



Performance of Public Places of Convenience in the Wa Municipality.

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Abstract: A major challenge facing all countries, particularly those in sub-Saharan Africa is how to manage the urbanization process and its attendant negative externality, especially in the issue of swift change of land cover over and above that caused by prompt population growth. Also, one of the daily natural needs of all mammals (and therefore human beings) is the need for the discharge act (which is the discharge of fecal matter and urine), just as they need to eat and drink. This study examines the performance of public toilet facilities in Wa Municipality, located in Ghana's Upper West Region. Using a quantitative descriptive approach, data were collected from managers, caretakers, and users across ten selected public toilet sites. The research assessed facility conditions, user satisfaction, maintenance practices, and the role of local authorities in sanitation management. Findings reveal that while routine maintenance is common, structural improvements are rare due to limited resources. Issues such as poor hygiene, dislodgement delays, and occasional conflicts between users and caretakers were also identified. Despite infrastructural challenges, most users expressed satisfaction with caretaker behavior. The study underscores the need for improved management strategies, increased investment in sanitation infrastructure, and more inclusive planning to ensure equitable access. It recommends stronger collaboration between local authorities and facility operators, regular inspections, and community engagement to enhance the effectiveness and sustainability of public sanitation services in Wa.

Index Terms – Public sanitation, public places of convenience, urban hygiene, performance, Ghana

I. INTRODUCTION

Public sanitation is one of the leading urban health concerns in sub-Saharan Africa, and nowhere is this more evident than in small to medium townships, where population growth abounds and environmental infrastructures fail to keep pace [1]. In the past decade, a need for operational, safe, and clean public conveniences has emerged in Wa Township, the capital city of the Upper West Region of Ghana, due to rural to urban migration, increases in urban commercial activities, and significant urban development's placing more stress on public facilities and operational needs [2]. Wa has seen a steady increase in population from 37,954 in 1984, to 67,922 in 2000 and 76,973 in 2010, representing a 110.7% increase over a 32-year period [3]. Yet, where the demand for public restrooms has skyrocketed, the supply and quality of public conveniences are still lacking (in quantity and quality) throughout the township. Public toilets, public conveniences, are synonymous with public health, dignity, sustainability, and urban equity.

When communities do not have adequate access to relief, they jeopardize their risks for communicable diseases, additional open defecation, and at-risk populations such as women, children, and persons with disabilities are left to face even worse fates [4]. As the Wa Township continues to grow into a more developed city environment with a focus on public toilets as part of its oversight, population health and sociocultural engagement are bound to be critical as factors of growth for similar residents. Historically, sanitation in Ghana has been a determinate focus for policymakers, but not for policymakers across the board. Recently, developments in public water supply and solid waste developments have been found on many regimes' developmental focuses; however, public toilets seem to be left for the determination of private enterprise operators and local assemblies. In Ghana, the National Sanitation Strategy and Action Plan by the Ministry of Sanitation and Water Resources in 2020 claims that sanitation is an essential component of national developmental focus. Still, only evaluations of standards of public toilets, frequencies of maintenance, and equitable access are observed regionally without inclusive public awareness [5]. As a result, this has led to many public toilets in Wa Township (highly disproportionate percentage) that are unsanitary, unsafe, or inaccessible/not usable by the majority.

With over 22% of urban Ghanaian households relying on public toilets for relief, this percentage is even greater in low-income populations [6], public toilet maintenance and equitable access across socioeconomic strata is critical. Yet various studies assert that accessibility is limited and public toilet conditions remain subpar due to design faults, insufficient budget allocations, and limited regulatory oversight [7]; [8]. Users report overwhelming odors, no access to water, toilets that do not function properly,

darkness and lack of lighting, and ineffective sex-based gendering. These problems transcend the public toilets' operational use and reflect an inattentive approach to effective, sustainable infrastructures for urban sanitation.

