The experience in traffic and its effects on the health of bus drivers: a phenomenological descriptive study

A vivência no trânsito e as implicações na saúde dos motoristas de autocarros: estudo fenomenológico descritivo

Abstract

Background: The daily life of bus drivers is dynamic and influenced by many variables: their driving skills, their ability to overcome their fears, and their ability to follow an established itinerary. Bus drivers experience limitations and challenges that can trigger a process of psychological distress.

Objective: To describe the perceptions of bus drivers about their experience in traffic and the possible effects of daily urban mobility on these drivers.

Methodology: Descriptive, phenomenological study based on the work of Maurice Merleau-Ponty. It was conducted at a bus station between July and December 2017. Twenty-four bus drivers were interviewed using open-ended questions.

Results: Two categories emerged: Traffic is a box full of surprises and Psychological balance is necessary.

Conclusions: Giving a voice to these professionals, bringing to light what causes their suffering, and recognizing their needs will contribute to the prevention of physical and psychological disorders, as well as traffic accidents. Bus drivers need better conditions to set the city in motion on a daily basis.

Keywords: conscience; drivers; traffic; occupational diseases; stress, psychological; qualitative research

Resumen

Marco contextual: La vida diaria del conductor de autobús es dinámica. Existen muchas variables a su alrededor: su capacidad para conducir y controlar sus miedos y el correcto cumplimiento de su itinerario. Las limitaciones y los desafíos experimentados pueden desencadenar un proceso de sufrimiento psicológico.

Objetivos: Describir las percepciones de los conductores de autobuses sobre la experiencia en el tránsito y los posibles efectos de la movilidad urbana diaria en los conductores.

Metodología: Estudio descriptivo fenomenológico, basado en el pensamiento de Maurice Merleau-Ponty, realizado en una terminal de autobuses, de julio a diciembre de 2017. Se entrevistó a 24 conductores de autobuses mediante preguntas abiertas.

Resultados: Surgieron dos categorías: el tránsito es una caja de sorpresas y el equilibrio psicológico es necesario.

Conclusiones: Dar voz a estos profesionales, sacar a la luz las causas de sus sufrimientos y reconocer sus necesidades contribuirá a la prevención de las enfermedades físicas y psicológicas, así como de los accidentes de tráfico. Los conductores necesitan mejores condiciones para poder poner en marcha la ciudad a diario.

Palabras clave: conciencia; conductores; tráfico; enfermedades profesionales; estrés psicológico; investigación cualitativa

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Introduction

Bus drivers develop their activity in traffic: a dynamic and systematic space that requires diffuse attention and care. This profession is universal and it is present in several cultures. In this profession, the worker is exposed to variables that influence (positively or negatively) their daily work: high-intensity vibrations; virus; high temperatures; food deprivation; and potential accidents. They are sometimes exposed to an unhealthy environment. However, the main impact is on their interpersonal relationships with colleagues, the organization, and the passengers. The burnout and stress associated with this type of work can change the professional’s physical, biological, and psychological health (Rajeshwar, Rajalakshmi, Nitin, & Umadevi, 2016).

Therefore, the worker’s health involves a range of dimensions, including those related to their own body, their social life, family, and self-care (Silva et al., 2019). In this way, it is important to consider subjectivity and interpersonal relationships with the purpose of promoting and preventing the worker’s health and, in this area, the occupational health and nursing teams can help them to prevent health damages.

Working in public transportation is stressful (Alcantara, Silva, Pereira, & Silva, 2016) because the job demands are a threat to the workers themselves. Factors external to the drivers can be adjusted to increase their satisfaction. Disregarding this everyday situation hinders the promotion of conditions favorable to the work of bus drivers, besides leading to physical and mental exhaustion (Martins, Lopes, & Farina, 2014).

The passenger transport sector requires practices aimed at improving the quality of life and providing incentives to drivers. To overcome the daily challenges of bus drivers in traffic, it is important to provide them with better working conditions, more comfortable seats, air-conditioning in the cabin, as well as wage incentives. They need to be professionally recognized, also as a way to overcome stress. In view of the above, this study aimed to describe the perceptions of bus drivers about their experience in traffic and the possible effects on these drivers of their daily professional lives.

