

**GENDER RESPONSIVE EMPOWERMENT
STRATEGY FOR SANITATION AND HYGIENE
(IUWASH)****Purwaningtyas Kartikaningrum¹, Isna Fitria Agustina^{2*}**^{1,2}Public Administration Study Program, Muhammadiyah University of Sidoarjo, Indonesia*Corresponding Author Email: isnaagustina@umsida.ac.id

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Abstract: General Background: Sanitation problems remain a challenge in many rural areas, including Larangan Village, Candi District, Sidoarjo Regency. **Specific Background:** High rates of open defecation (BABS) and minimal access to healthy latrines significantly impact public health and living standards in the village. **Knowledge Gap:** Despite various programs, strategies that specifically emphasize gender-responsive empowerment in sanitation and hygiene remain underexplored, particularly at the community level. **Aims:** This research aims to describe and analyze Gender Responsive Empowerment Strategies for Sanitation and Hygiene (IUWASH) implemented in Larangan Village. **Results:** The research shows that the village government collaborates with USAID to build communal septic tanks and conduct health outreach programs. Residents of Larangan Village actively participate in the IUWASH program through data collection and receiving education on healthy latrines. Additionally, routine inspections are conducted annually by USAID and semi-annually by the village government to ensure sustainability. **Novelty:** The study highlights the role of community involvement, particularly gender-responsive approaches, in improving sanitation facilities and promoting clean living practices. **Implications:** The installation of communal septic tanks and ongoing education initiatives successfully increase community awareness and participation, contributing to improved public health and overall welfare in Larangan Village.

Keywords: Strategy, Village government, Sanitation, Hygien

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Introduction

The sanitation management system is an important element to meet the needs of clean water, proper toilets, and good hygiene and sanitation for the community [1]. Sanitary hygiene is a strategy to reduce or eliminate factors that cause contamination of drinking water and the facilities used for the treatment, storage, and distribution of drinking water. The requirements for sanitary hygiene in drinking water management include raw water, location/building, equipment, production processes, maintenance, sanitation programs, employees, and storage [2]. The clean water and sanitation provision program also aims to address the rights of women and girls. The system certainly involves the active participation of the community in the planning, management, and maintenance of water resources and sanitation facilities [3]. The increasing participation of the community greatly determines the success and sustainability of the clean water and sanitation management system [4].

Poor sanitation can also have a negative impact on women and girls [5]. There are many reasons why sanitation is a priority issue for women and girls, beyond its health impacts [6]. First, the lack of access to proper sanitation facilities can cause women and girls to be confined to their homes during the day. Second, in many cultures, women and girls often only have time to defecate after dark or at night if they do not have access to latrines. This can increase the risk of disease, harassment, and assault. Third, the lack of safe and separate sanitation facilities in schools can cause girls to miss school, especially during menstruation. Fourth, taking care of children who are sick due to poor sanitation adds to the workload of women. Lastly, the availability of proper drinking water and sanitation facilities can help protect pregnant women from diseases and make it easier for them to maintain their health during pregnancy [7].

Women play an important role in sanitation hygiene issues to improve access to adequate and gender-responsive sanitation. Women play the role of users, providers, and managers of water in households, as well as caretakers of family health. Moreover, women have a higher motivation to maintain clean water facilities compared to men. This is because men spend more time just fetching clean water. Women are also the group most vulnerable to negative impacts if access to clean water and sanitation is not managed well, fairly, and equitably.

In Indonesia, there are gender-responsive regulations in the development of sanitation infrastructure. The Ministry of Public Works and Public Housing (PUPR) has issued various gender-responsive regulations, including guidelines for the implementation of community-based sanitation programs (SANIMAS), community-based drinking water and sanitation management (PAMSIMAS), and the slum-free city program (KOTAKU), which involve the active role of women. This is part of the effort to ensure that the development of sanitation infrastructure is accessible and responsive to gender needs. In addition, there are also other gender-responsive regulations in infrastructure development [8]. The Indonesian government has instructed village governments to innovate and build sanitation as a response to sanitation issues affecting women and children. This step is in line with efforts to increase community participation in community-based sanitation programs [9], which involve the community in the planning, construction, and management of sanitation facilities. Active community participation, including women and girls, is expected to improve access to and use of healthy latrines, handwashing with soap, and strengthen efforts to promote a clean and healthy lifestyle. In addition, there is also the Minister of Home Affairs Regulation Number 87 of 2022 concerning the acceleration of sustainable sanitation services. This reflects the government's commitment to ensuring that the development of sanitation infrastructure is accessible and responsive to gender needs.

