

Inclusive Recycling in Belo Horizonte City – Integrating Informal Recyclers Cooperatives in Urban Systems

Việc tái chế theo hình thức kết hợp tại thành phố Belo Horizonte – Tích hợp các hợp tác xã tái chế tự phát trong các hệ thống đô thị

Sonia Dias

Tóm tắt

Rác thải có thể là một cơ hội để các thành phố đáp ứng các mục tiêu xã hội và môi trường. Bài viết này dựa trên nghiên cứu được thực hiện bởi Dias (2002 và 2009) và nêu lên các đặc điểm chính của hệ thống được thiết kế bởi thành phố Belo Horizonte, nơi tích hợp các hợp tác xã những người thu gom rác tự phát vào hệ thống tái chế của thành phố. Bài viết đánh giá căn nguyên tổ chức của nó, các khía cạnh của hệ thống tái chế, tính chuyên môn hóa công việc trong các hợp tác xã và các tác động chính của hệ thống tích hợp này.

Từ khóa: Belo Horizonte, người nhặt rác, hợp tác xã phi chính thức

Abstract

Waste can be an opportunity for cities to meet social and environmental goals. This paper is based on research carried out by Dias (2002 and 2009) and explores the main features of the system designed by Belo Horizonte city which integrated cooperatives of informal waste pickers into its municipal recycling system. The paper reviews its genesis of organizing, the main dimensions of the recycling system, the work specialization within cooperatives and main impacts of this integrated system.

Key words: Belo Horizonte, waste – pickers, informal cooperatives

Dr. Sonia Dias¹

WIEGO Association, Brazil

Email: soniamdias2010@gmail.com

Ngày nhận bài: 06/5/2020

Ngày sửa bài: 07/7/2020

Ngày duyệt đăng: 07/7/2020

(1) Dr Sonia Dias is WIEGO's waste specialist. She has a PhD in Political Sciences on the role of participatory forums in inclusive solid waste planning. She worked as city officer at the public cleaning agency (SLU), for 9 years, in the implementation of Belo Horizonte's municipal recycling system in partnership with waste picker cooperatives.

Introduction

A rights-based approach to public policy should acknowledge informal workers' rights to work, recognize their rights of access to and use of public space, provide the support in terms of infrastructure, capacity building, and enabling environment that can enhance livelihoods.

As Dias (2002) traces back the period of 1990-2000 in Brazil saw significant changes towards a rights-based approach to solid waste management (SWM). This period saw the growth in the number of "Catadores" – informal collectors of recyclables (hereby called simply as waste pickers) who organized themselves into cooperatives and associations and also saw the growth in many city initiatives which focused on participatory approaches to planning and implementation of inclusive SWM systems.

Belo Horizonte, the capital city of Minas Gerais state is the fourth largest in the country with a population of 2,375.151 people (IBGE, 2010). The city was a pioneer in integrating informal recyclers into municipal waste management systems as early as 1993 when the implementation of Belo Horizonte's integrated approach to solid waste management started with a strong commitment to inclusivity of informal collectors of recyclables.

Prior to 1993 the city ignored the contribution these informal workers made to the public health and to the environment and penalized their activity by confiscating materials and chasing them away. This paper traces back the organizing process in the city of Belo Horizonte and explores the main characteristics of an inclusive recycling system implemented in this city and the impact of such policy in the country.

Waste Pickers Organizing in Belo Horizonte

Prior to 1993, the majority of the waste pickers worked individually in an autonomous way, or in some cases with the help of their spouses and their children some of them from neighbouring cities, most living in the city's informal settlements. In the town centre, collection of material was carried out with a pushcart by each waste picker at his/her own "point" of collection in the streets since the city had moved from open dump to a walled off and guarded sanitary landfill in 1973 which curbed access to waste picking at the final disposal site (Dias, 2002).

