contrast, structuralist development economists analyze the successful cases and argue that State guidance and industrial policies were a key part of the process (Johnson, 1982; Chang, 2006). According to this group, States played a major role to encourage investments in new sectors, nurture competitive firms and strengthen technological capacity. A crucial variable is the State's capacity to coordinate the strategy and induce private sector activity (Evans, 1995).

It is important to emphasize that the nature of the object also leads to controversy. Industrial policy's transmission mechanisms are complex and hard to understand. In addition, it is hard to separate its effects

from others and there is also the question of endogeneity to address causality (Devlin and Mogullansky, 2011)[1]. Thus, it is impossible to find uncontested evidence. The skeptics argue that the fact that successful countries adopted selective industrial policies is not evidence that it works. By contrast, the supporters believe that, if well implemented, industrial policy tends to work and should not be avoided only because of the neoclassical theory's argument. An argument in favor of the policy is that most countries that caught up recently adopted systematic intervention programs to upgrade industrial structure (Shapiro, 2007).

In the 1980s and 1990s, neoliberal ideology prevailed: failure in much of the developing world was attributed to excessive State intervention. Liberalization of market forces was considered a requisite to produce balanced development strategies. Latin America widely embraced this strategy (Panizza, 2013). Despite achieving price stabilization and improving macroeconomic performance, the results were disappointing. The increase in exports and in foreign direct investment failed to aggregate value and encourage other economic sectors. There were limited impacts on employment, productivity did not increase significantly and most of the countries suffered *reprimarization* of exports and precocious deindustrialization processes (Palma, 2011). The failure of neoliberal policies brought to power governments that promised to resuscitate industrial policy. The objective of the article is to investigate how it happened in Brazil and how changes are required to tackle the serious problems inherent to brazilian industry.

A key contribution of the article is to emphasize the failures both in the design and in the implementation of industrial policy, which is highlighted using successful experiences around the world as a benchmark[2]. The paper is also very concerned with the impasses of the brazilian model and with the necessary steps to develop the country. Despite the vicissitudes of the government elected in 2018, the matters with which this work deals are considered crucial for national development.

The paper relies mainly on the existing academic literature, including books, articles and PhD dissertations. There were two interviews, involving a major expert in brazilian industrial policy and the Industry Minister at the period. In sections that deal with contemporary issues, it also relies on newspapers articles written by academics and experts.

The following section explores basic general issues on why industrial policy is necessary. In section 3, I draw from successful experiences and bring factors and procedures that contribute to successful industrial policy implementation. Sections 4 to 6 explore different stages of the recent industrial policy in Brazil. Section 7 highlights deficiencies and directions and deals with other major issues that influenced the policy results.

INDUSTRIAL POLICY: WHY IS IT NECESSARY?

The definition of industrial policy is very broad, including a diverse range of measures aimed at promoting industrial growth, strengthening industrial structure and increasing productivity, competitiveness and employment, among other objectives. Horizontal policies, including investments in infrastructure, education, training and Research and Development (R&D), tend to be widely accepted; divergence emerges when it comes to selective intervention aimed at promoting specific sectors. The argument of the neoclassical economists to oppose them is that bureaucrats are not better positioned than businessmen to know the best sectors to promote[3].

A major issue in this controversy is if the types of goods that a country produces affect development prospects: does it make any difference to produce complex and elaborated goods rather than basic and simple ones? According to mainstream economists, what matters is the capacity to produce in a competitive way (Lazzarini, Jank and Inoque, 2013). This justifies the decision to focus on products in which the country has comparative advantage, the attempts to depart from this rule being the main cause of industrial policy failures (Lin and Monga, 2013).

On the other hand, structuralist authors argue that there are important reasons to diversify. Hirschman (1958) gave great emphasis to the first one: it is necessary to stimulate goods whose linkage effects push the development of other sectors and induce investment. This is what development is about: a process able to create tensions and unbalances, producing transformation in other parts of the economy. The problem with concentrating on primary goods is that these products have little capacity to induce transformation. A second reason is that elaborated products increase the chances of differentiation and of obtaining higher profit margins (Cimoli, Dosi and Stiglitz, 2009a).

Thirdly, when a country advances, wages rise and it tends to suffer competition from poorer countries, which demands the development of other sources of competitiveness[4].

On this matter, Hausmann and Rodrik (2006) provided an original contribution. The argument is based on the notion of productive capabilities: when a country produces certain goods, it accumulates capabilities that increase the chances of successful diversification to adjacent activities[5]. A major point is to identify affinities in the productive chain, which the authors compare to a forest. For a respective country, it is easy to jump (diversify) to neighboring trees, i.e., to sectors which share technical and productive requisites; to jump from garments to electronics may be too big a step.

A major point is that the property rights that matter in this case are those specific to sectors[6]. When a country does not have the requirements for certain economic activity, they need to be provided, which creates conditions to turn productive activities attractive to the private sector. Countries with a very simple and restricted productive structure face the worst situation. It is very hard for them to produce the necessary requisites[7].

Another reason to upgrade industrial structure has to do with the fact that certain goods are intensive in learning and knowledge and tend to have spillover effects on the economy. Innovation is one of the main sources of productivity, competitiveness and economic growth. Thus, the advance towards knowledge-intensive goods, although involving significant challenges, is a central objective that a development strategy must pursue.

In light of these arguments, a clear direction for developing countries is to aggregate value in goods in which they already have comparative advantages. However, this does not exclude feasible and well-designed strategies that aim to produce linkage effects and stimulate future diversification. The major point is that a country should not accept the argument that the best strategy is to concentrate on the production of a few elementary goods and wait for the advantages of trade specialization[8].

Productive diversification and the advance in Research and Development (R&D) imply risks and the costs inherent to the learning process, which requires both policies and incentives. There are two major concepts: market failure and externalities. In activities that involve risk, the expected return on private investment may be lower than social return. Thus, investments with potential to bring positive effects to society may not be undertaken. One important example is the "first mover externalities": when moving to a new sector, a firm may suffer high losses in cases of failure, while in cases of success it may face difficulties in curbing imitation and in retaining the fruits of innovation. A second case involves complementary investments, in which investments are only profitable if they are made together. In brief, externalities tend to be present in activities that imply diversification, learning and innovation, justifying policies to support the investment (Hausmann and Rodrik, 2006).