Background

According to data from the World Health Organization (WHO), Brazil ranks third in the list of road traffic deaths by country (WHO, 2013). Road traffic accidents are the leading cause of death, injury, and hospitalization, resulting in high economic and social costs. The majority (52%) of people killed in traffic are vulnerable road users – pedestrians, motorcyclists, and cyclists. To remedy this situation, Brazil has developed preventive measures and invested in public awareness campaigns about best practices in road safety, such as not using a mobile phone while driving; regular use of the safety belt; respecting the crosswalk; respecting public transport or bike lanes; among others.

Bus drivers can work up to 56 hours a week in some countries, which may lead to a higher number of accidents due to intense workload. India ranks first in the list of road traffic deaths worldwide, and several studies have reported on the effects of this type of work based on an assessment of bus drivers’ health status through medical examination, namely digestive disorders, vision and hearing problems, back pain, as well as pollution-related effects (Rajeshwar et al., 2016). Thus, it is evident that the dynamics of urban traffic contributes to increasing fatigue and stress. It is important to highlight that the drivers’ workload is 42 hours a week in Brazil, which is where the study was developed.

Stress is particularly negative to bus drivers because it contributed to increasing their dissatisfaction with the profession. In addition, the disrespect for the ergonomics needed for carrying out their work alters the physiological and cognitive dimensions, causing various problems (Martins et al., 2014). The implementation of ergonomic improvements and the lack of disrespect for bus drivers’ needs are the first steps of the professional recognition desired by this professional group. Their daily life is dynamic and influenced by many variables: their driving skills, their ability to overcome their fears, and their ability to follow an established itinerary. In this context, these professionals take people to and from several locations, including their homes, workplaces, or specific events, thus adding another important variable: the safe and responsible transportation of human lives. This dynamism should also be reflected in measures to care for these professionals. The limitations experienced by these professionals are usually not considered by the companies where they work, and the process
of psychological distress is neglected by both the professional and the organization. This psychological distress can be silent or invisible, although it can also be suddenly triggered while driving. Stress becomes excessive when it lasts too long, causing physical and psychological damage to the body and becoming dysfunctional (Matos, Moraes, & Pereira, 2015). Professionals need to search within themselves for psychological resources so as not to negatively impact urban mobility.

The identification, description, and analysis of bus drivers’ complaints – affected by day-to-day events – contribute to the dissemination of their urgent needs: seat adjustment, air-conditioning in the buses, a flexible work schedule, proper hydration and ventilation of the bus on hot days, and keeping the body warm during cold days are some simple measures that make a difference in the driver’s work in any part of the world (Ismail, Abdullah, Abdullah, & Deros, 2015).

From an organizational perspective, the bus driver drives a bus. However, the physical and psychological processes in their daily work need to be considered. Thus, the professional world adds a third responsibility: caring for the driver.

In order to provide comprehensive care to this worker, it is also important to look into and understand their inner selves: their subjectivity, that is, to bring the invisible to light. The knowledge transcends the physical; the body does not hold the experience, it does not contain it; the body is more than physical reactions, nerves, and bones. The visible is what is seized upon with the eyes, the sensible is what is seized on by the senses (Merleau-Ponty, 2014). The incidence of pain in the back and lower limbs, among many others, allows us to think about improvements in care for drivers, the nursing sector at work should be responsible for operationalizing the practice of care in the company.

Thus, health education must be implemented and busdrivers should be encouraged to care for themselves and overcome the fear to seek medical care, for example.

Research questions/Hypotheses

What are the perceptions of bus drivers about the experience in traffic and what are the consequences for their health?

Methodology

In this study, a descriptive qualitative approach was used based on the phenomenological work of Maurice Merleau-Ponty. Phenomenological research brings the social closer to the biological and the meanings. This theoretical framework revolutionized the studies on the phenomenon and the perception by considering perception as the knowledge of the body itself, prior to reflective knowledge (Carel & Meacham, 2013). Therefore, corporeality holds the conscience, and in it, perception places the body in the world (Silva, 2017).

