

TC Document

I. Basic Information for TC

▪ Country/Region:	BRAZIL
▪ TC Name:	Evaluation of Brazilian Work Sharing Program in the Context of COVID-19
▪ TC Number:	BR-T1631
▪ Team Leader/Members:	Gouvea Gomes, Livia (SCL/LMK) Team Leader; Zimmermann, Beatrice Aline (SPD/SMO) Alternate Team Leader; Kaplan, David Scott (SCL/LMK); Rivera Herrera Sergio Andres (SCL/LMK); Souza Eugenio, Gabriela Fernanda (CSC/CBR); Ferrin Gaston (SCL/LMK); Rachter De Sousa Dias, Laisa (SCL/GDI); Gonzalez Herrera, Beatriz Maria (SCL/LMK); Tavares Sousa, Maria Elisa (CSC/CBR); Diaz Gill Virginia Maria (LEG/SGO) Souza Eugenio, Gabriela Fernanda (CSC/CBR); Ferrin Gaston (SCL/LMK); Rachter De Sousa Dias, Laisa (SCL/GDI); Gonzalez Herrera, Beatriz Maria (SCL/LMK); Tavares Sousa, Maria Elisa (CSC/CBR); Diaz Gill Virginia Maria (LEG/SGO)
▪ Taxonomy:	Research and Dissemination
▪ Operation Supported by the TC:	N/A
▪ Date of TC Abstract authorization:	26 Aug 2024.
▪ Beneficiary:	Brazil
▪ Executing Agency and contact name:	Inter-American Development Bank
▪ Donors providing funding:	OC SDP Window 2 - Social Development(W2E)
▪ IDB Funding Requested:	US\$60,000.00
▪ Local counterpart funding, if any:	US\$0
▪ Disbursement period (which includes Execution period):	18 months (which includes Execution period)
▪ Required start date:	November 2024
▪ Types of consultants:	Individuals; Firms
▪ Prepared by Unit:	SCL/LMK-Labor Markets
▪ Unit of Disbursement Responsibility:	SCL/LMK-Labor Markets
▪ TC included in Country Strategy (y/n):	Y
▪ TC included in CPD (y/n):	N
▪ Alignment to the Update to the Institutional Strategy 2024-2030:	Afro-descendants; Diversity; Gender equality; Social inclusion and equality

II. Objectives and Justification of the TC

2.1 The objective of this TC is to produce evidence on the effects of the Emergency Benefit Program (BEm) on labor market outcomes. This work-sharing initiative, implemented in Brazil during the critical years of the coronavirus pandemic, provided subsidies to cover working hours and salary reductions. Such evidence is scarce in Latin America, and even less is known about the implementation of these programs under extreme unpredictable emergency scenarios. The TC aims to address this evidence gap.

2.2 The BEm was funded by the IDB (a synergistic partnership with SCL/SPH: the 5092/OC-BR project). The project was structured around two key components: support for formal workers through the work-sharing program, the BEm, and income transfers to informal workers and the unemployed through the Emergency Aid (AE).

This study will scrutinize the BEm program's capacity to achieve its objective of "maintaining minimum income levels and formal employment among those impacted by the coronavirus, both in the immediate term and throughout the recovery process".

- 2.3 In this context, maintaining income levels means preserving employment bonds in situations where these connections are productive but temporarily unviable due to the crisis. The advantage of preserving such employment connections is that it prevents the destruction of specific human capital, which is crucial for ensuring a quicker economic recovery post-crisis. To protect formal employment, the Ministry of Economy (ME) instituted the Emergency Program for Maintenance of Employment and Income (PEMER). PEMER establishes: (1) the payment of BEm, a benefit paid to workers when there are agreements between workers and employers, under the program; (2) the proportional reduction in hours of work and wages; and (3) the temporary suspension of work. In the 2020/2021 biennium, the BEm ensured that 11.5 million jobs were maintained in the economy. It was supported by R\$41 billion, which enabled 23.4 million agreements to be signed, with the participation of 1.8 million employers and 11 million workers.
- 2.4 Theory of Program Change: The Emergency Program for Job and Income Maintenance (article 2, law 14.020/20) primarily involved payments of emergency benefits to formal employees resulting from agreements between firms and employees related to: (i) proportional reduction of working hours and salaries, or (ii) temporary work suspension. Additionally, the program ensured the maintenance of these employment ties during the agreement period and for a certain period thereafter.
- 2.5 The objectives of these measures were: (i) to enable firms to reduce payroll costs during a critical economic period threatening to significantly affect the country's productive fabric; and (ii) to prevent massive layoffs and subsequent sharp reduction in employee income, which could exacerbate the economic and welfare impacts of the health crisis on the population.
- 2.6 Within this logic, it is expected that: (i) the firms that adhered to the Program had a better chance of surviving the emergency period and faced less effects on their operations (in terms of the total number of employees required); and (ii) the employment relationships that benefited were more likely to be maintained after the Program, and wage levels were less affected after the benefit ended. This impact assessment therefore sets out to answer two central questions¹:
- 2.7 Question 1: What is the impact of the program on the total number of employees and company survival?
Question 2: What is the impact of the program on job retention and wages?
- 2.8 Methodology: Based on these questions, there are four main results of interest: At firm level: (i) survival of the firm; (ii) total number of employees; At worker/employee level: (iii) maintenance of employment; and (iv) salary level. To answer the proposed

