

## 73 - PROFILE OF PUBLICATIONS ON THE WORK IN URBAN CLEANING

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### INTRODUCTION

The world is increasingly crowded and next to this elevation, propagates the use of manufactured products that permeates the increase in the quality of waste, it generates major problems society (MOURA; NASCIMENTO; LIMA, 2013). By contrast, the adoption of the global model of outsourcing and privatization of urban sanitation services in developing countries may have a negative effect on the health of workers, since, in addition to a reduction in their wage rates, turnover is extremely high in private sector companies, which prevents programs of training and prevention. This should result in an increase in accidents and deterioration of already low, health standards of these workers (LOPES et al., 2012).

Collectors commonly known by garbage collectors and street sweepers do urban waste collection work. The activity consists of handling processes, transportation and disposal of waste (KRONE et al., 2013; ESTEVO, 2012). The sweeper has a responsibility to make recognition of such products efficiently, but the lack of adequate working conditions for its realization, leads him to expose his life to constant danger, affecting their integrity and their work performance (SOUSA et al., 2015; MOURA; NASCIMENTO; LIMA, 2013).

Therefore, the daily execution of work activities enables the display of street sweepers to various risks. Are common workplace accidents risks caused by lack of training, lack of adequate working conditions and the inadequacy of the technology used to the reality of developing countries; contact with biological hazards due to contamination by direct contact and closer to the moment of waste generation, most likely the active presence of infectious microorganisms, as well as exposure to heat (physical hazards), contact with battery (chemical) as well as non-ergonomic postures (SOUSA et al., 2015; PATARO; FERNANDES, 2014; ESTEVO, 2012).

By exposure, it is recognized that development activities in the public cleaning requires the adoption of occupational safety measures, understood as a study that provides protection or developer assistance in their work environment in order to avoid accidents in performance activities and occupational diseases. In order to reduce such risks inserted in the middle, thereby building a more pleasant environment for workers (BRASIL, 2010).

Against the backdrop, if the objective was, from this review study, analyze the profile of publications on the work on urban sanitation.

### METHOD

This is an integrative review of the literature, which focuses on relevant research analysis to support decision-making and improve clinical practice (SOARES et al., 2014, p. 335). It is noteworthy that the method cited "presents international reputation in nursing research and evidence-based practice".

The same was done in the period from September to October 2015, starting from the choice of subject, the definition of the research question and keyword selection based on The Medical Subject Headings (MeSH), it being: urban cleaning.

After defining the MeSH, made a search on the Virtual Library Database in Health, which condenses publications of the Scientific Electronic Library Online (SCILEO), the Latin American and Caribbean Literature (LILACS), among others.

Based on the initial search criteria, we identified preliminarily number of 194 studies, of these 65 discarded as they contain the MeSH in the title, 100 are not available and eight are in thesis format, dissertations, monographs, editorial and legislation. The remaining 21 productions read in full (Figure 1).

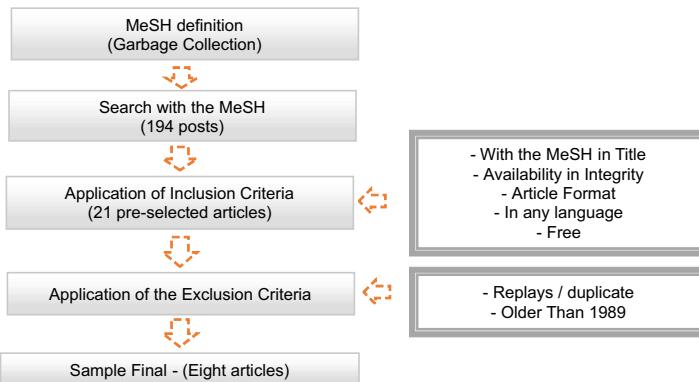


Figure 1: Studies selected according to database

The inclusion criteria of this study were scientific articles published in any language and to and free. Since the exclusion criteria were repeated articles in the databases (leaving only once) and prior to 1989.

After made pre-selection and selection of articles, provided the sample eight publications. Therefore, some articles form read in their entirety analyzed and removed the relevant information for this review.

### RESULTS AND DISCUSSION

According to the publications analyzed for authors, year, journal and databases it can check the following results (Table 1). Publications were observed between the years 1989 to 2014, and the years with the highest number of publications were in 1989 and 2014, with 25.0% (n = 2) each. Considering the language, most were available in Portuguese (87.5%; n = 7).