This methodological framework was chosen due to the level of subjectivity involved in the proposal of this work. Phenomenology assumes another place where the individual is recognized as an individual yet also as a social being, an individual establishing a relationship with the other and the world (Merleau-Ponty, 2014).

Phenomenological researchers ask the question: “What is the essence of this phenomenon? How is it experienced by these individuals? What does it mean?”. Essence is what makes a phenomenon what it is; without it, the phenomenon would not be what it is. The phenomenological interview with open-ended questions is the listening that touches the body/soul of others profoundly through a persistent silence (Merleau-Ponty, as cited in Silva, 2017).

The phenomenological framework allows the researcher to remove any preconceptions and previous knowledge to understand, together with the interviewee, the phenomenon under analysis based on the other’s perspective. It is possible to understand the meaning of the phenomenon, the experience, in the phenomenological interview (Giorgi, 2006).

The guiding question was: What is your experience in road traffic? This type of interview starts with a guiding question that will guide the data collection process, enabling open-ended answers (Dale, 1996). The phenomenological interview is a research method that allows for free discourse and considers the symbolism in discourse, becoming rich in details. Since the experience of road traffic is very dynamic and full of feelings and emotions, it was possible to grasp these experiences though the participants’ meaningful narratives. These meanings are constantly latent but often cannot be shared due to the lack of conditions, namely these professionals’ stressful
and rushed daily routines.

This study was approved by the Research Ethics Committee of the Hospital Universitário Antônio Pedro, of the Faculty of Medicine, with opinion number 2.131.165 on 21 June 2017, under CAAE: 64110016.2.0000.5243. The ethical and legal assumptions of Resolution no. 466/2012 of the National Health Council were followed. The interviews took place at the bus station. Participants were recruited through the snowball technique, in which an interviewee talks to another one about the research and, like a snowball, the number of interviewees grows (Vinuto, 2014). The driver was invited to know more about the study and read the Informed Consent Form (ICF). After accepting and signing the ICF, the interview would take place in a private room of the human resources department of the bus company. It should be noted that the interviews were conducted with the drivers that arrived at the bus station after their workday. Therefore, the study did not include all the bus drivers working at the bus station. The interviews lasted on average 60 minutes and were audio-recorded after the participants’ consent. A total of 24 interviews were conducted. There was no sample loss because the drivers immediately agreed to participate after being informed about the study objectives. The inclusion criteria for the study were participants with more than two years in the profession, more than two professional update courses as drivers, and who had not been away from work for more than five years under the National Social Security Institute (INSS). The exclusion criteria were drivers who had another paid activity and those who, for some reason, did not want to participate.

Data analysis in phenomenological research follows four steps: the first step involves the careful reading of the transcripts of the participants’ recorded interviews, preserving the language of the subject; in this second step it is possible to understand that the participants’ statements come together to describe their experiences and they are similar to the other participants; the third step requires the transformation of the participant’s language into scientific language, keeping the emphasis on the phenomenon described; the final step is the synthesis and association of the meaning units, arriving at the core of the meaning of the phenomenon (Giorgi, 2006).

The drivers’ anonymity was ensured and they were identified through the acronym PTC (profissional do transporte coletivo, public transport professional), together with Arabic numerals to facilitate the researcher’s organization while ensuring that only the researcher could identify them. Essential excerpts of the interview transcripts were selected for meeting the proposed objectives. The phenomenological framework was used and the results were presented in meaning units, grouped by the contents highlighted in the subjects’ narratives, and analyzed based on studies on the subject, ensuring the uniqueness of the experiences, supported by concepts of the phenomenological thinking (Hilkner, Beck, Tanaka, & Dini, 2019).

Results

The sample consisted of 22 men and two women. The mean age was 41.6 years. All participants had more than two courses in the transport area. Eight drivers reported spine problems and constant back pain; 12 drivers reported feeling headaches on a daily basis; one driver mentioned leg pain; and four drivers reported no health problems.

