Personal Hygiene, Dignity, and Economic Diversity among Garbage Workers in an Urban Slum of Indonesia

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Abstract

Although numerous studies have argued that sanitation workers play a significant role in the existing sanitation system while being at the cost of their health and dignity in an inappropriate work environment, they are often socially ostracized, and hence understudied to date. This study aimed to examine the current state of garbage workers, who engage in unloading and sorting garbage along with a particular focus on exploring personal hygiene, dignity, and socioeconomic diversity. This study examined these aspects in a sample of seven garbage workers in an urban slum of Indonesia through participatory and interview surveys. The results showed that there were several particular sanitation-related issues affecting workers: wetness (e.g., menstrual products and animal corps), dirtiness, and hazardous garbage (e.g., medical syringes and broken glasses), which contributed to serious health-risk exposures. Participants reported high levels of feeling of safety and potential health-risk awareness; however, this study also demonstrated low levels of risk-controlling behaviors, representing no proper safety gears caused by two unique factors: physical discomfort and work inefficiency. Results also revealed the diversity in income generation accompanied by that participants work in the exclusive circle comprising family members, which may implicate their economic affluence. While dignity in/at work was entrenched in some workers in the context of social abuse, reframing process (e.g., affirmation) and hierarchical comparisons helped them experience their value in/ at work. These findings need to be discussed in relation to past and recent studies in other economically developing countries for a better understanding of this population.

Keywords: garbage worker, occupational condition, socioeconomic status, personal hygiene, dignity, urban slum

Introduction

Achieving improved sanitation is a central determinant of assessing people's wellbeing (WHO 2018) as championed by Sustainable Development Goals (SDG 6) by the United Nations aiming to "by 2030, achieve access to adequate and equitable sanitation and hygiene for all".¹) Prior to this international endorsement of the emphasis

 ^{70/1.} Resolution adopted by the General Assembly on 25 September 2015, "Transforming our World: The 2030 Agenda on Sustainable Development", United Nations, 21 October 2015. https://www.un.org/en/development/desa/population/ migration/generalassembly/docs/globalcompact/A_RES_70_1_E.pdf (Accessed November 28, 2019)

on sanitation, a considerable number of readers of one of the leading medical journals, *British Medical Journal*, have chosen the introduction of clean water and sewage disposal representing "the sanitary revolution" as the most important medical milestone since 1840 (Ferriman 2007). This clearly indicates that sanitation is an important dimension in understanding and evaluating health in everyday life. According to World Health Organization (WHO), sanitation generally refers to "the provision of facilities and services for the safe management of human excreta from the toilet to containment and storage and treatment onsite or conveyance, treatment and eventual safe and use disposal" (WHO 2019a). Furthermore, its broad definition covers "safe management of solid waste and animal waste", simultaneously suggesting that sanitation workers (e.g., garbage collectors and waste pickers/ scavengers) may play a significant role in sanitation chain, and hence more studies targeting this population would be important to be addressed in terms of their social significance and worth.

In contrast with the worldwide trend in focusing attention on sanitation, much less is known about people engaging in the existing system, that is, the current state of sanitation workers regardless of their essential roles. In this regard, WHO displays that although they "bridge the gap between sanitation infrastructure and the provision of sanitation services", these populations are "often at the cost of their dignity, safety, health, and living conditions" but "far too often invisible, unquantified, and ostracized" (WHO 2019b). Studies have shown that, in urban in developing countries, municipal solid waste management has been a massive challenge in multiple aspects compared to the waste management situation in industrialized countries (Medina 2005; Rodic et al. 2010). In this existing issue, recycling of municipal solid wastes in cities in economically developing countries is mainly dependent on informal waste recovery by scavengers, simultaneously showing that 2% of the populations in Asia and Latin America engage in waste picking to make ends meet (Medina 2000; Wilson et al. 2009 Gunsilius et al. 2011). Generally, these people as referred above are known as "waste pickers", "scavengers" or "rag pickers", who engage in collecting, sorting, and recovering materials that are deemed to be waste for reuse or recycling (Medina 2000; Wilson et al. 2006). In this respect, waste disposal sites (i.e., garbage collecting sites) are considered to be places where all forms of garbage come from urban and industrial and commercial areas, and that is, exposure to wide-ranging health risks along with improper safety procedures/gear would be a serious issue to be concerned and addressed by concerning authorities (Cunningham et al. 2012; Amegah and Jaakkola 2016; de Diana et al. 2018).