Regarding the journals found seven different magazines there featured the "Revista Psicologia, Organização e Trabalho" which reached the highest percentage with 25.0% (n = 2) of the publications and the formation area of the first author was predominantly psychology (37.5%; n = 3). Regarding the database, the one that stood out was the LILACS, with 62.5% (n = 5) of available items.

Table 1 - Characteristics of papers about the authors, year, title, journal and database

Authors / Year	The First Author Formation	Periodic	Database	Language
Motta; Borges (2014)	Psychology	Rev. psicol. organ. trab.	LILACS	Portuguese
Pataro; Fernandes (2014)	Physiotherapy	Rev Bras Epidemiol.	LILACS	English
Leal et al. (2013)	Psychology	Psicol. ciênc. prof.	LILACS	Portuguese
Barbosa et al. (2010)	Psychology	Rev. psicol. organ. trab.	LILACS	Portuguese
Graudenz (2009)	Medicine	Rev. bras. saúde ocup.	LILACS	Portuguese
Gomes; Abegg (2007)	Dentistry	Cad Saude Publica	MEDLINE	Portuguese
Tinoco et al. (1996)	Medicine	Rev Soc Bras Med Trop.	MEDLINE	Portuguese
Marziale; Carvalho (1989)	Nursing	Rev. gaúch. enferm.	MEDLINE	Portuguese

The categories of articles, they fall into five distinct thematic approaches. The most prominent category was the impact of the work process on health / worker's disease with 50.0% (n = 4) (Table 2).

Table 2: Categorization of studies

Authors / Year	Title
<b>Category 1 - Organizational aspects and work process</b>	
Motta; Borges (2014)	Limpeza urbana: o contexto institucional e a atividade de varrição em belo horizonte
<b>Category 2 - Repercussions of the work process on health / worker disease</b>	
Pataro; Fernandes (2014)	Heavy physical work and low back pain: the reality in urban cleaning
Barbosa et al. (2010)	Perfil de bem-estar psicológico em profissionais de limpeza urbana
Graudenz (2009)	Indicadores infecciosos e inflamatórios entre trabalhadores da limpeza urbana em São Paulo
Tinoco et al. (1996)	Emprego de quatro exames imunológicos na determinação da prevalência da doença de Chagas nos garis do Serviço de Limpeza Urbana do Distrito Federal
<b>Category 3 - Interpersonal Relations and street cleaning</b>	
Leal et al. (2013)	A atitude dos universitários em relação ao profissional de limpeza urbana
<b>Category 4 Occupational risks and street cleaning</b>	
Marziale; Carvalho (1989)	Riscos ocupacionais em limpeza urbana: varreção de ruas
<b>Category 5 - dental impacts the life of the worker urban cleaning</b>	
Gomes; Abegg (2007)	O impacto odontológico no desempenho diário dos trabalhadores do departamento municipal de limpeza urbana de Porto Alegre, Rio Grande do Sul, Brasil.

According to the findings of the above categories, it can be seen the evidence in articles included in this review, as of thematic approaches included in the studies.

In the "organizational aspects and work process" Motta; Borges (2014, p. 37), try to describe the authority of the management process responsible for urban sanitation in Belo Horizonte, between the years 1973-2012, focusing on the specific activity of sweeping. The authors found that "public policies promoted changes in institutional frameworks with significant impacts on the organization", however, "the dustmen perceive as predominantly problematic". Based on this concern, the authors suggested the participation of workers in administrative procedures, which would value the group experience and enabled the quality of life.

In the "repercussions of the work process on health / worker's illness", Pataro; Fernandes (2014), in order to describe the prevalence of low back pain, occupational characteristics, extra occupational and factors associated with aggravation in the urban sanitation workers. The authors showed that many workers develop their activity in the presence of pain and low back pain was associated with longer work, flexion and rotation of the trunk, the psychosocial demands, work directly in the collection and the low level of education, however, work dynamic (walking, running) acted as a protective factor. Given the findings, they suggested the adoption of preventive measures, with adaptations in the physical environment and work organization.

Considering also the category 2, Barbosa et al. (2010) in order to trace a psychological wellness profile urban cleaning professionals in the city of Campina Grande (PB), identified four groups with the following psychological well-being profiles: unstable, anxious, satisfactory and balanced, whereas men tend to have more psychological well-being (balanced and satisfactory profiles) than women (anxious profile). The results showed that psychological well-being preserved for most, but 31% of the sample is in the process of wear and should serve as a warning so that measures taken to regain emotional balance.