¹ Given the wealth of information available and the nuances of the Program, other related results could also be explored, such as short- and medium-term differential effects.

questions and estimate the impact of the Program on the outlined results, the proposed methodology seeks to find the following counterfactual situations: What would have happened to the firms that benefited in terms of survival and total number of workers if the Program's measures had not been applied. What would have happened to the benefited workers/employees in terms of their employment relationship and income if the Program's measures had not been applied.

- 2.9 For this, it is proposed to implement the method of Differences in Differences (DiD)² approach with weights generated by Inverse Probability Weighting (IPW). The specification is as follows:

$$Y_{it} = \beta_0 + \beta_1 Treatment_i + \beta_2 Post_t + \beta_3 (Treatment_i \times Post_t) + \gamma X_{it} + \varepsilon_{it} \quad (2.1)$$

Where:

Y_{it} represents the outcome of interest for unit i at time t . The subscript i refers to the job/employee or the company, depending on the level of the outcome of interest.

$Treatment_i$ is an indicator =1 if unit i benefited from the Program and therefore makes up the treatment group and is =0 if unit i did not benefit from the Program and therefore makes up the control group.

$Post_t$ is indicator =1 in period t after the implementation of the Program and =0 in the period before the implementation of the Program.

$Treatment_i \times Post_t$ is the interaction between treatment and post-program period, capturing the program's impact.

- 2.10 **Data and Sources.** There will be three main data sources used: the Program's administrative base; the Annual Social Information Report (Rais); and the General Register of Employed and Unemployed (CAGED). The researchers from Institute for Applied Economic Research (IPEA), who already have access to the identified data and will be co-authors of the study, will handle the identified data. Any knowledge products generated within the framework of this technical cooperation will be the property of the Bank and may be made available to the public under a creative commons license. However, upon request of the beneficiary, the intellectual property of said products may also be licensed and/or transferred to the beneficiary through specific agreements.
- 2.11 The IDB team will work with de-identified statistics. Administrative data will be the basis for the proposed evaluation. The administrative database contains a wealth of detailed and previously unexplored information on employment relationships (company identifiers, type of establishment, date of admission, etc.), workers (worker identifiers, name, date of birth, etc.), as well as benefits granted (type, duration, installments paid, etc.) for the entire duration of the Program (2020 and 2021). Based on this information, it will be possible to identify the exposure of jobs and companies

² Based on the exploration of the data and all the Program's eligibility criteria, other methodologies will also be explored. It is anticipated that, for example, the estimation of a Discontinuous Regression may be feasible, depending on obtaining additional information.

to the Program, building the variable $Tratamento_i$ needed to estimate specification 2.1.