However, externalities are not the only reason to intervene. Innovation is an interactive and non-linear process, which benefits from interactions between firms, universities, suppliers, clients, R&D institutes and other players. The government tends to play an important role in building Research and Development framework, socializing both its costs and its results, undertaking research and stimulating public-private consortiums (Cimoli, Dosi and Stiglitz, 2009b)[9].

Mazzuccato (2011) is highly convincing when demonstrating how a government's role in spurring innovation is much wider than usually accepted. Large-scale governmental investments were the engine behind the development of many technologies that became critical for future cycles of investment, including the internet, genetic sequence, the pharmaceutical industry and biotechnology. Governments went much further than funding innovation and approximating science and technology; they opened windows, detected opportunities and engaged in very uncertain research activities. Rather than just supporting or correcting markets, governments created them.

Advances in both knowledge and innovation depend on the firms' engagement in R&D activities. This is more probable in industry, where firms are larger, maintain R&D departments and employ many researchers and scientists. Strong inter-sectorial linkage effects and high-learning spillover effects also mark the industrial activity. Nich-

olas Kaldor emphasized the critical role of the industrial sector a long time ago. He stressed the strong correlation between industry's performance and increases in productivity (Palma, 2011).

IMPLEMENTING A SUCCESSFUL INDUSTRIAL POLICY

A second step is to better understand the factors responsible for successful industrial policies. As Devlin and Moguillansky (2011) emphasize, the literature has not fully understood the "how" of industrial policy in terms of process organization, internal organization of the government and implementation. However, previous experiences teach important lessons. The notion of embedded autonomy, developed in Peter Evans' (1995) authoritative work, captures important requisites to the success of industrial policies[10]. A critical challenge, as explored below**,** is how to develop embedded autonomy in democratic contexts and in countries in which state-society relations are quite different from the paradigmatic East Asian cases[11]. Democratic contexts require not only the bureaucratic element of state capacity, but also the political dimension related to legitimacy and to the achievement of political support (Queiroz-Stein, 2016; Doner, Hicken and Ritchie, 2009).

Mushtaf Khan (2007; 2013; 2015) makes a highly original contribution. According to him, a key challenge for developing countries is to acquire the capacity to produce, in a competitive way, goods which technology has already made available to world markets. The process involves a tremendous learning effort, given that much of the knowledge is tacit, inherent to the routines of the productive process. A team has to be trained and skills have to be achieved in many stages, including the setup of the factory, the use of machines, the establishment of quality control systems and the provision of post-sales services.

Success at this stage demands certain capacities and requisites, such as managerial capacity, work force skill and access to the necessary inputs and services at competitive prices. However, the firms must make a huge effort and commitment towards the learning process. This process is uncertain and involves risks, since the firm tends to produce at higher costs than its main competitors. There must be both incentives and policies.

Once rents are conceded, a key factor is to ensure that the producers are in fact conducting an engagement in the learning effort, and not accommodating and lobbying to turn the incentives permanent. In most of the previous industrial policy experiences, firms did not succeed in the learning process. According to Khan (2015), a key reason was the governments' inability to compel firms to engage in the necessary effort.

In the successful cases of South Korea and Taiwan, States were strong and there was little interest in protecting losers. Thus, the government could commit itself to remove incentives in the case of failure. However, State-society relations are vastly different in most developing countries. Business groups could shape alliances inside the State apparatus and ensure the preservation of the incentives[12].

Khan's analyses make a significant addition to understanding why industrial policy failed in most cases. There are examples of how to create mechanisms to improve the chances of success in countries with imperfect governance. A good example is India's agreement with the japanese firm *Suzuki* in the 1980s. *Suzuki* was invited to form a joint venture with national producers, and it was committed to produce, in a five-year period, a high-quality model with a 60% domestic component content. In the case of success, the prize would be free access to the indian market, while competitors would keep paying import tariffs of 85%. The arrangement gave the company the incentive to increase productivity and to collaborate with the indian partners. The experiment turned out to be highly successful, creating both organizational and competitiveness skills and subsequent application to other companies (Khan, 2015).

Another important contribution comes from Hausmann, Rodrik and Sabel (2008), according to whom the key issue in development policy is the successful concretization of new activities and the consequent accumulation of sectorial productive skills. The process involves an institutionalized partnership between the government and the firms, which is necessary to identify both niches and obstacles. Cooperation should be permanent, since institutions and markets co-evolve and transaction costs tend to be revealed when opportunities emerge.

A second requisite is to provide the industrial policy councils and organs with the instruments and capacity to decide on the allocation of resources, as necessary to give effectiveness to the policies upon which

they deliberated. The industrial policy apparatus should have a source of independent financial resources, a pre-condition to respond with agility. Business participation tends to be discouraged if participants see that deliberation and decisions do not have practical consequences (Hausmann, Rodrik and Sabel, 2008).

Another principle is that actions should focus on increasing both productivity and skills and not on protecting low productivity sectors. By centering on precise objectives, the purpose is to pursue a more focused action, to provide transparency and to facilitate evaluation. Therefore, actions aimed at protecting sectors or regions in difficulties, although significant, must be the object of other policies. It is also important to establish ex-ante success criteria and make clear, from the beginning, that the incentives are temporary.

A related requisite is the capacity to permanently monitor and evaluate the process, detecting the factors that hindered the achievement of the goals. The promotion of self-discovery is uncertain and mistakes are inherent. In addition, evaluation is also a precondition to achieve transparency and legitimacy. Industrial policy tends to be favored when it is made clear which are the main instruments and how they are employed in order to achieve strategic objectives. They should be clear and presented as a matter of national interest, a precondition to provide the support and time necessary to produce the expected results. As Rodrik, Hausmann and Sabel (2008) conclude, the industrial policy arrangement, if well designed and with the necessary political support, can lead to a win-win game.

Devlin and Moguillansky (2011) provided another important contribution for the "how" of industrial policy. They summarized both the policies and the organization of the industrial policy apparatus in ten of the fifteen countries that, since 1960, managed to close the per capita income gap as compared to the United States by at least 10%. Most countries adopted systematic proactive policies aimed at creating comparative advantages[13]. They took on industrial diversification and export upgrade strategies, and in several of them long-term strategies came together with multiyear plans to allocate resources.

The cases investigated led to important conclusions. Firstly, the creation of well-prepared bureaucratic agencies and the consolidation of an *esprit de corps* played an important part to integrate the bureaucracy

and to provide coordination forms. A certain degree of institutionalization in State-business relations is also critical to reduce the risks of capture, which tend to be significantly reduced when the objectives are clearly established, monitored and evaluated. A good example is Singapore, which shares a bureaucracy with a strong *esprit de corps*, a strong culture of accountability and an independent and powerful anti-corruption agency (Devlin and Moguillansky, 2011).