In the Minister of Health Regulation Number 3 of 2014, it is stated that total community-based sanitation (STBM) is community empowerment as a strategy to address hygiene and sanitation behavior problems. The Minister of Health Regulation Number 3 of 2014 also outlines the standards and health requirements for toilet buildings, covering several aspects, including: first, the structure above the toilet (walls and/or roof). The structure above the toilet must function to protect users from weather disturbances and other disruptions. This building must be made of strong materials, have adequate lighting and ventilation, and doors that can be opened and closed easily. Second, the central toilet building This section consists of two parts, namely the hole for disposing of waste (feces and urine) which is sanitary and equipped with a goose neck construction. In a simple (semi-sanitary) construction, the hole can be made without a goose neck construction, but it must be covered. The toilet floor must be made of waterproof material, non-slip, and have a drainage system for wastewater disposal to the Wastewater Disposal System (SPAL). Third, this Substructure Building functions as a facility for the collection, processing, and decomposition of

feces, preventing direct or indirect pollution or contamination from feces. There are two types of toilet substructures, namely septic tanks and cubluks. A healthy latrine that meets these standards is effective in breaking the chain of disease transmission, so it is important to understand how to create a healthy latrine [10]. Most of the population in East Java, amounting to 84.9 percent, have access to sanitation facilities. STBM Monitoring and Evaluation data from the Ministry of Health shows that the majority of households, 70.25 percent, have been using permanent healthy latrines. Six out of 38 regencies/cities in East Java Province have declared themselves Free from Open Defecation, namely Madiun, Pacitan, Magetan, Ngawi, Lamongan, and Pamekasan [11].

The theory chosen by the researcher, as proposed by Nugroho (164), includes: a. Access, which means that the community has equal rights to access productive resources within the environment. b. Participation, which means that the community participates in utilizing limited assets or resources. c. Control, which means there is fair and equal control over resources. d. Benefits, which means the community receives and enjoys the results from the utilization of resources or joint development [12].

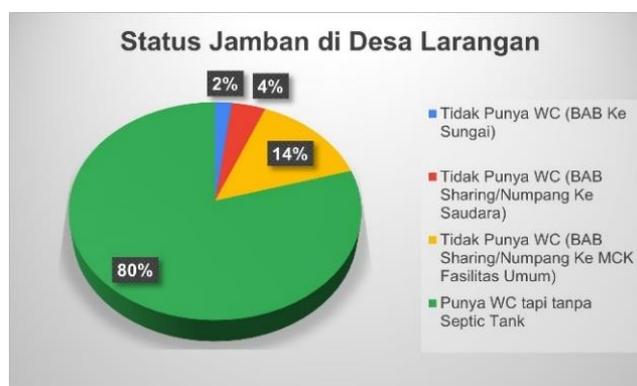
Sidoarjo Regency is one of the regencies in Indonesia selected as a Role Model for the Implementation of the District/City Sanitation Strategy. Based on the 2022 City Sanitation Strategy (SSK) document, the coverage of sanitation access still reaches 98.9 percent. Therefore, to achieve 100 percent adequate access, there is still a gap of 1.1 percent. Sidoarjo has also experienced issues with residential sanitation. This can be seen from the still low quality and level of sanitation services, especially in the domestic wastewater sector. The low awareness and involvement of the community in sanitation management, as well as the lack of coordination among stakeholders at the central, provincial, district, and village levels. Furthermore, the integration of planning and development programs is not yet organized, and there is a lack of interest from the business world to invest in the domestic wastewater sector, due to economic and financial considerations. Based on the SSK (City Sanitation Strategy) 2022 document, the coverage of sanitation access still reaches 98.9 percent. Therefore, to achieve 100 percent adequate access, there is still a gap of 1.1 percent. However, the Sidoarjo Regency Government has responded positively to the domestic wastewater program by including it in the Sidoarjo Regency Medium-Term Regional Development Plan (RPJMD). Additionally, the Sidoarjo Regency Government has also invited village governments to include the domestic wastewater management program in the Village Government Work Plan (RKPDes) as an effort to improve access to adequate and gender-responsive sanitation.