- 2.12 RAIS: is one of the main databases for monitoring and characterizing the Brazilian formal labor market. Since 1976, it has been an annual, census-based database that allows for longitudinal monitoring of workers, employment relationships and establishments. The RAIS database is in two parts: (i) Relationship Information: Includes personal data (CPF, CTPS, PIS/PASEP, nationality, gender, age, level of education, race/color), movement data (type of admission/termination, contractual salary, weekly hours, type of contractual salary, Brazilian Classification of Occupations - CBO), relationship data (type of relationship, place of work, leave information, monthly pay, monthly overtime) and union dues; and (ii) Establishment information: Contains establishment data (CNPJ/CEI, company name, address, zip code, National Classification of Economic Activity (CNAE) code, legal nature, type of establishment and establishment size).
- 2.13 CAGED: this is a database that has been providing monthly information since 1965 on the hiring and dismissal of formal workers governed by the Consolidation of Labor Laws (CLT). However, as of 2020, there has been a significant change in the collection of information, which, however, has already been harmonized/contoured by the evaluation team. In general, it also provides information on employment relationships and establishments, but its main difference and complement to RAIS is the periodicity with which the information is collected and made available. While RAIS provides the stock of jobs, CAGED allows us to monitor the flow of jobs. Based on the Rais and CAGED databases, the weights needed to implement the IPW, the variables of interest and the vector of control variables X_{it} indicated in specification 2.1 will be constructed.
- 2.14 **Strategic Alignment:** Developing and disseminating cutting-edge knowledge is a core element of the IDBG's value proposition, as outlined in the Institutional Strategy (IS). The TC is consistent with the IDB Group Institutional Strategy: Transforming for Scale and Impact (CA-631) and is aligned with the objective(s) of: (i) Reduce poverty and inequality; and (ii) Bolster sustainable regional growth by supporting the MOL with investments in human capital and institutional strengthening, provides a roadmap for guiding the IDB Group over the next seven years (2024-2030). Generating robust evidence on mechanisms like the BEm directly aligns with this approach. The TC is also aligned with the operational focus areas of: (i) social protection and human capital development by supporting more efficient and adaptive protection models; and (ii) gender equality by considering gender and diversity heterogeneities so that the TC can build a deep understanding of the asymmetries and specificities of how this work sharing program affected women and black people. The team will work with labor market data (RAIS and Caged) that counts with information on gender and race/color. Also, the impact evaluation paper (component 1: Evaluation of the BEM program) will consider gender and diversity heterogeneities.
- 2.15 The program under evaluation and the knowledge gained from it directly support this focus area, providing evidence to improve policies designs. Finally, the program evaluated aligns directly with the central Institutional Strategy (IS) goal of reducing poverty and inequality. The TC also aligns with priority area 5: Inclusive Social Development within the Ordinary Capital Strategic Development Program (OC-SDP-W2E) as established in GN-2819-14. The BEM evaluation study is closely aligned with the IDB's strategy, especially in Inclusive Social Development. By analyzing the

program's effects on the labor market, BEM contributes to strengthening public institutions, informing more effective and efficient social policies, and reducing poverty and inequality. It is also in line with the IDB Labor Markets Division's (LMK) Sector Framework (GN-2741-12) which has at goals that: (i) the region's citizens have more, and more equitable, opportunities to access formal jobs with better wage expectations; and (ii) workers are more productive and, consequently, obtain higher wages and more stable employment. The TC is also aligned with Gender and Diversity Division's (GDI) Sector Framework (GN-2800-13) in terms of addressing the challenge of expand women's economic opportunities by increasing female labor force participation, closing income and gender gaps between men and women, and improving women's access to more productive and better-paid jobs and occupations. The proposed activities are congruent with the country strategy for Brazil 2019-2024 (GN-2973-3)³, which seeks to reduce social and opportunity inequality by increasing public policies' efficiency, improving the management and quality of spending and infrastructure in the education and health sectors.

- 2.16 The results of the impact evaluation of the Emergency Benefit program are of crucial for improving the program and contributing to the debate on labor market policies and social protection in Brazil. This evidence will also be useful for the Inter-American Development Bank (IDB) in the creation of new projects and social policies in Latin America, serving as a reference for other countries in the region. Through this evaluation, it will be possible to gather insights on how the program operates, which population groups benefit most, and assess the challenges encountered during its implementation. This will help to improve public policies, strengthen social protection and build a fairer and more equitable future for the Brazilian and Latin American population, especially in a context of an informal labor market and the social vulnerability of a large portion of the population. Evaluation results can also contribute to: (i) policymakers and academic researchers working on the development of social and economic policies can use the results to support their future proposals. (ii) Direct beneficiaries of cash transfer programs can indirectly benefit from the evaluation results, as these may lead to improvements in the management and effectiveness of social protection and labor market programs and policies.

III. Description of activities/components and budget

- 3.1 This TC will provide US\$60,000 in non-reimbursable funding, executed over 18 months. In this TC, the source of funding is the Ordinary Capital Strategic Development Program (SDP OC), Window 2, Priority Area 5: Inclusive Social Development (W2E) (GN-2819-14), with no counterpart funding. This TC has been drawn up in two components, which are described below.
- 3.2 **Component I: Evaluation support for the BEM program (US\$50,000).** This component's objective is to support: (i) the evaluation of the BEM program; and (ii) through lessons learned, support the identification of public policy challenges and solutions aimed at the topic of job protection or creation. The result of this component is a report evaluating the impact of the BEM.