All interviewees reported taking anti-inflammatory and analgesic drugs at least 1 day a week, in addition to the medication that most of them already took for specific health problems. None of the bus drivers had gone to a psychologist, mainly due to their weekly work routine. The mean time in the profession was 10 years. Six drivers worked in municipal buses and 18 drivers traveled greater distances on inter-municipal buses. Nineteen drivers highlighted the traffic itself as a major inconvenient in their day-to-day work.

The following categories emerged: Traffic is a box full of surprises, which expresses the unpredictability in bus drivers’ daily work; and Psychological balance is necessary, with the constant search for patience being essential in their job, as an exercise of resistance to adversities while driving and in the relationship with other drivers and passengers.

The drivers reported daily episodes in the exercise of their profession, especially the difficulty
of others, of different vehicles, to deal with the buses in traffic, and how their body reacts on a day-to-day basis.

In Category 1, the following reports should be highlighted: “Some days are good, and some days are terrible. It makes you want to leave everything behind, go home, and relax” (PTC 1, July 2017); “some things could change in traffic. I don’t know why they don’t do anything. Each day is a new day, a box full of surprises, nothing surprises me anymore” (PTC 2, July 2017); “You have to get used to it because traffic is not easy. It is not easy, but . . . I ask God for protection . . .” (PTC 6, July 2017); “traffic, it is normal, when I started working I knew what I would face, I try to do my job as peaceful as possible” (PTC 12, August 2017); “traffic, it is normal, when I started working I knew what I would face, I try to do my job as peaceful as possible” (PTC 12, August 2017); “We can’t predict anything, at one moment you can be relaxed and then people do things they shouldn’t, sometimes I have difficulties in traffic because people are reckless, they don’t care about their lives, about the pedestrians” (PTC 14, August 2017).

In Category 2, the following reports should be highlighted:

“Today, if you’re not calm, patient on the street, it is very complicated” (PTC 3, July 2017);

It is somehow complicated, there are a lot of cars on the street, the drivers are rude, you ask for permission to pass but they don’t let you, put their car in front of you, call you names. Then, you have to try to keep calm, which is not easy. Human beings could be more polite. I have a lot of headaches. I get very nervous. (PTC 4, July 2017);

You’re under a lot of stress. The drivers’ day-to-day is always a new experience. Stress is inside of us. We have no time for ourselves . . . In the end, if the driver doesn’t have mental health, mental hygiene, he ends up having a stroke, because it’s very complicated. I have a lot of headaches and pain in my body. (PTC 05, July 2017);

I go to work with back pain. It is the seat’s position. I compare traffic with life: I think that our life has moments of many joys and difficult moments. Our life is a path, and when I reach the end, I’ll turn around and go back, and keep my head together. (PTC 07, July 2017);

“My experience in traffic is very stressful, particularly at rush hour, everyone wanting to get to work, everyone late, people being rude, and wanting to take priority” (PTC 8, August 2017);

If you use the blinkers or horn, they tell you to go over them. And in that case, you need to keep it cool, turn on the hazard lights to say that the car is in the front. I turn on the hazard lights, I try to get rid of it to go away. (PTC 9, August 2017);

“You are a professional so you have to give in, if you crash into another car regardless of being right or wrong, I try to be as patient as possible, and that’s what causes stress” (PTC 10, August 2017); “Traffic is chaotic, I think drivers have the worst working conditions” (PTC 11, August 2017); “I try to be patient because traffic today is very stressful, and I know what I’m talking about, from the moment I wake up until the moment I fall asleep, because traffic is movement” (PTC 13, August 2017); “I try to do my best in the most relaxed way possible, but somedays you’re not feeling good, you have family issues, you’re sad, stressed out, but I always try to do things right, well done” (PTC 15, September 2017); “I do my best to follow the schedule, but if I can’t, I’m ok with it”. (PTC 16, September 2017);

If traffic is jammed, you have no option, it is a very difficult reality, my secret is patience, I count from one to five, and then back again because otherwise you do something foolish, being nervous won’t solve anything, you’ll have a heart attack there, it won’t do any good. (PTC 17, October 2017);