The organization of the bureaucracy and its relationship with the business sector are not enough. Another important component has to do with the capacity to manage conflicts, coordinate interests and build certain consents about key directions for national development. This provides an important role for participatory institutions and, more specifically, for councils, which, by joining representatives from the government, business, labor and civil society, may act as key spaces to exchange information, public-private coordination and to achieve consensus (Queiroz-Stein, 2016).

The adoption of clear and transparent recruitment rules and the inclusion of members who enjoy a high reputation in their respective groups tend to mark successful councils. Another key component is the existence of clear mandates and the support from top political authorities. In order to turn easier the achievement of consensus, the councils should adopt a forward-looking approach, avoid controversial issues and focus both on negotiation and on compromise. The support of experts tends to contribute to establish a common ground on which to address the main challenges. A very good example is the Irish National Economic and Social Council (NESC), which played an important role in the 1980s in laying the foundations for a wide social pact. It was also highly successful when it later turned to such matters as competitiveness and innovation (Devlin and Moguillansky, 2011).

Another major point is coordination capacity: industrial policy is complex, includes different instruments and depends on different policies. This involves political coordination, coordination with macroeconomic policy and administrative/management coordination (Suzigan, 2017). In the face of inter-bureaucratic conflict, industrial policy tends to be favored when it is the responsibility of a powerful industrial agency[14] or when it receives direct support from the President or the Prime Minister.

Another requisite is long-term thinking aimed at forecasting tendencies and future events, a step towards creating consensus about future possibilities. Forecasting practices tend to be more effective when undertaken in panels that bring together experts in the industry and researchers with multi-disciplinary knowledge[15]. A fifth major issue is the capacity to evaluate and to make assessment. Devlin and Moguillansky (2011) show that although only a few of the countries investigated had made impact assessments, most of them had increased their concern with the forms of policy assessment. The point is that assessment is not a trivial exercise, and that a rigorous assessment centered on empirical evidence is very difficult. An alternative is to combine methodologies, including control groups, econometric exercises and counterfactual subjective evaluations.

Finally, a major factor has to do with the capacity to obtain political support. Limited capacity to shape alliances, presence of persistent opposition and incapacity to achieve agreements tend to hinder the institutionalization of the policy on a long-term basis. The necessary political capacity depends on political and institutional factors, including the characteristics of the political system and the institutional factors that characterized the relationships among the Executive, Legislative and Judicial Branches (Doner, Hicken and Ritchie, 2009; Suzigan, 2017).

A good illustration is provided by comparing Singapore and Thailand. After focusing on the attraction of foreign capital, those countries tried to adopt policies to aggregate value, diversify production and develop technological capacities. In Singapore, the government was able to orchestrate several measures to strengthen training and higher education institutions and to improve both industrial and technological capacity. Policies were successfully adopted to bring scientists closer to firms and improve R&D infrastructure. The advances were critical to induce foreign capital to undertake more elaborate productive stages in Singapore (Doner, Hicken and Ritchie, 2009).

The results were very different in Thailand. There were many attempts to increase the quality of the universities, improve the training apparatus, promote industrial technical design and create technological agencies. However, they did not produce a consistent strategy. The difficulties concerned the political system, marked by many parties and very broad coalitions. The government had to distribute key min-

isterial and agency posts to political allies, which increased the number of veto forces and turned the policies vulnerable both to corruption and to patronage (Doner, Hicken and Ritchie, 2009).

In brief, this section highlighted experiences and aspects that contribute to understand the success of industrial policies. I am aware that there are other examples and aspects that deserve attention. The relevant point is that there was the inclusion of key aspects, which provided a broad and rich benchmark to investigate other industrial policy experiences.

THE REVIVAL OF INDUSTRIAL POLICY IN BRAZIL – 2003 – 2006

Industrial policy was a major component of the brazilian development strategy from the 1930s to the 1970s. However, it was strongly influenced by business interests. It used various instruments and there was the concession of incentives, but the policy makers could not make demands or condition the incentives to certain performance criteria (Evans, 1995).

After a serious macroeconomic crisis, Brazil finally achieved price stabilization in 1994, accompanied by a package of liberal reforms that included privatization, as well as trade and financial liberalization. Brazilian industrial producers suffered from a macroeconomic policy characterized by high interest rates and overvalued exchange rates and became an easy target for foreign takeovers. There were concerns about the fate of industry, but the initiatives were defeated by the resistance of the Finance Ministry, controlled by neoclassical economists, who were highly skeptical of selective industrial policies (De Toni, 2013). People believed that the market forces led to competitiveness[16].

The victory of the opposition in the 2002 election marked the shaping of a different development project. The president elected, Luiz Inácio Lula da Silva, from the Workers' Party (Partido dos Trabalhadores - PT), had built his career as a trade union leader and had the revival of industry as a campaign commitment. One of his main concerns was to co-opt a group of industrialists frustrated with neoliberal policies (Diniz, 2011). Lula's team included technicians who considered crucial the increase in the State's capacity to intervene.

The creation of the Economic and Social Development Council (CDES), with the objective to advise the President to formulate a new development agenda, was an important initiative. Brazil suffered from structural problems, aggravated by more than twenty years of low economic growth. The failure of neoliberalism and the unprecedented election of a labor leader as President produced a context very favorable for change. The creation of a council with representatives from different social segments was viewed as a form to increase social support.

It focused on general matters and directions. CDES sought consensus building and worked as a democratic space directed towards strategic views to make Brazil a better country. There was the implicit view that there could be an agreement in such a way that the entire society would win (Garcia, 2010).

A major step was to identify the main obstacles for development. There was the identification of several problems and they were organized into six main vectors. The first one was the extreme social inequality and the high share of population living in absolute poverty. The second one was the low dynamism of the economy, unable to absorb people into the labor market and to face international competition. The third one was the precarious and obsolete logistic infrastructure. The fourth one was the financial system's inability to fund development effectively. The fifth one was an overly complex tax structure, which increased inequality and hindered productive activities. The sixth one was the fragility of the State, unable to adequately perform its functions. After the identification of the obstacles, there was the definition of general directions and specific actions to address them.