In a study (Matter et al. 2013), socioeconomic aspects such as high unemployment rate and a considerable number of urban poor are suggested to be the key contributors to these informal recycling activities. In this context, Montgomery (2008) argued that more than half of the entire population in the world lives in urban areas, which is accompanied by that over half of the residents in low- and middle-income counties will reside in cities by 2030. This situation contributes to the fact that poverty such as slums in these urbanized areas is also increasingly seen (Pradhan 2017). Slums are characterized as crowding population density in residential areas, environmentally fragile and socially marginalized (Wratten 1995; Nolan 2015). Indeed, urban growth accompanied by a rapidly increased population and the urbanization of poverty has been faced with inadequate capacity in provision of sufficient services in water, sanitation and garbage collection (Yach et al. 1990), which may explain significance of people engaging in garbage work.

In addition to potential physical risks in unsafe and unhealthy working conditions and the increase in urban poor as discussed earlier, the UN has also indicated social stigmatization in SDG 8²) as an important issue to address, which simultaneously implicates that self-esteem and dignity of workers are another important dimension to

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explore. Indeed, some study raised awareness that these populations live in both physically and socially hostile environment (Wilson et al. 2009). In the extreme case, in a work by Medina (2000), scavengers were socially abused through a "social-cleansing" campaign that was once aimed to expel them out of neighborhood by some paramilitary groups. While there are a range of perceptions regarding the concept of workplace dignity in a Western context, such as decent work conditions (e.g., paychecks and terms) and self-related aspects (e.g., equality, worth, autonomy, respect, and satisfaction) (Berg and Frost 2005; Lucas et al. 2013), Hodson (2001: 3) placed an emphasis on establishing (1) self-worth and (2) self-respect and (3) acquisition of respect from others. Bolton (2007: 8, original italics) highlighted these dimensions as discussed above more differentially and comprehensively: the study described that *dignity in work* may be understood as meaningful and intriguing along with "responsible autonomy", socially acknowledged esteem and respect while platforms offering fair treatment (i.e., opportunity), "collective and individual voice, safe and healthy working conditions, secure terms of employment and just rewards" would help to attain *dignity at work*.

This study aims to extend our understanding of garbage workers' dignity in/at work by considering workers' fear of negative appearance evaluation (FNAE). According to Watson and Friend (1969), fear of negative evaluation represents one's apprehension and distress over others' evaluations or negative evaluations towards the person. Given this global concept, Thomas et al. (1998) have extended the general understanding of FNE by developing a new measure (Fear of Negative Appearance Evaluation Scale: FNAES) based on Brief Fear of Negative Evaluation Scale (Leary 1983) to explore relationships with appearance-related dimensions (i.e., body image). A follow-up test of this newly created measure was conducted, which demonstrated its relationships with a wide range of dimensions such as social physique anxiety, body image, eating attitude, and mood (Lundgren et al. 2004). In a recent study, FNAE has been significantly associated with cosmetic surgery attitudes among midlife women, showing its extensive usefulness in examining unique dimensions (Dunaev et al. 2018). To the best of our knowledge, no previous studies have extended the measure in the context of dignity in a specific population as garbage workers. In this sense, this study will add to this literature as discussed earlier that may warrant further test in the other diverse populations.

These situations in earlier discussion may lead to a proposition that, garbage workers are vulnerable to lower selfesteem and dignity compared to the others in/at different works. This is an important dimension to explore because, in a specific environment as a slum constituting urban that is often neglected and out of reach of local authorities and communities along with economic impoverishment (UN-HABITAT Urban Secretariat and Shelter Branch 2002), ostracism and social ridicule may persist and augment in the specific population (e.g., garbage collecting sites) due to the nature of their work. Therefore, examining the current state of garbage workers multidimensionally is also important from a practical point of view, as it may identify people that require targeted intervention.

In the present study, we aimed to examine personal hygiene, dignity, and economic diversity of sanitation workers (i.e., garbage workers) in urban slum of Indonesia. To the best of our knowledge, no existing studies have directly addressed this specific population by adding participation (i.e., engagement in the same work as workers') to interview survey. That is, lack of empirical research would be one of the main limitations of this current body of research on drawing a richer picture of the current conditions of these workers. Based on this, this work specifically explored potential issues related to sanitation and health, and wellbeing of garbage workers, along with three hypotheses as follows:

- (1) Garbage workers would be exposed to an inappropriate work environment and hence a range of health risks on a daily basis due to the inherent unpleasant nature of their work.
- (2) Socioeconomic affluence would be restricted among garbage workers.
- (3) The current work environment as well as the nature of the occupation may contribute to low levels of dignity of garbage workers in/at work.