The majority of these workers had no capital to buy a pushcart and therefore were forced to rely on those lent by middlemen. These forced them to sell their goods to middlemen impacting their ability to pursue better prices for their materials. This was a relationship permeated by deceit and mistrust. There were reports of frauds on the weighing of recyclables and other exploitation practices.

As back then waste picking was not formally recognized as a profession¹ those involved in the work had great difficulty in viewing their activity as a proper job, seeing it rather as an odd job. The non-recognition of their activity as a job made the formation of a collective identity as working citizens more difficult.

Since the waste pickers used to sort out their material from the trash bags (found on the curb or taken from offices and shops) in the streets this, naturally, meant the scattering of litter. Being seen as people who dirtied the city with its activity, treated as "part of the rubbish", they were expelled from the streets to make the city "more beautiful", and their materials were constantly subject to confiscation.

Due to the lack of a place for storing their material and/or the lack of money to go home after a working day, the waste pickers were forced to live in the streets in improvised cardboard shacks since they could not leave their material unguarded. Therefore, public space was occupied, simultaneously, as a place for living and for

(1) In 2002, this changed as the Ministry of Labor in Brazil recognized the profession of "collector of recyclables" in the national catalogue of professions.

work, bringing about many problems to urban cleaning.

The process of organisation of the waste pickers started in August 1988, with the support of Pastoral de Rua (the Street Pastoral Team - a group from the Catholic Church that works with street dwellers) in a social and educational work that led to the creation of the Waste Pickers' Association – ASMARE, in early May 1990. The main demand of the workers was to have the right to work in the city, collecting recyclables, as well as to have a proper place for the sorting of their material. They initiated a struggle for recognition and acknowledgment as workers, as environmental agents.

Integrated Solid Waste System – Coupling social and environmental concerns

In 1993, the Superintendency of Public Cleansing – SLU for short - started the implementation of a selective handling and treatment system of the solid wastes of Belo Horizonte City, promoting segregation at the sources, in order to minimise the harmful environmental impact caused by the waste itself and maximise the social and economical benefits for the city. This waste management policy encouraged grass roots participation in the discussion and the establishment of several projects, placing the municipal authorities in the role of a mediator in finding integrated solutions, through partnerships with various sectors of society (Dias, 2011).

A municipal recycling scheme was then designed in an intensive consultation with ASMARE, the then only existing waste pickers' cooperative, and Pastoral de Rua, its supporting NGO. As a result, a mixed system was designed consisting of a drop-off scheme coupled with formal recognition (and support) of existing manual recyclables collection from the waste pickers. All recyclables were taken to the cooperative and, in addition, the city signed an agreement whereby the city committed to renting sorting spaces and paying a subsidy to the cooperative as a way of compensating them for their work in reclaiming recyclables.

By 2000, seven new cooperatives were formed in the city prompting the need to create a multi stakeholders forum to discuss strategies for integration of new waste pickers' organizations thus by 2003 the Municipal Waste & Citizenship Forum was created and the municipality began to integrate the new cooperatives as service providers.

Current System

In the current system, the municipality recovers, in partnership with contracted cooperatives, non-organic recyclable materials from the domestic solid waste stream through four main channels:

a) Drop-off system: This system consists of containers distributed throughout the city where the population can deposit recyclables on a voluntary basis in dedicated containers for plastic, paper, metals and glass. Containers are emptied weekly by the SLU staff and the materials are transported to coops sorting centres for further handling. One down-side of the system has been the high level of damage of the recycling containers, mainly by non-organised waste pickers searching for recyclables.

b) Door to door collection of recyclables by cooperatives in non-residential areas: Cooperatives of waste pickers collect recyclable materials from commercial establishments and offices, especially in the down-town Belo Horizonte, using push-carts. In addition, recyclables are collected from larger generators such as industries and public offices using

vehicles owned by the cooperatives. Collected recyclables are taken to the sorting centers of the eight waste pickers' cooperatives, where materials are sorted, baled, shredded, packaged, and stored. Materials are sold to industry in Belo Horizonte or within the State of Minas Gerais. All cooperatives have scales, personal protection equipment, and big bags. Some have shredders and fork-lift trucks.

c) Door-to door collection of recyclables in residential areas: Collection is done by the cooperatives through contracts signed with the municipality with trucks donated by the city. Materials are taken to the sorting centres for proper processing and commercialization.

d) Collection of recyclables, from the streets by independent waste pickers (not members of coops): although the city's official system is integration with informal workers organized into cooperatives, the city does not penalize independent waste pickers, that is those not linked to coops doing collection of recyclables in the streets with their pushcarts.