CDES had strong support from both the President and from key Ministers, but its agenda was not transformed into a government plan. (Garcia, 2010; Queiroz-Stein, 2016). However, CDES's proposals provided the basis for important government programs in the following years, including an ambitious infrastructure program adopted in 2007.

Industrial policy was a central theme in the CDES agenda. Coutinho Garcia, who was in charge of a presentation about the subject in one of the meetings, raised some very pertinent questions: "How many national firms had disappeared in the last 15 years? How many Brazilian brands were created and how many disappeared? Are the Brazilian firms developing and incorporating technologies at an adequate

pace? How many national firms internationalized?" (Garcia 2010: 93). The questions reflected major concerns that the industry had after the neoliberal experience. Industrial policy was considered a priority and the directions of the CDES agenda were present in the three industrial policies adopted during PT governments.

The first of these policies, the Industrial, Technological and Foreign Trade Policy (PITCE), was adopted in 2004. It had three vectors: to promote horizontal measures, including stimulus for innovation, exports and small and medium firms; to promote strategic sectors: capital goods, information technology, semiconductors and pharmaceuticals; and to promote "sectors of the future": biomass, biotechnology, nanotechnology and renewable energy sources (De Toni, 2013).

Previous debates in CDES had already emphasized the need for an agency to formulate and coordinate industrial policy. The precarious coordination of industrial policy had been a critical liability in previous experiences. In addition, it was considered that the brazilian State lacked the technical capacity to formulate an integrated program of industrial development. This was the rationality behind the creation of the Brazilian Agency for Industrial Development (ABDI). Two major roles were ascribed to ABDI: to be the main interaction channel with the business sector and a high level chamber to achieve inter-ministerial coordination (De Toni, 2013).

ABDI was created with both operational and financial autonomy. The President of the Republic appointed its directors, and its staff was recruited by meritocratic selection exams. However, the Ministerial Chief of Staff blocked the objective of creating a powerful agency. He argued that the role of industrial policy formulation should be the responsibility of the government, rather than of a specific agency (De Toni, 2013). As a consequence, ABDI was created essentially as a body for analyses, without the instruments or capacity to coordinate industrial policy. This decision had highly significant implications, which critically damaged the capacity to implement a coherent industrial policy.

Another important institutional innovation was the creation of the National Industrial Development Council (CNDI), made up of the main ministers related to the economy, the President of the Brazilian Development Bank (BNDES) and representatives of business and

trade unions. It was initially headed by the Minister of Development, Industry and Trade, Luis Furlan, a businessman with a strong relationship with the business class who proved to be a very skilful articulator (De Toni, 2013).

Many factors contributed to CNDI's success. Firstly, its capacity to join members who were actually considered representatives by their respective categories. Secondly, its norms and working structure: CNDI had an annual schedule of meetings, prepared in advance; the meetings took place every two months and each meeting addressed up to three topics. Thirdly, it received widespread support from key authorities: the ministers participated in most of the meetings and the President of the Republic used to show up to greet the participants (De Toni, 2013; Queiroz-Stein, 2016). Fourthly, it tended to focus on topics of both practical interest and effectiveness, avoiding controversial issues.

CNDI proved to be a very effective space for strategic debate and to seek coordinated solutions. It facilitated the approximation between the Finance Minister and those ministers in charge of development and industry. Secondly, it provided the dialogue between government and most senior representatives of the productive sector. Businesspeople negotiated in a collective way and avoided particularistic demands[17]. Thirdly, bringing the significant players together allowed for the negotiation of conflicts and provided agility to undertake the necessary measures. In brief, CDNI provided a forum to reach agreements that otherwise would have been very difficult through alternative means. It worked in coordination with CDES, another locus that contributed to the increase in state capacity[18]. However, since 2007, both CNDI and CDES lost prestige and effectiveness, which resulted in a loss of political capacity (Queiroz-Stein, 2016).

Important measures were approved by CNDI. A very important one was the Innovation Law, approved in 2004. The CNDI debated the subject and concluded that the problem was inadequate regulation and lack of instruments. Brazil suffered from dissociation between science and technology and scientists and researchers had very little incentive to cooperate with firms. Among the measures adopted, temporary leave and additional payment were provided to researchers employed in public institutions (De Toni, 2013). By doing this, the Innovation Law contributed to a change in the universities' culture and increased the willingness to cooperate with the business sector. It also turned easier to share

R&D infrastructure. In brief, Innovation Law contributed to stimulate corporate innovation, brought science and technology closer together and produced a favorable environment for partnerships between universities, technical institutes and firms (Almeida and Schneider, 2012; De Toni, 2013). The Innovation Law was followed by the *Lei do Bem* (Law of Goodness), which turned the concession of incentives to firms engaged in the innovation effort significantly easier[19].

PITCE played an important role since it brought industrial policy back into the agenda. It gave priority to few sectors and it emphasized mainly the creation of a favorable environment for innovation. One of the main contributions was the institutionalization of legal frameworks and the creation of credit lines to specific sectors (De Toni, 2013). However, the policy had a limited scope, it mobilized a limited amount of resources and the supported sectors responded for a small share of the industrial structure. The brazilian government at that time was characterized by a fierce dispute between an orthodox Finance Ministry and the developmentalist agencies inside the State. Consequently, selective industrial policies tended to be faced with distrust. Another evident conflict was between the macroeconomic policy, characterized by high interest rates and overvalued exchange rates, and the projects to stimulate industry.

PRODUCTIVE DEVELOPMENT PROGRAM – 2007-2010

In 2008, there was the announcement of the Productive Development Program (PDP), which represented a substantial increase both in the scope and in the magnitude of industrial policy. At that moment, the economy was growing at high rates and the government saw the opportunity to adopt a highly ambitious program to boost industrial activity. PDP contemplated a set of horizontal objectives and had three vectors focused on specific sectors. The first one aimed to strengthen the sectors in which Brazil had comparative advantage. This included the petrochemical, aeronautic, pulp and paper, animal protein, mining and steel sectors. The second vector focused on building capacity in sectors intensive in technology, including some segments of the health sector, as well as telecommunications, biotechnology and nanotechnology. The target of a third set of measures was sectors vulnerable to international competition: textiles, automobiles, shipbuilding, capital goods and many others (Guerriero, 2012)[20]. Another key emphasis was to promote national champions able to consolidate international leadership.