Additionally, beyond access to public toilets, there is a spatial injustice to note where access to public toilets is concerned. In Wa Township, and much of Ghana for that matter, more public toilets are located at markets, lorry parks, and other commercial enterprises. Where people live, especially in the case of peri-urban developments, public amenities are far less available, compelling some to utilize illegal, unsanitary, and unsafe practices. This kind of imbalance sparks the inquiry into the fairness of the urban planning process of such public amenities and the ultimate socio-economic realities that go into such planning [9]. Exacerbating this is the management model of the common township where these locations exist. For example, in Wa, public toilets operate through quasi-public capitalized management. Public-private partnerships (PPP), for example, have been found to be a successful avenue for urban service management, yet they rely on transparency, legislative guidance, and third-party accountability. In far too many situations, the quasi-public Wa public toilet charges an entry fee too exorbitant for its low-income users to bear with no reinvestment for sustainability; simultaneously, the public toilets run by the township has inconsistent cleanings, no staffing protocols, and delayed nonoperational times [10]. Additionally, attention to gender and disability is lacking. For example, many public toilets in the township are not gender-sensitive (having no consideration for privacy or menstrual usage) and do not make room for disability access (having no consideration for wheelchair access). Thus, women and those with disabilities must either utilize non-secure resource options or avoid public service access. This creates a gendered inequity of access to what the township offers and further marginalization [11]. The location and design of accessible toilet facilities are essential as they provide people with disabilities the opportunity to equal access equally.

Also, inclusive public toilets enhance urban sustainability, as they make cities accessible to a wide range of users, including the disabled [12]. In addition, the environmental impacts of public toilets can also be negative if they are not controlled. Leaking and other issues such as improper waste control and septic tanks filling up create soil and aquifer contamination, which is unhealthy. These situations do not help in Wa with its flooding history (in recent times) during the rainy season and more water complicating the already frustrating urban waste management, public health and hygiene concern of poorly regulated flush systems. Thus, for health and environmental concerns, flush systems of public toilets need to be appropriate [13]. Yet there is limited research on public toilet effectiveness and satisfaction in the Wa Township. Most articles focus on information accumulated in Accra and Kumasi, bypassing nearly towns like Wa as they are focused on the large cities. But there needs to be an awareness of such analyses to foster a regional waste and sanitation management philosophy and implementation plan with modified actions.

This study aims to provide a qualitative assessment of public places of convenience in Wa Township, focusing on their condition, accessibility, distribution, and user satisfaction. By doing so, it seeks to generate evidence that can guide local government and policy makers in improving sanitation infrastructure. The ultimate goal is to enhance the quality of life for all residents, especially those in vulnerable communities, through better access to safe and dignified public sanitation facilities.

II. LITERATURE

Clean public toilets that are convenient, secure, and well-kept are an established part of a human necessity and the urban sanitation system. Performance assessment must also be carried out because this is the key to the calibration of the efficiency of the built facility and it also helps to define the strengths and weaknesses of each facility and broadens the scope for evaluating past and current functioning and for future designing plans [14]. Yet, operations and usage of public toilets remain an incessant concern in many developing countries, especially those experiencing rapid urbanization like the Wa Township, Ghana. Understanding the success of such operations comes from understanding the management and use, as well as the efforts (or lack of efforts) to establish certain thresholds. For example, public sanitation in sub-Saharan Africa suffers from inadequacies (from failing facilities to operational and management issues to socio-cultural and economic costs) relating to operation and legitimacy.

This literature review adds to the literature by filling in two important aspects relative to the effectiveness of a public toilet unit as related to previous research: the level of cleanliness of public toilet units, and why people defecate inappropriately. These two issues are relative to many inadequacies of urban sanitation, and with a findings-based approach to the realities of life in places like Wa, Ghana, where stable and effective sanitation resources are few and mostly problematic for public health and socio-development, these two findings are relevant. Therefore, this literature review presents these findings relative to other literature to create a bigger picture of public toilet use in Ghana and similar situations.