1. Method

1.1. Participants

In this study, seven participants (garbage sorters) were recruited at a temporal collection site (Tempat Penampungan Sementara: TPS) in Rukun Warga (RW)—a community association comprising several Rukun Tetangga as (RT, neighborhood association)—of some district (i.e., slum) in Bandung (state) in West Java Province, Indonesia. A limited number of workers were selected as participants for this preliminary study as these workers are the members who work at a temporal collecting site as referred above on a daily basis along with age diversities. Although the definition of a slum is heterogeneous by country, state and city (Nolan 2015), the area where the research was conducted is generally considered as a slum constituting an urban area of Bandung particularly in terms of residential crowding (Otsuka et al. 2018).

This work comprising actual participation in what garbage workers engage in and interview surveys was conducted to participants in the end of August in 2019, which lasted seven days. Prior to this study, a local authority and participants were approached by a principal investigator in advance and were given a full explanation that the research was aimed at obtaining general information of garbage workers and investigating specifically the individual's values towards sanitation and health. For ethical procedure, this study was conducted under supervision of Indonesian Institute of Sciences (LIPI) that is empowered by Memorandum of Understanding (MoU) with Research Institute for Humanity and Nature (RIHN) in Japan.

1.2. Measures

The present study was conducted based on mainly two methods: participatory survey and interview survey coupled with questionnaires.

Participatory survey

Participatory survey here refers to engagement in garbage collecting with sanitation workers aiming at examining two following aspects:

- 1) How garbage workers perceive and behave towards sanitation.
- 2) Whether they wear safety gear and how they physically cope with sanitation-related issues.

Interview survey

Self-made questionnaire survey coupled with established body image scale was subsequently administered to participants by means of interview. Questionnaires were conceptualized and developed through multiple times of discussion with Indonesian and Japanese researchers who have experiences in targeting garbage workers in their previous studies. Throughout the interviews, utmost attention was paid to items as they contain sensitive expressions so as to avoid unconsciously emotional discomfort. Besides, with the aim of protecting privacy, every term associated with study participants in the present study was deleted (from each figure as well).

Questionnaires comprise the following contents:

- 1) Demographics (age, ethnicity, parents' occupation, partner's occupation, area people are from and years of working at TPS).
- 2) Satisfaction/dissatisfaction towards sanitation-related issues and a work environment (sample item: Do you feel annoyed by odor while working?). In this term, we asked participants on how potential sanitation-related issues at garbage collecting site affect (affected) them through interviews. That is, interviewers asked each interviewee on the previous and current states of the disturbance level of these issues.

- Self-consciousness of what others think of his/her job (sample item: Do you care how people think of your job?).
- 4) Work gear (sample item: What do you usually wear to your work place?).
- 5) Self-consciousness (awareness) of health risk exposures (sample item: Do you think of your potential risk for exposure to various diseases while working?).
- 6) Body image (FNAES) (Lundgren et al. 2004).

Fear of Negative Appearance Evaluation Scale (FNAES)

The six item scale was developed from the modified Brief Fear of Negative Evaluation Scale (Leary 1983); the instrument asked respondents to rate the extent to which the one feels fear of his/her negative appearance (sample item 1: I am concerned about what others think of my appearance, sample item 2: When I meet new people, I wonder what they think about my appearance) on a 5-Likert scale (1 = Not at all, 5 = Extremely). In previous studies (Lundgren et al. 2004), FNAES demonstrated significant relationships with a variety of body image and social anxiety scales, potentially showing its utility in diverse fields. The present study used this instrument to assess garbage workers' wellbeing.

Since *Bahasa Indonesia* is an official language and extensively spoken in Indonesia, each item of the questionnaires that were developed in English were all translated into a local language by some fellow Indonesian researchers who are fluent in both English and *Bahasa Indonesia* when administered to the participants. Hence, the interview was conducted by both English and *Bahasa Indonesia* speaking researchers in order to bridge the language gap between interviewers and interviewees.