The main instrument was BNDES loans, which raised significantly from R$ 51 billion in 2006 to R$ 168 billion in 2010 (approximately US$ 101 billion by the december 2010 exchange rate). As a response to the international crisis, the Program of Sustaining Investment (PSI) was created to provide credit in favorable conditions for investment projects. Other instruments included tax exemptions and subventions, openness of credit lines to fund innovation, technical support and the articulation of PDP with other federal investment programs (Guerriero, 2012; Coutinho, Ferraz, Nassif and Oliva, 2012). Emphasis was also given to government purchasing policies and to requirements of national content. The public oil firm, strengthened by the discovery of Pre-Salt reserves, directed many its purchases to promote both the capital goods and the shipbuilding sectors.

PDP was a very ambitious program, however, it came across several difficulties. The first one was that it was too broad and contemplated all kinds of sectors, many of which faced serious competitiveness problems. Few of these choices were alternatives to promote development or to advance in learning and innovation (Suzigan, 2017). A related criticism was its intention to promote too many objectives. The objective to promote national champions led BNDES loans to concentrate on sectors with low to medium technology. Between 2008 and 2010, there was the concession of loans worth US$ 4,4 billion to a single firm in the beef processing sector (Almeida and Schneider, 2012). Given the lack of evaluation, the government had no idea about the impacts in terms of technological spillover, encouragement to national suppliers and other objectives.

A critical weakness was the blurring of industrial and macroeconomic objectives. A major objective of PDP was to contribute to foster investments in response to the international crisis. According to the president of BNDES, Luciano Coutinho, this objective justified the support to as many sectors as possible (Queiroz-Stein, 2016: 85). By doing this, was unable to prioritize the sectors with the best chances of being competitive and lost the capacity to identify if industrial policy was working or not.

Another problem had to do with coordination. Both CNDI and ABDI lost their respective influences, while BNDES assumed a very high one. PDP had a very complex coordination structure and activities were divided between several institutions: the Finance Ministry was

in charge of the "systemic actions"; ABDI of "strategic programs"; the Ministry of Development, Industry and Commerce (MDIC) of 12 programs to increase competitiveness; BNDES of the programs to consolidate national leadership and CNDI of superior advice. MDIC, which was in charge of the general coordination, did not have either instruments or enforcement capacity over other ministries. Public-private consultation did not work as intended and the sectorial forums very rarely met and did not have the necessary support (Schapiro, 2014; De Toni, 2013).

Finally, a serious limitation was the lack of both monitoring and evaluation. Although sectorial targets were adopted for exports, R&D and the participation of small and medium firms (Coutinho, Ferraz, Nassif and Oliva, 2012), they depended on other variables and were not necessarily related to the industrial policy measures. In most cases, they said very little, since the objective was merely to support the sectors, without any productivity or competitiveness related demands. In addition, there were no demands related to the reorganization of production and other initiatives to increase productivity (Almeida and Schneider, 2012).

THE GREATER BRAZIL PLAN (PBM) – 2011-2014

In 2011, President Dilma Rousseff (PT) adopted a new industrial program, which shared many similarities with PDP. PBM also combined a horizontal and a sectorial agenda and, in its objectives, it gave significant precedence to infrastructure, reduction in energy costs, increase in labor force quality and stimulus to innovation. A very wide and diverse set of sectors was contemplated.

An innovation of the PBM was a strong emphasis on protectionism, justified as a response to quantitative easing and other foreign practices. An instrument was the change in the regulation of public purchasing policies, which allowed the acquisition of domestic goods at prices up to 25% above those of international competitors (Almeida and Schneider, 2012). A second offensive was the reinforcement of antidumping measures. In 2013, for example, 54 antidumping cases were presented, more than for the entire 2003-2006 period (Araújo Jr, 2015). The use of public sector purchases intensified, as the government intended to extend the experience of the oil sector to both the health and defense sectors.

BNDES loans continued to occupy a central role and strong emphasis was given to tax exemptions and special tax regimes. Further emphasis was upon reducing the costs of production, to be achieved through the reduction in the cost of credit, payroll taxes for several sectors and in electrical energy charges. The government also created a special tax regime with the goal to encourage exports (De Toni, 2013; Queiroz-Stein, 2016).

PBM's most successful achievement was in technology policy. The Plan Inova Empresa was adopted to promote basic and applied research. In 2013, it provided R$32.9 billion (approximately 0.67% of GDP) to support innovation, which created a huge demand from the private sector. An important development took place in the Financial Agency for Studies and Projects (FINEP), subject to a process of restructuring: its instruments were increased and internal processes were modernized to provide both agility and quality in the analyses of the projects (Arbix and De Negri, 2015).

PBM also suffered from many weaknesses, which included its broad nature and the lack of precise objectives and strategies. According to Queiroz-Stein (2016: 63), 56 sectors received benefits and there were no strategic emphases on sectors of the future, winning foreign market share or promoting technological catch up. The policy had a strong defensive and compensatory nature, justified as a way of compensating firms for the deficiencies in infrastructure and the complexity of the tax system. As Almeida and Schneider (2012) argue, the measures were ineffective in terms of promoting transformation and improving the competitiveness patterns.

Another problem was coordination, which was not a responsibility attributed to a specific agency, but took place in "institutional hubs" with representatives of different agencies and ministries. The result was an empty institutional arrangement: the formal decision competences and attributions were not in the councils responsible for coordination, but in the respective agencies (Schapiro, 2014). The Finance Minister was in charge of most PBM measures, but he was not in charge of promoting industrial development[21].

The PBM innovated with the creation of 19 sectorial councils with the objectives of institutionalizing civil society participation, encouraging dialogue and exchange of information and contributing to the defini-

tion of policies. However, the meetings did not occur in the intended frequency nor did it have the participation of ministries and other major authorities. Although they identified necessary measures, the meetings did not have the continuity necessary to monitor and evaluate. In brief, the councils had a short life and were unable to institutionalize practices and routines on a permanent basis (Queiroz-Stein, 2016).

Difficulties occurred even when the policy included high capacity in terms of embedded autonomy. A good example is the National Oil and Natural Gas Industry Mobilization Program (PROMIMP), in which *Petrobrás* attempted to increase the national suppliers' participation in its purchases. The policy failed for not having focus and priorities regarding the segments and products to be promoted. The domestic content targets tended to be too high and the national producers tended to overestimate their delivery capacity. A policy focused on products and systems in which Brazil had the productive and technological capabilities would have had much better results (Guimarães, 2013).