2.1 Level of Maintenance in Public Toilets

Maintenance plays a role in the function, safety, and perception of the public toilet space. Also, building maintenance is said to have a fundamental importance for the safety, soundness and functionality of any type of building, involving a set of activities that are necessary to guarantee satisfactory performance over time, users' needs and modernization aspects of the building, in order to surpass the original performance [15]. Furthermore, *the development of preventive maintenance practices in public management institutions leads to a reduction of public spending expenses for repairs and renovations* [15]. For many developing urban areas, Ghana included, building maintenance is usually not expected and mostly poorly regulated. When it comes to public toilets, over time, this lack of maintenance creates unhygienic public toilet spaces that cultivate unhealthy public health and psychosocial habits [7]. Maintenance (as related to places of convenience/toilets) refers to cleanliness, effective fixtures and consumables (i.e. soap, toilet paper, etc.) and productive inputs/outputs (flushing, soap dispensing, and trash can usage). Yet public toilets that exist without proper managerial assignment often fail to see even rudimentary expectations for operation. For example, maintenance is an issue in urban areas across Ghana due to inadequate funding, untrained staff, nonexistent management, or split responsibilities [9]. Many public toilets are equipped with pay-for-use pricing. Unfortunately, this only holds true if users keep the funds; if not, they are either lost in ineffective management or inadequate amounts result in bathrooms with non-flush toilets, bathrooms torn down, bent stalls, and toilets that overflow, leak, and lights that are never turned on [10]. Some bathrooms go months without paying their custodial staff and thus fail to offer regular maintenance of the spaces.

Maintenance is also complicated by factors when determining public versus private toilets. Private toilets are often on a lease system with local assemblies. As such, they are more profitable and therefore in better condition than public toilets that the government agencies offer. However, with private toilets, the expectation that management will fulfill management might still fall short of management. For example, management systems fueled by profit use leases as vehicles for income development instead of sustainable development into the waterways. For example, in Kumasi, some private contractors invest little in refurbishing, less cleaning, repairs for delayed timing and inexpensive materials to cut costs, aiming for their contracted fee [16]; [8]. Public toilets experience maintenance issues because of use complications. Yet without public education on health and sanitation concerns, problems such as vandalism and abuse occur more readily, suggesting that toilets could be maintained only to fall into disrepair sooner. Therefore, without public outreach and attitudinal change to promote how citizens should utilize these effectively, they will fail no matter how well they are maintained [17]. Furthermore, policymakers may never have the flexibility needed to assess success and sanctions for unsuccessful maintenance contracts.

The maintenance issue is where gender and disability access intersect. Women's bathrooms are infrequent, un-private, and untidy because of maintenance issues and concerns, and this impacts proper menstrual care. In the same respect, the absence of ramps, handrails, or large stalls for handicapped individuals suggests that, within the extensive sanitation system, inclusive maintenance efforts are not considered [11].

2.2 Causes of Defecation Outside Premises of Toilets

The discharge of fecal matter and urine, is one of the daily natural needs of all mammals, and therefore human beings, just as they need to eat and drink [18]. As human beings go about their daily activities, they must make arrangements to cater for this important need for the discharge act. Furthermore, the emergence of cities not only altered social and moral values, but also required hygiene conditions, which forced coexistence as a society. With urbanization, the evacuation began to mechanize and the development of sewage and water systems is also an important indicator of civilization [18]. It is observed that the major challenge facing all countries, particularly those in sub-Sahara Africa is how to manage the urbanization process and its attendant negative externality, especially in the issue of swift change of land cover over and above that caused by prompt population growth [19]. Again, according to [20], data from the Ghana Statistical Service in 2014 indicated that 4.9% of the country's urban households live in impoverished housing (huts, kiosk/containers, tents, living quarters attached to offices/shops, uncompleted buildings, etc.) and many of these dwellers tend to often resort to open defecation. Open defecation, or pooping outdoors rather than having access to toilet facilities, is an ongoing public health concern for many urban and peri-urban populations throughout sub-Saharan Africa and beyond. While one would think in such a world that this action serves as public intent for filth, or cultural propensity, it is determined that a large part of the concern is structural, financial, or environmental [21]. Therefore, in a town like Wa Township, it's essential to learn why people would poop on the street or in the bushes, even when public toilets are available, to understand how more appropriate sanitation would be implemented. For example, one of the major reasons is that the current public toilets are not good enough. Facilities that are filthy, reek, and have a lot of people occupying them disincentivize people from trying. Researchers have found that many people would instead seek a field than risk an illness from a filthy public toilet [7]. Furthermore, if a public toilet has no entry and no exit, especially at night, people are more disincentivized from ever using it due to fear of nefarious intentions against them. For example, many women would prefer to avoid attempting entrance than risk being raped.