2. Results and Discussion

2.1. Characteristics of study participants and garbage collecting sites (TPS)

Table 1 shows the descriptive characteristics of study participants. The mean age of participants was 35.6, ranging between the ages of 23 and 56 years old. More than half of the participants live in the outskirts of Bandung. Results showed that parents of some participants were garbage workers (sorters) that are shown by two for father's and one for mother's, respectively. In this regard, strikingly, the results regarding partner's occupation also revealed that a partner (spouse) of three participants engages as a garbage worker at the moment. The findings of the study suggest that people may engage in garbage sorting as a family business (Wilson et al. 2006) which is supported by some participants mentioning in the interview that they were asked to join garbage-working forces by their parents or spouses and the fact that some of the workers engage in garbage sorting with their parents, spouses, siblings or children. Five participants were shown to engage in their current job as a garbage sorter for more than four years.

Item		
Age (mean, min, max)		35.6, 23, 56
Ethnicity (n, %)		
Javanese	0	0
Sundanese	7	100
Others	0	0
Mother's occupation (n, %)		
Housewife	4	57
Garbage sorter	1	15
Farmer	1	14
Others	1	14
Father's occupation (n, %)		
Construction worker	3	43
Garbage sorter	2	29
Craftsman	1	14
Others	1	14
Partner's occupation (n, %)		
Garbage sorter	3	43
Housewife	3	43
Not yet married	1	14
Origin (n, %)		
Cicalengka	2	29
Cipeundeuy	2	29
Sumedang	1	14
Bandung	1	14
Kiaracondong	1	14
Years working at TPS (n, %)		
< 4 years	2	29
>= 4 years	5	71

Table 1. Characteristics of participants at garbage collecting site (TPS) (n = 7).

2.2. Cash flows at garbage collecting sites (TPS)

Figure 1 shows the cash flow at TPS. Initial payment will be made to garbage collectors (Indonesian Rupiah (IDR) 10,000/household/month) and RW 02 from each RT (IDR 3,000, 5,000 or 7,500). Cash that is generated in this payment by these two stakeholders (RW 02: 100,000/RW/month, garbage collectors: IDR 10,000/cart/trip) will go to a person (garbage sorter) in charge at TPS, which will subsequently be distributed to each stake holder as follows: truck driver (IDR 500,000/month), 20 garbage sorters (IDR 50,000/person/month), RW 05 for security (IDR 1,300,000/month), Supervisor from PDK (a government-owned company in providing cleaning services: IDR 150,000/month), a junkshop owner located next to TPS (IDR 600,000/month), and vice head of TPS (IDR 250,000/month).

Figure 2 shows income sources of TPS workers. Payment and cash transaction occur in the following scenes: (1) payment from each RW as also shown in Figure 1 (IDR 50,000/person/month), (2) unloading garbage from collectors (IDR 10,000-20,000/cart/trip), (3) unloading garbage from residents (IDR 5,000–20,000/garbage), and (4) selling separated garbage to a junk shop (IDR 30,000/day). Figure 3 breaks down how workers at TPS generate income in the process of unloading and sorting garbage from collectors. Some study argues that income generation is also dependent on the levels of sorting differentiation; according to Wilson et al. (2006), for example, the value of plastic can be higher when it is separated into multiple categories rather than grouped into one major category.

This sorting skill was confirmed in a veteran at TPS by the interviewer (Figure 3), which may contribute to different levels of income among workers that warrants further investigation. In this sense, some study conducted in Bangladesh suggests that promoting segregation at the household level may preserve the value of recyclable materials and also contribute to reducing substantial amounts of unnecessary wastes (Matter et al. 2013), which suggests that this may provide workers with better access to clean and sortable recyclables that could potentially elevate the value and income accompanied by improved environmental conditions. However, the study in the country above also argues that increasing refuse segregation at household level could provide better access to recyclables for the other actors involved in waste business such as recyclables buyer and waste collector—if they exist—, which may contribute to lowering waster pickers' income (i.e., garbage workers at TPS) due to less valuable items in the mixed waste. On the other hand, a study in Bangalore, India (Shah 1999) suggests that alternative employment such as working at a recycling center through communitarian interventions for further segregation and composting could be a way to provide these workers with more beneficial elements such as less social stigmatization (harassment), increased social visibility (social recognition), and stable income. In this regard, further studies will be necessary to explore potential actors involved in waste business to further explore economic aspects of garbage workers.