Graudenz (2009), in order to compare health problems among functional groups of workers in urban cleaning resulting from biological exposure from contact with the Solid Waste in São Paulo in 2007, contacted that among the sweepers, there was a higher percentage of protozoa in the stool, lower immunization coverage for hepatitis B and a higher percentage of contact with the causative agent of leptospirosis.

According to the authors, among the drivers, there were frequent use of antibiotics, and total white blood cell count

greater than the control group and percentage of macrophages and neutrophils to the top scanners. The personal collection, transshipment and landfill showed indicators of respiratory infections and increased systemic inflammatory activity similar to controls, suggesting no increased risk for these diseases in these groups. By the findings, the researcher suggested, especially for scanners, systematic vaccination for hepatitis B prevention and control actions for intestinal parasites and preventive measures for leptospirosis.

Tinoco et al. (1996) found to be a high prevalence of dustmen Chagas infection of the Urban Cleaning Service of the Federal District. From different tests, total Chagas spent was 129, 35% of street cleaners of the sample.

As for category "interpersonal relations and urban sanitation," Leal et al. (2013) in order to identify the attitudes of students from public and private schools across the urban professional cleaner, covering topics of broad interest in social psychology, such as prejudice, attitude, stereotype and discrimination and their impact on man-labor relationship, the results showed that women are more aware of the importance of cleaner profession for the public good functioning and that there is prejudice in social relations, and although it is expressed subtly, yet brand negatively the social relationship.

In the "occupational hazards and urban sanitation," Marziale; Carvalho (1989), seeking to identify occupational hazards they are exposed to street sweepers, which handle urban waste daily, showed that even occupational activity is considered small degree of risk, the incidence of accident risk is significant. The Blunt and cutting injuries are the most common and more workers away from their duties in the period between zero and ten days.

In category 5 "dental impacts on the life of the worker urban cleaning," Gomes; Abegg (2007), in order to investigate the prevalence of oral impacts on daily performance of employees of the Municipal Department of Urban Cleaning of Porto Alegre, Rio Grande do Sul, Brazil, between 35 and 44 years showed that 73.6% of sample had at least one daily performance affected by dental problems in the past six months. The most affected was eating and enjoying the food (48.6%), discomfort (40.6%) and dissatisfaction with appearance (31.5%) were the most prevalent symptoms and missing teeth (21.7 %) and toothache (20.7%) were the main causes of oral impacts on daily performance.

## FINAL CONSIDERATIONS

There are few publications relating to urban cleaning, likewise, most found in the LILACS database, in Portuguese, published before 2011, reflecting the downgrade of publications. In addition, the researchers of psychology were the ones who are interested in the subject matter. Therefore, as contemplated core theme was impact of the work process on health / worker disease.

From the evidence, it expected that this work could serve as a source of knowledge and information about the subject matter and awaken the interest of researchers in effect research in the area covering essentially the dichotomy public cleaning versus worker's health, for the sake of prevention of diseases and health promotion of workers in the area.

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**PROFILE OF PUBLICATIONS ON THE WORK IN URBAN CLEANING****ABSTRACT**

**Objective:** To analyze the profile of publications on the work on urban sanitation. **Method:** This is an integrative review, carried out in the periods from September to October 2015, starting from the choice of subject, the definition of the research question and keyword selection based on Medical Subject Headings - Urban Cleansing. From this and the inclusion and exclusion criteria, eight publications constituted the sample. **Results:** There are few publications that portray approaches relating to urban cleaning, likewise, most were found in the Latin American and Caribbean database (62.5%; n = 5), Portuguese (87.5%; n = 7) and published before 2011 (75.0%; n = 6), showing the downgrade of publications. In contrast, as contemplated core theme was impact of the work process on health / worker disease (50.0%; n = 4). **Conclusion:** From the evidence, it expected that this work could serve as a source of knowledge and information about the subject matter and awaken the interest of researchers in effect research in the area covering essentially the dichotomy public cleaning versus worker's health, in favor promoting the health of workers of the area.