Another factor is poor location and distance. For example, in Ghana's metropolitan cities like Wa, public toilets are unevenly distributed. These facilities primarily exist within market and lorry station regions in central business districts. In residential areas with low-income individuals or informal settlements, public toilets are non-existent for dry and wet sanitation [9]. Therefore, people must travel (at night or in the early morning) to these accommodations, which do not cater to the elderly and children who are supposed to be prioritized. Ultimately, if people have to go out of their way to reach a restroom, many adopt the mentality that open defecation in homes and courtyards is better. Again, another factor is expense. Public restrooms in Ghana charge citizens for entry, with an average price of 0.50 to 1.00 cedis per visit. While this may not seem like a lot at first glance, cumulative costs can be overwhelming for low-income families and persons in dire financial situations [16]. In these cases, right or wrong, people would instead seek free options, even if that means occupying dangerous and unsafe spaces. For example, [10] note that market women and head porters (kayayei) in Accra avoid public toilet usage as they never intend to pay for usage multiple times during the day.

Then there is the cultural impact and stigma. Some areas have public toilets for the "poor," or people think public toilets are dirty and do not take care of them, leaving people less inclined to use communal options, especially without doors. For example, people feel embarrassed walking into a public toilet with people looking at them or communal options that are not gender-specific [17]. Additionally, without water, when the sewer does not connect or when septic tanks are filled, many toilets remain unusable for days at a time. People are forced to go in the bushes and in open sewers and construction sites, or they are forced to use "flying toilets," plastic bags filled with excrement tossed in the street. While this is a temporary solution, it becomes a permanent solution when facilities and plumbing are not rectified in a timely fashion [22]. Furthermore, weather and geo-physical concerns complicate using toilets. In areas known for flooding, there may be public toilets that become submerged during the rainy season, or toilets that are too dangerous to use, which encourages people to go higher up when they publicly defecate. Additionally, no roof or awning surrounding outside toilets may prevent people from using them, especially children and the elderly, during adverse weather [21]. Defecating outside the parameters of a toilet is rarely a volitional act; it is the more prominent system failing to offer adequate, affordable, clean and accessible sanitation options. It takes solutions from many levels (that is from infrastructural investment and repairs to subsidies, educational campaigns and a more stringent enforcement of conditions of operation for public restrooms).

III. RESEARCH METHODOLOGY

3.1 STUDY AREA

This study adopted a qualitative descriptive research design to investigate the performance of public toilet facilities in Wa Township, the capital of the Upper West Region of Ghana. Wa Municipality lies between latitude 10°40'_N and 20°45'_N and on longitude 90°32'_W [17], thus covering an area of approximately 1,180 square kilometres which is about 32% and 2.56% of the Upper West Region and Ghana, respectively [19]. According to Ghana Statistical Service, the total population of the Wa Municipality is 107,214, which constitutes 15.3% of the population of Upper West Region [17]. The design allowed for the collection of measurable data to assess the current condition, accessibility, management, and usage patterns of public toilets across the municipality. Wa Township was selected as the study area due to its growing urban population, with increasing demand for public sanitation infrastructure. The research focused on four communities within the township (namely Kabanye, Zongo, Sokpariyiri, and Wapani) which were purposively chosen because of their high population density and the visible state of disrepair observed in many of their public toilets.

The Oxford Advanced Learner's English Dictionary defines population as the number of people residing at a place within a given period of time. However, in research (and for that matter, statistics), population refers to "*the whole set of measurement about which we want to draw a conclusion*" [23]. This means that the population does not refer to people or objects, but the set of items that are being considered, defined by some common characteristics. The target population consisted of three main groups: users of public toilet facilities, caretakers responsible for daily upkeep, and managers overseeing operations and maintenance.