Materials collected by cooperatives are brought to sorting centres owned by and or rented for waste pickers' cooperatives. There, the materials are processed before moving up the recycling chain. All cooperatives have scales, personal protection equipment, and big bags. Some have shredders and fork lift trucks. Materials are sold to industry in Belo Horizonte or within the state of Minas Gerais. The cooperatives receive all the money from sales, which is then shared between the associates. According to the National Sanitation System of Information – SNIS, 2016 Belo Horizonte formal separation at source system (a + c) collected 577 tones per month in that year representing 1 percent of the recyclables mass. This data does not take into account what is reclaimed by informal workers through the collection systems performed by the cooperatives (b) and independent workers (d) linked to middlemen.

Cooperatives – Features and Achievements

Over the years the cooperatives in Belo Horizonte evolved towards the following work specialization (Dias, 2002):

- Street waste pickers: reclaim recyclables from mixed wastes disposed in garbage bags placed on the streets or dumpsters. Some pickers may have arrangements with commercial and office buildings and be able to access previously segregated material. Street pickers can carry up to 800 kg with their push-carts. It is the most strenuous work performed by waste pickers.

- Motorised pickers: collect recyclables as part of door-to-door selective waste collection scheme run by municipalities in partnership with waste pickers cooperatives. Some cooperatives may enter into direct agreements with commercial and office buildings to collect large quantities of recyclables by truck or other vehicles.

- Sorter: work picking and sorting by type recyclables disposed either on a conveyor belts or other sorting area or devices.

- Operational: Coops members who processing sorted recyclables- weighting, baling, shredding, storing and other operational activities.

- Workshop: Some coops run special workshops such as carpentry, crafts and therefore have members allocated in these special activities (Dias, 2002).

An important achievement of waste pickers coops was

the approval for the payment for environmental service. In November 2011, the House of Representatives of Minas Gerais, Brazil, approved a state law establishing a monetary incentive to be paid by the state government to waste pickers who are members of a cooperative or workers' association. The payment is due at the end of a three-month period of work. This law became known as the Recycling Bonus Law.

The environmental services rendered by waste pickers include collection of recyclables and scrap which benefits the environment (extension of the life span of sanitary landfills through the diversion of recyclables, contribution to cities cleanliness, reduction of pollution etc). The recycling bonus is, thus a payment for environmental. Payment for environmental services cannot be mistaken for the payment for service collection of recyclables some cooperatives receive from agreements or contracts they may have with municipalities. While payment for service collection comes from municipal budgets, the recycling bonus comes from the state of Minas Gerais budget as a compensation for protecting the environment. It is additional revenue for cooperatives (2009).

Waste pickers cooperatives have been able to formalize their relationship with the municipal government ensuring integration into the solid waste management system. Workers recognize that the level of support received from the city is quite comprehensive. In the Informal Economy Monitoring Study², Belo Horizonte was the city that fared better amongst the five researched cities in terms of positive recognition from waste pickers on the role of public policies in the livelihoods of waste pickers (Dias and Sanson, 2016). The IEMS sector report shows that in Belo Horizonte where waste pickers are recognized and supported by governments and organized into strong cooperatives, waste pickers appear to have higher incomes than other informal workers in the four other IEMS cities³.