In addition, both monitoring and supervision were very precarious. According to Mauro Borges Lemos, president of ABDI (2011-2014) and Minister of Industry, Trade and Development (2014), influential people inside the government blocked attempts to introduce evaluation mechanisms. A similar attempt, made to condition the reduction in payroll tax to productivity performance, was also denied[22].

A final criticism has to do with the macroeconomic impacts of the huge increase in BNDES operations. Treasury issued bonds at market rates while BNDES provided loans at subsidized rates. The substantial increase in BNDES loans was made through a significant increase in public debt, which significantly contributed to the ulterior fiscal and economic crisis.

INDUSTRIAL POLICY IN BRAZIL – GENERAL EVALUATION, CHALLENGES AND DIRECTIONS

From 2003 to 2014, industrial policy was back on the agenda. By itself, the initiative was positive: there are important reasons to support industry and the previous neoliberal strategy had failed to provide a consistent alternative for national development, which contributed to a significant increase in foreign capital control of national industry

(Panizza, 2013; Palma, 2011). Industrial performance since then has been very disappointing: after poor results in the 1990s, the slight improvement after 2002 was insufficient to address the serious deficiencies. From 2003 to 2013, industry grew 19% and manufacturing 10.5%, while agriculture grew 45% and the service sector 41% (Carneiro and Kastner, 2016). Industry's participation in GDP, which used to be 23% in the 1970s, reduced to 16% in 2009-2011 (Bonelli and Pinheiro, 2012). Industrial productivity has also stagnated: from 2000 to 2017, the manufacturing productivity per worker increased only 13.3%, widening significantly the gap between Brazil and developed countries (Palma, 2011). From 1990 to 2010, the share of manufactured goods in total exports significantly reduced, and so did the participation of goods intensive in knowledge in industrial production.

The objective of this section is to summarize the main deficiencies inherent to the industrial policies adopted under PT governments. In addition, it indicates the role of key variables to understand certain shortcomings. Although there is strong evidence about the relevance of these variables, a detailed treatment of their influence would be object of another article.

It is necessary to recognize, first of all, that the strategy also had positive aspects. The creation of ABDI was a positive initiative and CNDI provided, for a certain period, a highly appropriate space to deliberate about necessary policies. The approval of the Innovation Law was a very important measure and there were other advances in innovation policy. Arbix and De Negri (2015) highlight the advance in the quality of technological policy, which came to focus on specific demands and technological opportunities and acquired a predictable budget[23].

However, as seen, the policy faced serious deficiencies. A critical liability was the lack of focus on precise objectives. A related criticism is that most of the measures neither corrected market failures nor promoted diversification or improvement in technological capacity. As a consequence, the impacts on competitiveness were insignificant (Araújo Jr, 2015). A further related problem was the lack of evaluation: in general, there were only counterfactual arguments saying that in the absence of the policy things would be worse (De Toni, 2013). Thus, the industrial policy had no clear and transparent targets. This shortcoming increased its vulnerability and made it an easy target for critics and opponents (see Almeida, Lisboa and Pessoa, 2015).

Another serious liability was the failure to institutionalize a proper coordination structure. A crucial obstacle was that industrial policy instruments were dispersed across many agencies and several of them do not have industrial promotion as one of their main objectives. Therefore, the policy was characterized by precarious inter-ministerial coordination, failure to input clear responsibilities and the incapacity to provide reliable channels of public-private interaction[24].

A key variable to understand the industrial policy deficiencies is State-business relations: the probable explanation for the contemplation of almost every sector are business pressures and the government's incapacity to say no to certain groups[25]. This is related to the pattern of business-State relationships, marked by too many associations[26] and the lack of institutionalized arenas to negotiate and achieve the necessary agreements to modernize industry. Business–government pattern in Brazil has been historically marked by the prevalence of particularistic demands and individual forms of access into the State apparatus (Schapiro, 2014). Important changes have taken place in the last two decades, once the National Confederation of Industry (CNI) has shown increasing capacity of collective action aimed at tackling general obstacles that affect industry (Mancuso, 2004). Nevertheless, this has been done without dismantling the particularistic and informal practices.

The difficulties are also related to brazilian political institutions and to the relationships between the Executive Branch and Congress. The combination of presidentialism with proportional representation elections leads to the formation of coalition governments in which the president needs to concede posts in ministries and agencies in exchange for political support. In such a system, interest groups tend to support both parties and candidates as the best strategy to have access to their interest areas (Schneider, 2013). This kind of relationship weakens institutionalised spaces and increases the importance of informal ways of access to the State apparatus[27].

The relative weakness of the State and its permeability to private interests assists in the understanding of another feature: the lack of demands upon business performance. The position of Robson Andrade, president of the influential National Confederation of Industry (CNI) since 2010, in a CNDI meeting is enlightening. Andrade praised the programs adopted to promote exports and reduce the costs of capital, defending their continuity and the need for further incentives (Que-

iroz-Stein 2016: 114). Not surprisingly, there is no mention as to what business would deliver in exchange for the incentives. It is possible to grasp the implicit view that business already contributes by taking investments and creating employment and that it is the State's role to provide incentives[28].

In fact, this has been the pattern of industrial policy since the 1950s, as illustrated by the automotive sector that, having received countless incentives for 60 years, has failed to achieve technological autonomy and international leadership. The sector was recently the object of another policy, Inovar Auto, which significantly increased import tariffs. This policy was criticized for not having, despite its intentions, any significant impact on R&D expenditure and outcomes (Schmidt and Carrasco, 2017). The policy has not tackled any of the sector's main deficiencies, which include excess of installed capacity, high production costs, very low productivity and inability to export to neighboring countries (Assis, Hagemann and Ferreira, 2016)[29]. Instead, it has operated to preserve profits, while consumers and taxpayers pay the bill.

The business-government relationship also helps to understand the high degree of closeness of the economy. In 2016, imports responded for approximately 14% of GDP , one of the lowest levels in the world (Bacha, 2016). In addition, Brazil became a world champion in antidumping policies: from july 2012 to june 2013, for the third consecutive year, Brazil was the world leader in the opening of antidumping investigations, having a number above the sum of the United States and Europe (Araújo Jr, 2015). The excess of antidumping practices contributed to one of the highest rates of industrial protection in the world.

Another important issue is the relationship between development and macroeconomics policies. This was a major issue during import substitution industrialization, marked by a strong debate between monetarist and developmentalist economists. In key moments, developmentalist arguments prevailed and industrial development occurred, despite macroeconomic imbalances. However, this had a cost: there were frequent macroeconomic crises, which paralyzed the economy and hindered an ongoing process of economic growth (Guimarães, 2003).