According to [24] a sample is a subset of a population. A combination of stratified, purposive and convenience sampling techniques were used in the study. The stratified method of sampling involves the division of a population into strata, out of which a random sample is then selected from each stratum. The stratified sampling technique was used to identify the four communities mentioned earlier. Therefore, using the stratified sampling method, ten public toilet facilities were selected from the identified communities. From these facilities, a total of 38 respondents participated in the study, comprising 10 managers, 10 caretakers, and 18 users. Purposive sampling was used to select the various managers and caretakers to participate in the study. Convenient sampling method was also used to select the users/beneficiaries to whom the questionnaires were administered. This mix of participants was designed to ensure balanced insights from both facility operators and end users.

Data were collected through three main methods: structured questionnaires, direct observation, and interviews. The questionnaires were customized for each respondent group and covered themes such as toilet usage frequency, cleanliness, maintenance practices, dislodgement schedules, user satisfaction, and safety. For respondents unable to read or write, interviews were conducted using the questionnaire as a guide to ensure consistent data collection. Additionally, field observations were conducted by the researcher to directly assess the physical condition of the facilities, including sanitation levels, availability of water, lighting, and privacy features. These observations served to validate and complement responses from the questionnaires and interviews. Primary data were obtained directly from the field, while secondary data were sourced from relevant policy documents, government reports, and academic literature to contextualize the study and support the interpretation of results. The collected data were analyzed using descriptive statistical tools such as frequencies and percentages, which helped identify patterns and trends in the performance and usage of the facilities.

According to [25], informed consent and the protection of confidentiality are the two most essential elements of ethical conduct. To maintain ethical standards, all participants were briefed on the purpose of the research and gave verbal consent before participation. Anonymity and confidentiality were strictly observed, and participants were assured that their responses would be used solely for academic purposes. Despite the thorough planning, the research encountered some limitations. A few caretakers and managers were initially hesitant to share information due to concerns about their job security, which required additional reassurance and clarification from the researcher. Furthermore, time and resource constraints made it difficult to cover every public toilet facility in the municipality, meaning the findings are based on a representative sample rather than a full-scale assessment.

IV. RESULTS AND DISCUSSION

This section is devoted to the presentation and analysis of the data obtained from the field surveyed through the administration of questionnaires and personal interviews conducted for the managers, caretakers and beneficiaries in the study area.

4.1 Rate of Response

Not all the targeted respondents returned their questionnaire. The table below shows the rate of return of the questionnaire administered.

Table 4.1: Rate of response

Respondent	Number Targeted	Number Returned	Percentage Returned
Managers	10	10	100
Caretakers	10	10	100
Users	20	18	90
Total	40	38	95

Source: Researchers' field work (2023)

Table 4.1 presents the rate of response to the administered questionnaires, with an overall return rate of 95%. All questionnaires from managers and caretakers were returned (100% response rate), while users recorded a slightly lower rate at 90%. This high response rate enhances the reliability and representativeness of the data collected, particularly in small sample studies [26]. The full

participation of facility managers and caretakers indicates a strong engagement with the study objectives, while the slight shortfall from users may reflect common challenges such as respondent availability or survey fatigue.

4.2 Responses from Managers

On the experience of managers, most of them had ever managed toilets before and so they have experience of managing toilets. Sixty percent of the managers responded yes to the question of ever managing other facilities in the past. Furthermore, 50% of public toilet managers in the Municipality have between three to six years of experience, suggesting a relatively knowledgeable workforce. Such experience is valuable for understanding routine maintenance, user behaviour, and effective facility oversight [16]. However, the absence of longer-term experience may limit institutional memory and innovation in management practices. Continuous training is essential to enhance both practical skills and customer service delivery [10].

The respondents were asked whether they frequently had problems in managing the facilities. It was revealed that the frequency at which problems occurred at most of the public toilets is very high and the sources of such problems were: Lack of punctuality by the caretakers to take care of the facilities, Difficulty in getting emptier vehicles when the need for dislodgement arises, Reluctance of the caretakers reporting problems that need urgent attention, misunderstanding between caretakers and beneficiaries and Beneficiaries defecating outside the toilet premises. With all the above problems it was realized that the most rampant ones were misunderstanding between beneficiaries and caretakers, and difficulty in getting emptier vehicles to attend to the facilities when the need for dislodgement arises.