**KEYWORDS:** Work. Urban Cleaning. Profile.

**PROFIL DES PUBLICATIONS SUR LES TRAVAUX EN nettoyage urbain****RÉSUMÉ**

**Objectif:** Analyser le profil de publications sur le travail sur l'assainissement urbain. **Méthode:** Ceci est un examen d'intégration, réalisée dans les périodes de Septembre à Octobre 2015, à partir du choix du sujet, la définition de la question de la recherche et sélection de mots clés basés sur descripteurs sciences de la santé - nettoyage urbain. De cela et les critères d'inclusion et d'exclusion, huit publications constituaient l'échantillon. **Résultats:** Il existe peu de publications qui décrivent des approches relatives à la propreté urbaine, de même, la plupart ont été trouvées dans l'Amérique latine et des Caraïbes base de données (62,5%; n = 5), portugais (87,5 %; n = 7) et publiée avant 2011 (75,0%; n = 6), montrant la dégradation de publications. En revanche, le thème central était envisagée comme l'impact du processus de travail sur les maladies de la santé / des travailleurs (50,0%; n = 4). **Conclusion:** De la preuve, il est prévu que ce travail peut servir comme une source de connaissances et d'informations sur le sujet et d'éveiller l'intérêt des chercheurs dans la recherche de l'effet dans la zone couvrant essentiellement le nettoyage public dichotomie contre la santé des travailleurs, en faveur la promotion de la santé des travailleurs de la région.

**MOTS-CLÉS:** Travail. Nettoyage Urbain. Profil.

**PERFIL DE PUBLICACIONES SOBRE LA LABOR REALIZADA EN LIMPIEZA URBANA****RESUMEN**

**Objetivo:** Analizar el perfil de las publicaciones sobre la labor realizada en materia de saneamiento urbano. **Método:** Se trata de una revisión integradora, llevado a cabo en los períodos entre septiembre y octubre de 2015, a partir de la elección del tema, la definición de la pregunta de investigación y selección de palabras clave basado en descriptores de Ciencias de la Salud - Limpieza Urbana. A partir de esto y los criterios de inclusión y exclusión, ocho publicaciones constituyan la muestra. **Resultados:** Hay pocas publicaciones que retratan los enfoques relativos a la limpieza urbana, del mismo modo, la mayoría se encuentran en la base de datos de América Latina y el Caribe (62,5%, n = 5), portugués (87,5 %, n = 7) y publicado antes de 2011 (75,0%, n = 6), demostrando la rebaja de las publicaciones. Por el contrario, el tema central fue como se contempla el impacto del proceso de trabajo sobre la enfermedad de la salud / trabajador (50,0%, n = 4). **Conclusión:** A partir de la evidencia, se espera que este trabajo puede servir como una fuente de conocimiento e información sobre el tema y despertar el interés de los investigadores en la investigación de efecto en el área que cubre esencialmente la limpieza pública dicotomía frente a la salud de los trabajadores, a favor la promoción de la salud de los trabajadores de la zona.

**PALABRAS CLAVE:** Trabajo. Limpieza Urbana. Perfil.

**PERFIL DAS PUBLICAÇÕES SOBRE O TRABALHO NA LIMPEZA URBANA****RESUMO**

**Objetivo:** Analisar o perfil das publicações sobre o trabalho na limpeza urbana. **Método:** Trata-se de uma revisão integrativa, realizada nos períodos de setembro a outubro de 2015, partindo da escolha do tema, da definição da questão de pesquisa e da seleção da palavra-chave com base no Descritor em Ciências da Saúde - limpeza urbana. A partir deste e dos critérios de inclusão e exclusão, constituíram a amostra oito publicações. **Resultados:** Existem poucas publicações que retratem abordagens referentes a limpeza urbana, de igual modo, a maioria foi encontrada na base de dados do Literatura Latino-Americana e do Caribe (62,5%; n=5), em português (87,5%; n=7) e publicada antes de 2011 (75,0%; n=6), evidenciando a desatualização das publicações. Em contrapartida, o núcleo temático mais contemplado foi repercussões do processo de trabalho sobre a saúde/doença do trabalhador (50,0%; n=4). **Conclusão:** Pelas evidências, espera-se que este trabalho possa servir como fonte de conhecimento e informação sobre o objeto de estudo e desperte o interesse de pesquisadores em efetivar pesquisas na área contemplando, essencialmente, a dicotomia limpeza pública versus saúde do trabalhador, em prol da promoção da saúde dos trabalhadores da área.

**PALAVRAS-CHAVE:** Trabalho. Limpeza Urbana. Perfil.