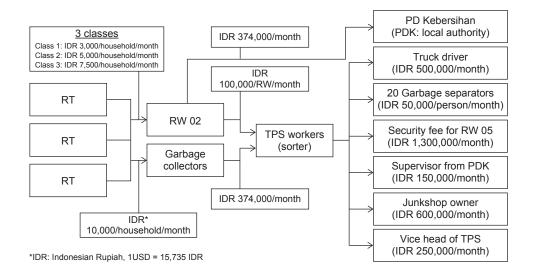
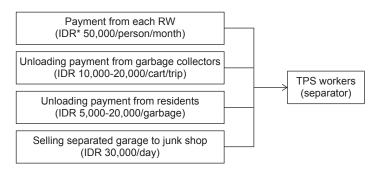


Figure 1. Cash flow at garbage collecting site (TPS).



*IDR: Indonesian Rupiah, 1USD = 15,735 IDR

Figure 2. Income sources of garbage workers (TPS).





Figure 3. (a) Cash generation in unloading and sorting process at TPS. (taken by the authors: A.S., K. U. and M. I.) (b) Sorted waste. (taken by the authors: M. I.)

2.3. Participants' values on sanitation and work environment

Table 2 shows sanitation-related values of study participants that comprise satisfaction towards work environment, awareness of health-risk exposure, and self-consciousness on what others think of his/her job. Firstly, the most annoying sanitation issue was wetness (3), which is followed by odor (2), dirtiness (1) and others (1). Wetness that is referred here shows the state of garbage representing liquids or a rain puddle. Secondly, as explained earlier in the method, participants were asked to rate the extent to which they feel disturbed by each of three main possible sanitation issues that are wetness, odor and dirtiness before and after they started working at TPS. As to wetness, more than half (4) of the workers reported that they were initially disturbed by the issue, whereas six reported no disturbance currently. As to odor, while three study participants answered being negatively affected, six reported no disturbance currently. On the other hand, disturbance levels of dirtiness remained the same (5) in the case of both before and after the participants started working at TPS, respectively. Some respondents supported this result answering that they were already determined and were aware of the horrible work environment in advance before they engaged in their current job, which may moderate the sensation of disturbance. Though wetness and odor seem more likely to influence the workers, compared to dirtiness, these two issues may be moderated in the similar manner to dirtiness by their determination and them reporting getting accustomed to the issues. While individual voices through interviews are important to note, these findings need to be treated with caution. In this term, workers' preparedness is a reflection of denials of dignity, endorsing subservience related to social taint that could contribute to lower levels of social esteem in dignity at work (Ashforth and Kreiner 1999; Bolton 2007; Hamilton et al. 2019).

Figure 4 shows that the workers were observed to engage in unloading and sorting garbage without proper safety gear to guard themselves from being exposed to every possible sanitation issue, which may support their rationale as written above; some workers were also observed to eat food barehanded without washing (Figure 4(a)). Specifically, despite the fact that the workers raised two garbage as the most dangerous representing medical syringes (4) and broken glasses (2) (Figure 4(b)) that are characterized by edgy, and animal corps (4) and menstrual products (3) as most uncomfortable to touch, the workers do not wear masks, gloves nor boots (Figure 4) based on the main reason that these gear can cause physical discomfort such as itchiness and heat, and hence inefficiency in work. In reality as shown in Figure 4(c), some worker was exposed to injuries in his foot that was caused by broken glasses. The worker headed back to work after being provided first aid with water and cloth to wrap up his wounded foot without sterilization. This situation implicates low levels of risk controlling, which may also contribute to subsequent risks such as infection. In contrast to these seemingly inappropriate work styles, all workers but one reported the feeling of safety while working (Table 2). The other workers have mentioned in the interview to support this proportion that they can be precautious in working even without proper safety gear. However, the reality demonstrated that being self-conscious/aware of potential health risk exposures seems unlikely to compensate for not wearing proper safety gear in the context of potential chances of getting wounded. Taken together, it is reasonable to expect that their current work conditions may predispose them to be frequently exposed to wide-ranging health risks as shown in respiratory diseases, physical wounds and the other communicable diseases that are physically preventable with knowledge (Kuijer et al. 2010; Hagemeyer et al. 2013; Zolnikov et al. 2019). The findings may warrant proper interventions by policy makers in terms of workers' decent self-awareness on avoiding/controlling risks.