Table 4.2: Satisfaction of managers with the attention given by local authority

SN	Satisfaction of managers with the attention	Frequency	Percentage %
1	Highly satisfied	2	20
2	Satisfied	6	60
3	Not satisfied	2	20

Source: Researchers field work (2023)

Table 4.2 reveals that 60% of managers were satisfied with the attention given by the local authority when issues arose, while 20% were highly satisfied and another 20% not satisfied at all. This suggests that while an overwhelming majority (80% of the respondents) of managers acknowledge some level of responsiveness from the Municipal Assembly, a notable minority still perceive gaps in support and engagement. Hence, effective collaboration between local authorities and facility managers is essential for sustainable sanitation management [9]. Also, there is the need for regular dialogue and feedback mechanisms which could further enhance satisfaction and improve service delivery [16].

When asked about the maintenance regime of the facilities, 80% of managers confirmed that maintenance activities are regularly carried out, though the strategies implemented are largely limited to routine upkeep rather than comprehensive repairs or facility upgrades. This indicates a basic level of operational commitment but also reflects underlying constraints such as limited funding, technical capacity, or support from local authorities [16]. Routine maintenance, while important, may be insufficient to prevent long-term deterioration. As [8] note, sustainable sanitation infrastructure requires periodic rehabilitation and investment in long-term structural improvements. Maintenance, according to [27] is the combination of all technical and associated actions intended to retain an item or restore it to a state (an acceptable standard) in which it can perform its required functions. This definition puts forth two broad categories of maintenance; preventive and corrective. 'Preventive maintenance' deals with 'retaining an item to', and it involves work carried out in anticipation of (or to prevent) failure, while 'corrective maintenance' covers 'restoring an item to', which entails work carried out after failure. Therefore, a more concerted effort is required through collaboration with local assemblies to keep these facilities in functioning states.

Table 4.3: The Rate of Dislodgement

Rate of Dislodgement	Frequency	Percentage %
Every two weeks	1	10
Monthly	1	10
When the need arises	8	80

Source: Researchers field work (2023)

Looking at the dislodgement aspect, it was observed that, regular dislodgement was not being done and this was attributed to the few numbers of emptier vehicles available and the large number of users of the facilities. From Table 4.3 above, most of the respondents admitted that dislodgements were done only when the need arises. On the part of caretakers reporting problems to the managers, the managers admitted that the caretakers always brought complains which range from poor lighting system, leakage of roof, dislodgement delays, defecation done on the squatting slabs and spillage of maggot on slab. According to the managers, the most re-curing problems reported to them by caretakers were those of dislodgement delays and defecation done on slabs. The frequency/rate of visits of the managers to the caretakers of the facilities were not encouraging, since it was done occasionally. This means that whenever the manager felt like doing the visitation he/she embarks on it but not on regular basis.

4.3 Responses from Caretakers

The first question about the gender of the caretakers was asked in order to establish the relationship between a female caretaker and her household chore which would demand her presence in the house at certain times of the day. But data showed that seventy percent were males and the remaining thirty percent were females. This further supports the un-written and un-documented assertion that, traditionally, women in the Region have been 'domesticated' and have thus been prevented from taking up white-collar jobs (or jobs that require them to be absent from home for long periods during the day). In the words of [19], Women benefited from migrants

from all works of life, a factor that also contributed to the selection of Wa as the capital of the Upper West Region. It is also worth noting that this phenomenon of male domination has not been affected much by the influx of migrants from other parts of the country, due to transfers, among other reasons.

The majority of caretakers had experience in managing toilet facilities and the number of years of running them ranged between one to two years. Also, with the number of years of running their assigned facilities it was revealed that majority was within the range of (1-4) years. This finding suggests that these caretakers have the experience in handling the facilities. The findings further reveal that 70% of respondents acknowledged the occurrence of misunderstandings between beneficiaries and caretakers of public toilet facilities. According to them, these tensions often arise due to issues such as delayed cleaning, dislodgement delays, or disputes over usage protocols. Misunderstandings can undermine the proper functioning of sanitation systems, especially when communication is poor or when roles and responsibilities are not clearly defined [10]. In response, caretakers have developed coping mechanisms, primarily resolving disputes personally or referring them to managers. While informal conflict resolution helps maintain order, the absence of formal grievance systems may leave some issues unaddressed. According to [17], effective facility management requires not only technical maintenance but also the ability to manage interpersonal relations within community spaces. Thus, training caretakers in conflict resolution and communication could strengthen facility governance and user trust.