“if you love what you do, traffic won’t stress you out” (PTC 18, October 2017); “some people already wake up feeling stressed and take it out on everybody who’s behind the wheel. It bothers me when passengers are rude” (PTC 19, October 2017); “sometimes (laughter) traffic is violent. So, we have to, have to . . . slow it down” (PTC 20, November 2017); “it bothers me when passengers are rude. They are ill-mannered and ruin my day” (PTC 21, November 2017); “oh, some clients ignore me. They lack respect and education” (PTC 22, December 2017); “It makes me sad just to talk about it. The passengers treat us badly” (PTC 23, December 2017); “sometimes accidents happen because the driver got scared, you have to keep calm in every situation, ok? I like to look back and see the passengers sleeping because I feel that they trust me” (PTC 24, December 2017).

The other drivers’ behavior was also a stressful aspect for these drivers. The traffic and the con-
ditions of the bus seats were a source of distress and pain. Stress was an aggravating factor for the driver’s dissatisfaction with their profession. The disrespect for ergonomics alters the workers’ physiological and cognitive dimensions. These drivers are constantly searching for patience. Experience has taught them that mental ill-health is a very high price to pay for their profession.

Discussion

The malaise within the group can negatively impact the driver’s working day. The worker continues to drive even after being mistreated by the passengers. The imbalances in the interpersonal work relationships weaken the driver’s body, which can lead to the somatization of this conflict. The bus drivers cannot decide who enters in their work environment (the bus), becoming vulnerable to the passengers’ mood. The task often does not take into account the drivers’ particularities (Quirino & Villemor-Amaral, 2015). The tasks need to be carried out mechanically, often disregarding the driver’s emotional status. Mental exhaustion is at the heart of health risks. Loss of concentration, increased aggressiveness, the driver’s shock with the outside reality, and the interpersonal difficulties associated with the colleagues’ lack of respect affect the professional’s health.

The company demands are a cause of stress for these professionals. The number of years in the profession is associated with stress, loss of sense of humor, general malaise without a specific reason, and constant fatigue. The following conditions of road traffic workers should be highlighted: no fixed worksite; they have to spend their workday in the turmoil of traffic; and they have no control over who enters their workplace. In buses, the interpersonal relationship with passengers is necessary, but it is a source of stress and other symptoms. Driving a public passenger vehicle is both an individual and a collective activity - the reason for this service is to transport clients but the conflicts in the driver-client relationships are inevitable and have an impact on health. Human health has been changing due to the process of globalization and productive restructuring, defining the health-disease process of the productive population (Minayo, 2002). The transformations that occur in the economic, political, social, and technical domains at work have a strong impact on the workers’ health. The more dehumanized is the environment, the more difficult it will be for the individuals who interact there to survive. Caring is a way of being; without care, we are no longer human beings. This is the reasoning behind the philosophical topic under analysis; thus, the statement that caring is what makes us human is a logical statement. Nursing is the art of caring (Polit & Beck, 2011). Healing is sometimes not a consequence of caring, but rather a synonymous of understanding of the other’s pain and experience. In nursing practice, caring reveals the other side of the profession, the empathetic side of someone who understands and who is understood.

To care, it is necessary to know the other, and it is in this technical-scientific domain that the encounter between driver and nurse permeates the activity of both professions. The reason for the nursing consultation in the organization’s clinical sector goes beyond the meaning of symptom or language, to the extent that this professional (nurse) sees the driver as an individual with a body that thinks and suffers from the anguish and dangers experienced in traffic. Nurses can be recognized by their ability to understand the need for care delivery and build the humanized encounter based on listening and a collaborative partnership with the bus driver.