The relationship between macroeconomic and development policies has different nuances. Developmentalist economists are right when they argue that industrial policy does not work without a proper mac-

roeconomic regime: high interest rates and overvalued exchange rates, as happened recently in Brazil, tend to discourage industrial investment (Kupfer, 2017). On the other hand, a deteriorating fiscal situation tends to discourage both public and private investment. Facing economic uncertainty and deteriorating fiscal situation for the government, the rational business position tends to be the postponement of investment and the allocation of resources to financial applications, as seems to have been the case.

This is a highly controversial topic in Brazil, which reveals the role played by theoretical differences and ideology in the economic debate. During the 1990s, radical neoliberal policies were adopted and had a harmful impact on industry segments. Recently, on the other hand, the insufficient attention given to macroeconomic imbalances intensely contributed to the current economic difficulties. The point is that macroeconomic imbalances, besides having a negative impact on investment and government policies, tend to strengthen opposition and threaten the continuity of the development policy.

Since 2015, Brazil has faced a severe political and economic crisis. It has many causes and deep roots, but it is closely related to characteristics of the political system, particularly the relationship between the Executive and the Legislative Branches and the need to form broad coalitions as a pre-requisite to govern. Another key component was the high polarization that marked the 2014 elections and the following years, resulting in the incapacity to deal with the conflicts under the rules of the democratic game. This led both to an impeachment process and to political trauma, as well as to uncertainties that strongly contributed to the victory of an outsider candidate in the 2018 elections. This tends to produce drastic changes in the economic model and in the conduct of industrial policy.

Since the 1980s, Brazil has undergone a precocious process of deindustrialization. The share of industry in GDP has reduced before achieving industrial density; industry, after decades of macroeconomic crisis and neoliberal experience, lost its momentum and capacity to insert itself successfully into international productive chains (De Toni, 2013; Palma, 2011). Productivity has been stagnant since the 1980s. Meanwhile, a new industrial wave is in course, based on large-scale data process-

ing, artificial intelligence, revolution in material science and addictive manufacturing, amongst other trends. It is of utmost importance that Brazil defines a strategy to find a space in this scenario.

There are substantial domestic challenges, including many infrastructure and regulatory problems. Meeting such challenges requires substantial effort, which is more likely to succeed if pursued through a clear and transparent industrial policy, determining targets, with clear statements as to what the policy intends to accomplish and providing monitoring and supervision. In this case, it increases the possibility of achieving a mandate to reverse deindustrialization[30].

While sectors and firms lobby for specific incentives, brazilian industry is losing grounds and being overtaken by competitors, as was clearly stated by the CNI industrial policy manager, Júlio Emílio Gonçalves. He argued that it is imperative to have a national project: "it cannot be a discussion about incentives and benefits for this sector or that sector. We are talking about the pre-conditions for the survival of the industrial sector" (Silva, 2018). It is extremely positive to hear such a position from an influential representative of the business sector, defending a direction much in tune to what has been argued in this article.

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NOTES

1. According to Suzigan (2017), both macroeconomic and a systemic policy, including infrastructure, science and technology, and education, critically affect industrial policy results.
2. However, the concern about the general picture turns impossible to deal in details with specific measures and sectors.
3. In addition, opportunity costs are invoked to defend the concentration of resources on education and infrastructure, while selective policies are criticized for facilitating state capture by private groups (See Chang, 2006).
4. Historical and empirical data shows that countries that significantly improved per capita income advanced towards greater diversification (Shapiro, 2007).
5. Hausmann and Rodrik (2006) show how some sectors tend to develop together in geographic terms.

6. It is necessary to abandon the idea that there are plenty of opportunities to be explored; the possibility of diversification requires capacities specific to the sectors (Cimoli, Dosi and Stiglitz, 2009a).

7. We provided the Bolivian example in order to illustrate a situation in which the concentration on few basic products limited the possibilities of diversification (Hausmann and Rodrik, 2006).

8. There are very successful examples of policies centered on the promotion of sectors distant from the country's original capabilities. South Korea's decision to promote the steel and the electronics industries is one of the best examples (Lin and Chang, 2009).

9. Moretti, Steinwender and Van Reene (2019) estimate the impacts of public funding R&D – specifically defense R&D – both on private R&D and on productivity. The paper corroborates the occurrence of very positive spillover effects and the key role of innovation policies on economic growth.

10. The concept of embedded autonomy implies the conciliation of a certain degree of autonomy, achieved through a well-prepared and meritocratic bureaucracy, and the development of links and channels with the business sectors, necessary to visualize constraints and opportunities that the productive agents might face (Evans, 1995).

11. The benchmark in Evans's analysis are very strong states able to promote economic growth and industrialization as their main priority. However, in most countries the state tends to be weaker, while the society tends to be both stronger and more complex (Kohli, 2004).

12. Since international competition involves high risks, it may be more rational for firms to lobby for the preservation of the subsidies (Khan, 2013).

13. The countries whose practices were investigated include Australia, Ireland, Finland, New Zealand, Sweden, Spain, South Korea, Malaysia, Singapore and Czech Republic. Among the 15 countries, only Hong Kong used a strategy close to the neoliberal precepts.

14. A good example was the information technology policy in Korea in the 1970s, which remained despite the fierce opposition from many bodies and players, who believed it had little chance of success (Lim, 2013).

15. Specifically, Finland gives special attention to the elaboration of projects to identify future competencies in science, technology and industry.

16. From 1994 to 2002, years related to the neoliberal reforms, the value added by manufacturing, in real terms, increased only 9,6%, which implied a significant reduction of the industry's share in GDP. (See Contri, 2015).

17. This is explained by the structure of the council and by how business representatives were chosen. The councils dealt with general matters and the business members were considered as legitimate representatives of the class. There was no space for particularistic or clientelist pressures.

18. While embedded autonomy, the concept that Evans developed (1995) deals mainly with the technical dimension of state capacity, councils such as CNDI and CDES contribute to strengthen the political dimension of state capacity and to increase the social support in favor of the policy (See Queiroz-Stein, 2016 and Section 3 above).

19. In 2009, more than 60 thousand firms used Innovation Law and *Lei do Bem*, which invested R$ 8,3 billion in R&D (approximately 0,25% of GDP), a significant parcel of the national investments in R&D (De Toni, 2013).