When they were asked about what they do with the used papers, most of them commented that the used papers that were generated by the beneficiaries of the toilet were sometimes put in to the toilet pit which often makes it difficult for dislodgement. On the other hand, majority of the used papers were gathered and burnt by the caretakers, which raises environmental concerns. Another area of environmental concern was the issue of stench from the facilities. With regards to the stench from the toilet, the caretakers indicated that it was very bad though no toilet gives out good effluence but the magnified foul smell was attested to by most of them. The caretakers related that they often have to move away from the facility in order to catch good breath and as a result some people get access in to the building without paying. Also, in the view of the caretakers of public toilet facilities in the Wa Municipality, since there were not enough emptier vehicles to dislodge the toilet facilities, the pattern of dislodgement was irregular and was hazardous to the caretakers and beneficiaries as well. In the 21st century, half of the world's population is living in cities and sanitation and hygiene is still an unsolved problem, public toilets reemerged in fast city life to provide healthier environments [18]. Therefore, the environmental, sanitation and hygiene concerns raised about public toilets in the Municipality need to be tackled and addressed.

A question was asked in relation to the number of people who visited the toilet facility each day and it came to light that the patronage level was between 200 and more attendants. According to the caretakers, some of the problems that contributed to the lower level of patronage included the following: spillage of maggot on the squatting slabs, leakage of roof and the number of people in the community without toilets in their homes.

4.4 Responses from Beneficiaries

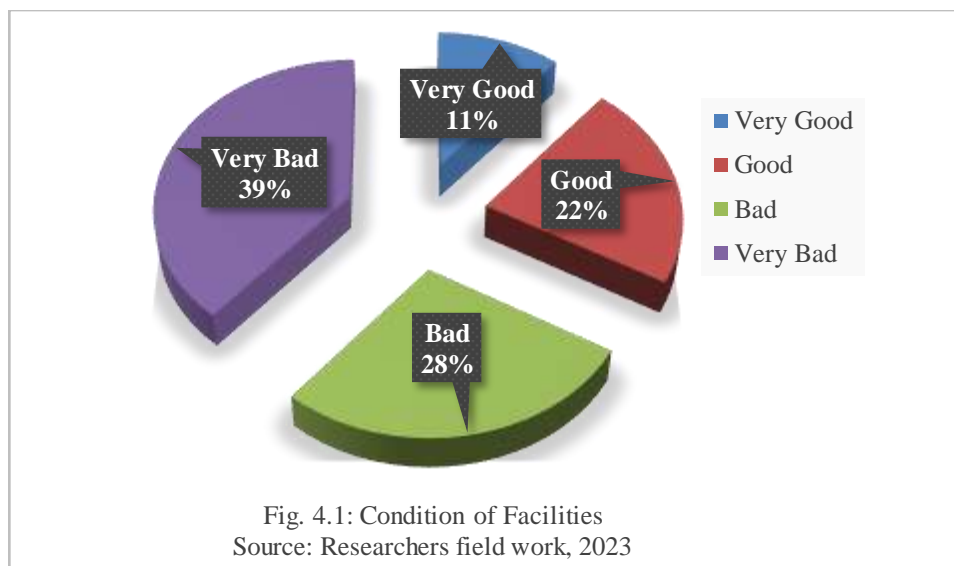
Table 4.4 shows that ten respondents, representing 56% percent admitted that they had toilet facilities in their homes but choose to use the public toilet. The reasons were that their own was in bad shape, was used up (full). There was also time wastage due to the number of the people in the house. A greater part of them uses the public toilet due to the ease of usage of it and others also use the public toilet when they were not in their homes. It was also found out that these users, although owned toilets, had used the public ones for a very long time and this went ahead to show the over-burdening of the facilities.