Conclusions

Belo Horizonte was the first municipality in Brazil to integrate waste pickers in Brazil as part of an integrated solid waste management system. Although at that time the existing national policies did not allow to integrate them through a commercial contract the municipality integrated them through a Memorandum of Understanding which included payment for services (back then called as subsidies) which catered for uniforms, transportation costs for cooperative members, support with infrastructure for sorting etc). Later on after the 2010 National Solid Waste Policy was approved and legitimized commercial contracts with waste pickers coops Belo Horizonte city transformed their MoUs with the coops into commercial contracts.

As Dias (2009), points out cooperatives achieved visibility locally and nationally as the city's scheme was publicized as "best practice model". This visibility inspired UNICEF Brazil to design the national program "waste and citizenship" and the campaign "no more child labor in open dumps" which

had repercussions nationwide and inspired waste pickers in the country to form cooperatives which later on lead to the formation, in 2001, of the national movement of waste pickers – the MNCR (the acronym in Portuguese). The MNCR is a social movement committed to organize waste pickers and to advance their main collective demands. The MNCR affiliates are cooperatives and associations that abide to their guiding principles: worker control of the organization, i.e. by waste pickers; direct action; autonomy from political parties, governments, and private sector; class solidarity; direct democracy and collective decision-making.

This system has been in place for 26 years, making it the longest integration model in the world. It is important to raise some of its challenges as well. After more than two decades, there is a critical need to improve infrastructure for sorting. For instance, many existing sorting centres were rented warehouses which were improvised as spaces for recycling thus issues such as lack of space, disorganization and problems with equipment adds an extra burden to the informal recyclers' workload are common. There is also a critical need to invest more on environmental education for education of citizens for adequate separation at source, which would improve the quality of recyclables, and protect workers' health. From the point of view of informal recyclers, they need to overcome their fear of work standardization: integration in formal systems means that they have to be accountable for services provided and some are still resistant to it which poses challenges for the cleansing agency. Recent capacity building programs have had positive results and waste pickers are increasingly opening up to new work processes and towards the introduction of technology.

The case of Belo Horizonte indicates that waste can be an opportunity to meet the city's strategic priorities of building an inclusive economy that creates jobs, facilitates social mobility, improves governance, protects the environment, promotes sustainability, and social justice./

Tài liệu tham khảo

1. Dias, S. and Samson, M. (2016). *Informal Economy Monitoring Study Sector Report: Waste Pickers*. WIEGO, Cambridge, MA and Manchester, UK, 54 pages.
2. Dias, S.M. 2009. *Trajétórias e Memórias dos Fóruns Lixo e Cidadania no Brasil: Experimentos Singulares de Justiça Social e Governança Participativa* (Doctoral Thesis, Universidade Federal de Minas Gerais).
3. Dias, S.M. 2002. *Construindo a Cidadania: Avanços e Limites do Projeto de Coleta Seletiva de Belo Horizonte em Parceria com a Asmare*. (Master thesis). Department of Geography. Federal University of Minas Gerais, Brazil.
4. Dias, S.M. 2011. "Integrating Informal Workers into Selective Waste Collection: The Case of Belo Horizonte, Brazil", *Wiego Policy Brief (Urban Policies)*, No 4, May, 12 pages, accessed 01 March 2019 at http://www.inclusivcities.org/wp-content/uploads/2012/07/Dias_WIEGO_PB4.pdf
5. IBGE, 2010. *Censo 2010. Instituto Brasileiro de Geografia e Estatística* available at <https://www.ibge.gov.br/estatisticas/sociais/populacao.html>
6. SNIS, 2016. *Diagnóstico de Manejo de Resíduos Sólidos*. Secretaria Nacional de Saneamento. Available at <http://www.snis.gov.br/>

(2) The IEMS involved quantitative and qualitative research on 763 waste pickers in five cities in Africa, Asia and Latin America.

(3) For a summary of key IEMS findings for Belo Horizonte see <https://www.wiego.org/sites/default/files/migrated/publications/files/IEMS-Belo-Horizonte-Waste-Pickers-Executive-Summary.pdf>