In this context, the human resources represented by the Psychology sectors in the organizations are responsible not only for hiring and firing bus drivers and other employees, but also for meeting their needs, ranging from getting things out of their chest to the traumas experienced at work. The phenomenon of driving can be perceived outside of urban mobility. The world and the body of the bus driver are affected by the working conditions and stress (Martins et al., 2014). The search for a balance between professional and psychological demands is a daily exercise for bus drivers. These professionals strive to control their emotions so as not to affect their service and the interaction with the passengers and get through the day with a
positive attitude (Zamboni & Barros, 2016). These professionals’ work schedules may vary according to the company’s needs. The activity requires exclusive dedication, and it is often the only source of income for these workers. Perception is the entry into consciousness. It is through perception that the facts and phenomena are revealed to the individual. It is unique and, therefore, each individual has its own perception. There is an existential phenomenon in perception. Life is not only made of scientific explanations; the experienced perception of individuals should also be valued. The perceived object can be a reference to the body. After feeling, the new thought should be understood; reflection will be sure of having precisely located the center of the phenomenon if it is equally capable of bringing to light its vital inherence and its rational intention (Merleau-Ponty, 2014). In this way, the object traffic is experienced in a particular manner by each of its components, and here the participation of bus drivers should be highlighted. There is a plurality of reflections, memories, omissions, silences, and voices in perception. This plurality exists not only between two subjects, but even in a single one: the same human being can perceive the same phenomenon in different ways; human beings and everything that shapes them is subject to subjectivity, temporality, and the way of being and behaving in the world (Merleau-Ponty, 2014).

The gaze of the subject is not only the result of the reflection of light sources on the cornea; in phenomenology, the gaze is about revisiting the world, the meaning of consciousness of being in the world. There is nothing more difficult than to know for sure what exactly drives consciousness itself. It perceives the world, beyond vision, and seeks to understand the meaning of the experiences and emotions (Silva, 2017). Human consciousness transcends the neurological location; it is dynamic, it adapts to what is known. The phenomenon consciousness is reflected in the thinking that turns into act. We can exist beyond the perception: if it is the body, if it is part of the world, if it the feeling, if it is the look (Merleau-Ponty, 2014).

The phenomenological gaze is associated with the immediate consciousness about what is perceived, about the phenomenon, about the world, about the phenomenon body, for example, which is the subject itself, an interaction of being-in-the-world. In the context of health, the contributions of Phenomenology are related to caring-researching-caring; it is necessary to consider the subject and their narratives on their lived experiences. The variables influencing bus drivers’ daily lives, including the problematic interpersonal relationships, the organizational demands, and their personal demands (which cannot be ignored), are causes of stress and health changes. The suffering at work is a reality, and it is necessary to motivate the worker and provide a healthy and satisfactory working environment (Alcantara et al., 2016). It is essential to take into account the uniqueness of each individual because their subjectivity is a manifestation of universal life, but it is also important to know that the experience of an individual occurs in a social context and is contextualized and influenced by the culture of the group where it occurs.

The limitation of this study was its own originality: phenomenological research studies in health are still scarce, mainly those related to occupational health. This is the first work of a thesis on bus drivers based on the phenomenological methodology. The majority of the studies on the workers’ health use quantitative methods that analyze the incidence of diseases, among other variables. Perception is a basic construct of phenomenology, thus this study aimed to interpret how bus drivers are affected, both physically and emotionally, by their working conditions based on their perceptions. In order to overcome this limitation, the authors sought to transform these workers’ perceptions into phenomenological language. Phenomenology, with its philosophical sensitivity, prioritizes the subject as a human being, taking into account their life context as a whole.

**Conclusion**

The negative effects of working in collective transportation, either because of the daily surprises or the stress caused by the interpersonal relationships with colleagues or passengers, call into question urban mobility, pointing to the need for bus companies to provide favorable conditions for this professional activity, such as a suitable environment and health promotion.
interventions. These workers should also care for their own health, seeking help not only for the physical body, which manifests symptoms that affect their strength to work, but also for the mental body. Without mental health, it is impossible to remain in the job market and transport human lives with responsibility and safety.

In addition, the government should improve the traffic routes, as well as facilitate access to health and provide better working conditions as part of its public policies to care for the professionals in the transport sector.

Health sciences play a key role in care delivery to bus drivers because it is necessary to preserve the body as part of the work process and change the organizational logic, which prioritizes production and neglects the worker. Thus, further studies with bus drivers are needed to overcome their lack of invisibility in the cities and in their urban context.

Giving a voice to these professionals, bringing to light what causes their suffering, and recognizing their needs will contribute to the prevention of physical and psychological disorders, as well as traffic accidents.

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