Table 4.4: Ownership of private toilet facilities by beneficiaries

Response	Frequency	Percentage %
Yes	10	56
No	8	44

Source: Researchers field work (2023)

Majority of all the users showed dislike to the present state/condition of the facilities. From Fig. 4.1, 67% of the respondents said that the conditions of the public toilet facilities in the Municipality were in a bad state (very bad, 39% and bad, 28% respectively). With this, users usually entertained the fear that there could be havoc (collapse or explosion) and therefore resorted to defecating out-side the premises when the caretakers were not around [1]. It was also noticed that with the varying size or shape of human beings, users' perception of the size of the squatting hole provided was a prudent question to ask. Majority of the users showed that the size of the squatting hole was adequate but attributed defecating on slabs to bad attitude of some of the users. Again, due to the poor lighting system in most of the buildings (as indicated by respondents), the users turned to defecate outside the premises since the inside was dark during the night.



Overall, 67% of respondents expressed satisfaction with the treatment they received from caretakers of public toilet facilities, while 33% reported dissatisfaction. This finding suggests that despite infrastructural and sanitation challenges often associated with public toilets, interpersonal relations between users and caretakers are generally positive. This resonates with other studies which found out that caretakers who are respectful, responsive, and attentive to user concerns can significantly influence user satisfaction and encourage proper use of facilities (Amoah et al., 2020). However, the 33% of users who felt dissatisfied highlight the fact that there is still room for improvement in service delivery. Poor communication, lack of empathy, or neglect of duties by some caretakers may contribute to negative experiences. These findings underscore the importance of training caretakers not only in hygiene and maintenance, but also in customer service to ensure inclusive, user-friendly sanitation services [17]. Lastly, all the respondents said that they would love to see caretakers available (at post) whenever they visited these places of convenience in the Municipality.

V. CONCLUSION

The study's findings have implications for public health management, as results of the study related to urban development, and waste management policy in the Wa Municipality and similar developing cities in Ghana. Funding for local government operations or tax breaks is needed for renovations and upgrades of public toilet facilities since the study shows that although there is some regular attention devoted, it is primarily minor fixes and cleaning, with a small percentage of long-range intentions accounting for renovations and upgrades of facilities.

The need to evaluate logistics for the number of emptier vehicles is critical. The finding concerning delayed dislodgement and non-existent or inappropriate treatment suggests that many emptier vehicles are needed to ensure that public toilets do not impede community use and become a severe health risk for users and other community residents. Additionally, the study implies that managerial oversight is minimal. Managers do not often visit their sites, and they manage multiple projects simultaneously, so there are issues that persist. By increasing manager accountability and ensuring cross-project check-in opportunities, supervisors could be engaged and mandated to go on-site to assess problems, and they might even have more appropriate responses when issues arise. Furthermore, the fact that all respondents love seeing caretakers suggests that social dynamics can increase the community's willingness to use such facilities. Workshops and annual training for caretakers on hygiene, communication, and rudimentary customer service would support this effort. The findings indicate that public toilets are not equitably located. There are more in commercial areas and none in strictly residential or peri-urban areas. This inequity causes open defecation and overuse of those that are available. Sanitation resources, as part of the infrastructure, need to be incorporated by planners to avoid such inequity.

This study determined how effective public places convenience were in the Wa Municipality. Based on the findings, very little is done effectively to manage the public places of convenience: they are maintained through cleaning, but quality assessments during observation show poor levels of infrastructure maintenance, continued access is poor (during the night). Also, public places of convenience (public toilets) are overused, poorly ventilated or positioned, which inspires their non-accessibility in Wa Municipality. Yet when it comes to usage and regardless of what facilities are present Wa residents were satisfied with public places of convenience, regarding their management and the abilities of caretakers to engage with the community, which shows that management is effective based on subsequent social interaction. However, there were still environmental issues relating to delay in dislodging and unpleasant smells/stench from these public places of convenience in the Wa Municipality, coupled with miscommunication between facility beneficiaries and management that hinder public places of convenience from being more effective or positively acknowledged. Therefore, to improve sanitation from a public health perspective, increased collaboration between the district assembly and the public toilet operators, increased access to funding for renovations, frequent assessments, and sanitation education from a grassroots level are required to ensure healthy, accessible, and appropriately maintained sanitation for the citizens of Wa Municipality.

VI. ACKNOWLEDGMENT

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