20. According to Guerriero (2012), 33 sectors received support.

21. As Schapiro (2014) points out, it is impossible to do industrial policy without the Finance Minister, but this does not mean that the Finance Ministry knows how to do it.

22. Interview with Mauro Borges Lemos. Belo Horizonte, 04/28/2015.

23. Arbix and De Negri (2015) consider that the policy was in the right direction and that Brazil has the human resources and high potential to advance in knowledge intensive sectors.

24. In China, by contrast, industrial policy is considered a priority and the policies were the responsibilities of ministries and senior servants, who have clear roles and responsibilities (Suzigan, 2017).

25. Lula nominated business representatives to important posts and opened many channels with private sector representation (Diniz, 2011).

26. As Schapiro (2014) points out, business representatives tend to act as distributive coalitions, bargaining for immediate and particularistic interests.

27. The complexity of the bureaucratic procedures and the slow nature of the Judiciary Branch are further obstacles. There are many examples of projects that, in order to be approved, were accompanied by innumerous measures aimed at meeting parochial interests (Suzigan, 2017).

28. This fits in a pattern which finds its origins in the Portuguese neo-mercantilism: the state had a protagonist role and the business class expected state favors and support (Guimarães, 2003).

29. Automotive factories prefer to export to other Latin American countries from Asia than from Brazil.

30. Brazilian industry's recovery requires a set of measures, which include deregulation in certain areas, the adoption of strategic reforms and a range of initiatives to reduce the "Brazilian cost". They need to be supplemented by adequate industrial policies, as happened in most of the successful development experiences. The Brazilian governments which succeeded PT since 2016 have been unable to offer a consistent program that can avoid the decline of national industry.

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RESUMO

A Economia da Política Industrial Brasileira (2003 - 2014): Principais Vetores, Deficiências e Rumos para Melhora da Efetividade

Este artigo é um estudo sobre a política industrial e seu papel no desenvolvimento, investigando como tal política foi adotada recentemente no Brasil. Após uma década de neoliberalismo, a política industrial voltou à pauta, aumentando o interesse pela análise deste tema. Inicialmente, o artigo explora questões gerais relacionadas às necessidades da política industrial e aos fatores e procedimentos necessários para uma implementação bem-sucedida. Uma série de práticas bem sucedidas foram realçadas a fim de guiar a interpretação da experiência brasileira. Apesar de sua priorização e de avanços pontuais, a política industrial no Brasil não produziu resultados mais consistentes. As principais razões incluem: a falta de uma estrutura de coordenação adequada; a incapacidade de se concentrar em metas claras de produtividade e competitividade; o número excessivo de setores contemplados; a falta de uma avaliação consistente; e a incapacidade de alcançar uma negociação abrangente com os representantes da indústria. Esses problemas diminuíram as chances de que as graves deficiências inerentes à indústria brasileira fossem sanadas.

Palavras-chave: Política Industrial; Brasil; Capacidade do Estado; Instituições; Economia Política

ABSTRACT

The Political Economy of Brazilian Industrial Policy (2003 – 2014): Main Vectors, Shortcomings and Directions to Improve Effectiveness

This paper is a study about industrial policy and its role in development, investigating how it was recently adopted in Brazil. After a decade of neoliberalism, industrial policy returned to the agenda, increasing the interest in its evaluation. Initially, the article explores general matters related to the needs for industrial policy and to the required factors and procedures that contribute to successful implementation. A benchmark is created to interpret the Brazilian experience. Despite its prioritization and the achievement of specific advances, industrial policy in Brazil failed to produce more consistent results. The main reasons include the lack of an appropriate coordination structure, the incapacity to focus on clear productivity and competitiveness targets, the excessive number of sectors contemplated, the lack of any consistent evaluation and the inability to achieve an encompassing negotiation with business representatives. These deficiencies weakened the possibility of addressing the serious shortcomings inherent to Brazilian industry.

Keywords: Industrial Policy; Brazil; State Capacity; Institutions; Political Economy

RESUMEN

La Economía Política de la Política Industrial Brasileña (2003 - 2014): Principales Vectores, Deficiencias y Vías para Mejorar su Efectividad

Este trabajo es un estudio sobre la política industrial y su papel en el desarrollo, investigando su reciente adopción en Brasil. Tras una década de neoliberalismo, la política industrial volvió a la agenda, aumentando el interés por su evaluación. Inicialmente, el artículo explora cuestiones generales relacionadas con las necesidades de la política industrial y los factores y procedimientos necesarios que contribuyen al éxito de su implementación. Se crea un punto de referencia para interpretar la experiencia brasileña. A pesar de su priorización y de conseguir avances concretos, la política industrial en Brasil no logró resultados más consistentes. Las principales razones son la falta de una estructura de coordinación adecuada; la incapacidad de centrarse en objetivos claros de productividad y competitividad; el excesivo número de sectores contemplados; la falta de una evaluación consistente y la incapacidad de alcanzar una negociación incluyente con los representantes empresariales. Estas deficiencias debilitaron la posibilidad de abordar las graves deficiencias inherentes a la industria brasileña.

Palabras clave: Política Industrial; Brasil; Capacidad Estatal; Instituciones; Economía Política

RÉSUMÉ

L'économie Politique de la Politique Industrielle Brésilienne (2003-2014): Principaux Vecteurs, Lacunes et Orientations pour Améliorer l'Efficacité

Cet article est une étude sur la politique industrielle et son rôle dans le développement, examinant comment elle a été récemment adoptée au Brésil. Après une décennie de néolibéralisme, la politique industrielle est revenue à l'ordre du jour, augmentant l'intérêt pour son évaluation. Dans un premier temps, l'article explore les questions générales liées aux besoins de la politique industrielle et aux facteurs et procédures nécessaires qui contribuent à une mise en œuvre réussie. Une référence est créée pour interpréter l'expérience brésilienne. Malgré son hiérarchisation et la réalisation de progrès spécifiques, la politique industrielle brésilienne n'a pas réussi à produire des résultats plus cohérents. Les principales raisons sont l'absence d'une structure de coordination appropriée; l'incapacité de se concentrer sur des objectifs clairs de productivité et de compétitivité; le nombre excessif de secteurs envisagés; l'absence d'évaluation cohérente et l'incapacité de parvenir à une négociation globale avec les représentants des entreprises. Ces lacunes ont affaibli la possibilité de remédier aux graves lacunes inhérentes à l'industrie brésilienne.

Mots-clés: Politique Industrielle; Brésil; Capacité de l'État; Institutions; Économie Politique.