Item	n	%	
Most annoying sanitation issues			
Wetness	3	43	
Odor	2	29	
Dirtiness	1	14	
Others	1	14	
Disturbance level (initial state)			
Wetness			
Never	3	43	
Sometimes	2	28	
Always	2	29	
Odor			
Never	4	57	
Sometimes	2	29	
Always	1	14	
Dirtiness			
Never	5	71	
Sometimes	2	29	
Always	0	0	

Table 2-1. Sanitation-related values of study participants: satisfaction towards work environment, awareness of health-risk exposure, and what others think of his/her job (n = 7).

Item	n	%
Disturbance level (current state)		
Wetness	6	86
Never	1	14
Sometimes	0	0
Always		
Odor		
Never	6	86
Sometimes	1	14
Always	0	0
Dirtiness		
Never	5	71
Sometimes	2	29
Always	0	0
Work cloth		
Provided safety gear	0	0
Something okay to be stained	7	100
Others	0	0
Where to get work cloth		
Home	0	0
TPS	0	0
Shops	0	0
Others (given by residents)	7	100
Feeling of safety on working		
Never	1	14
Sometimes	3	43
Always	3	43
The most dangerous garbage		
Medical syringes	4	57
Broken glasses	2	29
Skewers	1	14
Broken cans	0	0
The most disgusting garbage		
Animal corps	4	57
Menstrual products	3	43
Awareness of health-risk exposure		
Never	4	57
Sometimes	2	29
Always	1	14

Table 2-2. Sanitation-related values of study participants: satisfaction towards work environment, awareness of health-risk exposure, and what others think of his/her job (n = 7).



Figure 4. (a) Current situation of the work environment at TPS. (taken by the authors: M. I.) (b) Current situation of the work environment at TPS: broken glasses. (taken by the authors: A. S.) (c) Current situation of the work environment at TPS 3: health risk. (taken by the authors: A. S.)

2.4. Participants' values on work conditions and dignity

Table 3 shows values on their work of study participants. Six out of seven participants reported the feeling of contribution to the society such as responsibility in cleaning the area for residents and strikingly, motivation to be a garbage worker, respectively. In this regard, respondents raised three particular reasons to be a garbage worker that are providing for family (2), no other jobs available (4), and freedom in work styles (1). However, almost half of the workers (4) also answered that they care about how others think of their job accompanied by the result that mean scores of appearance consciousness scale were 3.26. Some participants rated more than 4 (Figure 5) given higher scores indicating higher levels of fear of negative appearance. This may have a connotation that some workers' self-esteem is more likely to be lower than those who take other jobs. In this support, some workers concern on their dignity and actual case of social abuse (Medina 2000). Although no data available to support the supposition, the issue of dignity and physically horrible work environment may have contributed to six out of seven people willing to have a different job.

Despite the findings as described earlier, it is notable that some workers referred to their social role as a garbage worker; "Keep TPS clean so that residents do not complain about its odor", "the importance of the current job in the community". Taken together, while some workers' dignity is threatened in the context of social abuse, they may try to compensate for the negative aspects associated with their work by bringing in positive views in the context of social significance and worth: a study with garbage workers and street cleaners from the United Kingdom (Hamilton et al. 2019) argued that workers may attempt to transform the ways in which their jobs are seen (i.e., social stigmatization) through reframing process as shown in *infusion* and/or *negation* of the stigmatized aspects (Ashforth and Kreiner 1999), or *affirmation* of worth in/at their work. Furthermore, self-reliance should also be noted as an important tool that may serve to maintain or assert workers' dignity. In this term, as described earlier, two interviewees indeed mentioned providing for their family as one of the reasons to

be a garbage worker. This finding is in line with a study with garbage workers in the United Kingdom, showing that many interviewees stressed that they could financially support themselves and their family by working (Hamilton et al. 2019). On the other hand, in the context of hierarchical esteem, one interviewee commented freedom at work. That is, in light of the findings from a study discussed in self-reliance (Hamilton et al. 2019), some workers may experience workplace dignity in the form of social comparisons with other people in/at different works in a favorable way. These important dimensions may warrant further studies and discussion in sociological contexts.