³ The guidelines of Country Strategy GN-2973-3 will continue to guide actions until 15 November 2024.

- 3.3 The expected outcome of this component is a comprehensive evaluation report that: (i) provides solid evidence on the impact of the BEM program on job creation and protection; (ii) identifies good practices and challenges, mapping effective strategies and obstacles to implementation; and (iii) offers strategic recommendations to optimize future interventions and public policies in this area. The report will contribute lessons learned to future operations at the bank.
- 3.4 **Component II: Knowledge dissemination (US\$10,000).** The aim of this component is to promote the dissemination of the learning acquired through Component I, consisting of a workshop and a blog on BEm. This component will finance the dissemination and communication of these products and results, including the lessons learned from the evaluation. Disseminating the results of Bem impact evaluations is an essential step in informing decision-making, both internally within the IDB and among external stakeholders. By sharing evidence on the effectiveness of interventions and lessons learned, the study contributes to optimizing resources, improving strategies and maximizing the impact of the Bank's lending operations.
- 3.5 The specific activities to be implemented under this component are: (i) Dissemination event: Participate in a workshop to present the results of the evaluation, promote debate and foster the exchange of experiences among key stakeholders involved in the BEM program. (ii) Dissemination of Results: Publication of the evaluation report in an accessible and widely distributed format to reach a diverse audience, including decision-makers and researchers. Additionally, a blog will be developed to disseminate the results of the evaluation, aiming at engaging a wider audience of researchers, policymakers and civil society in Latin America and the Caribbean (LAC).

Indicative Budget (US\$)

Activity/Component	Description	IDB/Fund Funding-W2E	Total Funding
Component 1: Evaluation support of the BEm program	An impact evaluation of the BEM.	\$50,000	\$50,000
Component 2: Knowledge dissemination	Event with project's participants: Ministry of Labour e IPEA and a Development of a blog to publicize the study.	\$10,000	\$10,000
	Total		\$60,000

IV. Executing agency and execution structure

- 4.1 This is a R&D technical cooperation that has as its objective to develop and disseminate knowledge, as such, is an initiative led by the Bank. The Inter-American Development Bank (IDB), through the Labor Markets and Social Security Division in the Social Sector Department (SCL/LMK), will be the Executing Agency. The Bank's institutional capacity and technical and operational experience in the field of social protection and employment policies will be key to effectively monitoring the implementation of the activities provided for in this TC.
- 4.2 The IDB has a wealth of experience in projects like this TC and offers independent and transparent execution of studies and evaluations. Furthermore, the fact that the IDB is the Executing Agency of the TC will facilitate coordination between the Ministry of Labor and Employment (MTE) and the Institute for Applied Economic Research (IPEA). The Labor Markets Division will be responsible for the strategy, coordination, technical and supervisory work of this TC and the disbursement of its resources. The Bank will maintain a close and constant dialog with the MTE and IPEA. All procurement to be executed under this Technical Cooperation have been included in the Procurement Plan (Annex IV) and will be hired in compliance with the applicable Bank policies and regulations as follows: (a) Hiring of individual consultants, as established in the regulation on Complementary Workforce (AM-650) and (b) Contracting of services provided by consulting firms in accordance with the Corporate procurement Policy (GN-2303-33) and its Guidelines.

V. Major issues

- 5.1 The risks to the implementation of the TC and the achievement of its objectives are: (i) Risk of delay in project implementation due to the coordination and dialogue required with IPEA to conduct the joint impact assessment. To mitigate this risk, the project management and implementation team will be trained to facilitate and support the institution. The project team will also be in close communication with the co-executors and beneficiaries; and (ii) the possible risk of management changes, as coordination positions and secretariats depend on political and institutional arrangements. To mitigate this risk, it will be essential to document the main processes and establish clear communication channels between the project team and the technical stakeholders. This will support continuity of activities regardless of changes in the Ministry of Labor and IPEA.

VI. Exceptions to Bank policy

None.

VII. Environmental and Social Aspects

- 7.1 This Technical Cooperation is not intended to finance pre-feasibility or feasibility studies of specific investment projects or environmental and social studies associated with them; therefore, this TC does not have applicable requirements of the Bank's Environmental and Social Policy Framework (ESPF).

Required Annexes:

[Results Matrix 27077.pdf](#)

[Terms of Reference_51788.pdf](#)

[Procurement Plan_28503.pdf](#)