When asked the feeling of satisfaction towards income, work condition, and interpersonal relationships, more than 70% of participants reported that they were satisfied (or at least neither satisfied nor dissatisfied with income) with these three aspects. The results of this study can be supported by several economic facts that there are multiple ways of generating income in reported Figure 1, 2, and 3. The workers engage in unloading and sorting garbage process with their parents, spouses or siblings, which may assure them of capability to continuously financially support themselves possibly with conveyance of harmony at work environment comprising close family members. To support this supposition, as another possible factor, although some studies indicating very low income of scavengers due to their low position in the waste-trade hierarchy (Medina 2000; Wilson et al. 2006), the present findings also argues that scavengers may not be economically lowest; in explanation, Indonesian government endorses the work of scavengers as economically and environmentally beneficial to the country itself by encouraging the workers to form cooperatives and imposing a duty on imported waste materials to increase their income (Medina 2000). However, this case should be treated with caution in terms of its generalization and therefore further studied with more profound interviews.

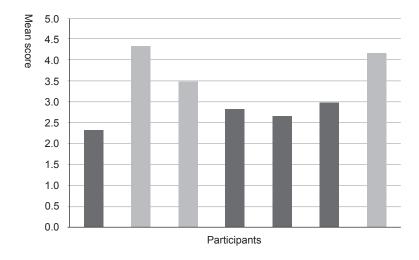


Figure 5. Mean score of Fear of Negative Appearance Evaluation Scale (broken down by each participant).

Item	n	%
Feeling of responsibility to the society		
Never	1	14
Sometimes	0	0
Always	6	86
Care how others think of a job		
Never	4	57
Sometimes	3	43
Always	0	0
Desire for a different job		
Never	1	14
Sometimes	6	86
Always	0	0
Motivation to be a garbage worker		
Never	1	14
Sometimes	0	0
Always	6	86
Particular reason to be a TPS worker		
Provide for family	2	29
No other job	4	57
Freedom in working	1	14
Feeling of satisfaction		
Income		
Never	1	14
Neither satisfied nor dissatisfied	3	43
Always	3	43
Work condition		
Never	0	0
Neither satisfied nor dissatisfied	2	29
Always	5	71
Interpersonal relationships		
Never	0	0
Neither satisfied nor dissatisfied	2	29
Always	5	71

Table 3. Participants' values on work conditions and worth at/in work (n = 7).

Conclusions

This study demonstrated that there are several particular sanitation issues that affect garbage workers such as wetness by exposure to unsanitary garbage (i.e., menstrual products and animal corps), dirtiness, and hazardous garbage (edgy garbage) (i.e., medical syringes and broken glasses) that contributes to serious health risk exposures. Despite the fact that the workers are often at risk of being susceptible to these reported issues, they are likely to be problematically resilient in the context of not wearing proper work gears and depending on being self-consciously precautious based on some physical discomfort and work inefficiency. The current situation of garbage workers in Bandung implicates that the actual safety of sanitation forces is entrenched by multiple negative physical consequences that are caused by unique factors which we may unlikely expect. Notably, the findings of this study also revealed that there are multiple ways for income generation for the workers: garbage unloading, sorting and selling activity is seemingly operated by family units, which may run counter to the social norm that these

populations are generally most socioeconomically vulnerable, and hence are confronted with inadequate capacity to meet basic needs. Future studies are necessary to dismantle and discern these sanitation forces in terms of their cash flows, which may help examine their actual socioeconomic abundance affecting their livelihood. Finally, interviews that include FNAES demonstrated its wide-ranging utility by examining garbage workers' dignity: while dignity in/at work was threatened in some workers in the context of social abuse, reframing (e.g., affirmation) process of their work and hierarchical comparisons with others also helped them experience their value in/at work in terms of its social significance and value.

There are several limitations that should be considered in the extension of this work. As the first limitation of the present work, although one of the strengths of this study is its method that incorporates participation in interview survey, future work could generalize these findings to a wider population by examining diversities in age, gender, cultural groups and sanitation workers (e.g., street cleaners) to develop a richer picture of garbage workers. In this regard, although we paid utmost attention on our verbal expressions and atmosphere, some worker may have experienced pressure to provide information that deviates from one's individual voice. Secondly, dignity in/at work of garbage workers should be further studied by qualitative work with both semi-structured and open-ended interviews and discussed in more sociological contexts for fundamental understanding of the nature of their work. In this regard, dignity should also be described in the context of men's masculinity as this contains endurance, which may be a significant predictor of worth in/at their work (Pomper 2010). Finally, this dignity-oriented research could be developed in examining familial aspects representing intimate conversations as well as associations with the other psychosocial aspects such as self-esteem and body image.

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