One of the programs regulated in Decree Number 050/297/438.6.1/2022 by the Regional Development Planning Agency of the Sidoarjo Regency Government is the recommendation for the location of assistance facilities related to safe sanitation access and safe drinking water in Larangan Village, Candi District. This recommendation is provided by USAID IUWASH Tangguh as a result of collaboration between the local government and USAID IUWASH Tangguh. This collaboration enables synergy between the expertise and resources of both parties to improve community access to safe sanitation and potable drinking water in Larangan Village. With this collaboration, it is hoped that the program can run more effectively and provide a significant positive impact for the local community. Programs like this are important to improve community access to proper sanitation facilities, which can contribute to changing family behavior regarding the use of healthy latrines.

Empowerment is an effort to enhance the community's ability to better meet their needs and to be more involved in the decision-making process on par with others. Empowerment builds the spirit of independence and creativity to develop with one's own strength, not relying on

assistance and orders from above like in centralistic policies. One of the things that cannot be separated from community life, both in urban and rural areas, is the issue of poor sanitation. Community empowerment is an important strategy in improving the quality of environmental sanitation. The empowerment that has been implemented in the Larangan village involves the participation of the Village Community Empowerment Institution (LPMD), which also takes part in meetings to ensure a focus on health and environmental cleanliness. This empowerment aims to build awareness and community participation in maintaining sanitation and hygiene for the sake of public health.

Several studies indicate that the sanitation program in Indonesia is still not optimal. Research conducted by Aditya et al. (2022) revealed that the achievements of the sanitation program focused on the first pillar, namely stopping open defecation (ODF), have not yet been optimal. Aspects that influence the achievement of sanitation programs include community participation, community commitment, environmental conditions, the role of the government, involved agents, and local regulations [13]. Next, Ganus's research also shows that sanitation programs in Indonesia are still not optimal in terms of cooperation among stakeholders [14]. A similar point was made by the study of Ilmi and Badrudin, which explained that not all communities can adopt ODF behavior due to several factors hindering the sanitation program [15, 16].



Source: processed primary data, 2024

Figure 1. Latrine Status in Larangan Village

Figure 1 presents the status of latrines in Larangan Village, Candi District, Sidoarjo Regency. The status of latrines in this study varies, including not having a toilet (defecating in the river) at 2 percent, not having a toilet (sharing/borrowing from relatives) at 4 percent, not having a toilet (sharing/borrowing from public facilities) at 14 percent, and having a toilet but without a septic tank at 80 percent. The most common latrine status is "having a toilet but without a septic tank" at 80 percent, while the smallest percentage is "not having a toilet (defecating in the river)" at 2 percent. However, in reality, there is a village in Sidoarjo Regency, namely Larangan Village, which has a high level of Open Defecation Free (ODF) and a high rate of open defecation habits. In addition, the residents of Larangan Village who live along the riverbank currently almost all lack adequate sewage disposal systems. As a result, their waste is dumped directly into the river, even though most of them actually have toilets in their homes. Based on the issues encountered by the researcher, the objective of this study is to analyze and explain the Gender-Responsive Integrated Water, Sanitation, and Hygiene (IUWASH) Strategy through the Work Plan of the Larangan Village Government, Candi District, Sidoarjo Regency.

Methods

This research uses a qualitative research method with a descriptive approach. The qualitative approach is a research method used to study objects in their natural conditions, with data analysis being inductive, and the results of qualitative research place more emphasis on meaning in generalization [17]. This research was conducted in Larangan Village, Candi District, Sidoarjo Regency. The reason for having that location is, first: Desa Larangan was chosen as a pilot project for the sanitation and hygiene program (IUWASH). Second, Desa Larangan has implemented an effective sanitation program in accordance with the Village Government Work Plan (RKPDesa), particularly by successfully providing communal septic tanks for its residents. This qualitative research uses purposive sampling technique. The type of data comes from primary and secondary data and uses in-depth interviews, observations, and documentation as data collection techniques. Observations are conducted directly to ensure the validity of the obtained data, while interviews are conducted with structured questions that align with the problem formulation. Documentation is used to collect data related to gender-responsive sanitation program strategies.

The informants of this research include Agus Siswanto, S.P (Village Head), Ir. Anwari (Social Welfare Officer), Mia Tri Handani (Health Cadre), as well as Mahkulin and Senasih. (Warga Desa). The data analysis model used by the researcher is the interactive Miles, Huberman, and Saldana (2014). According to Miles, Huberman, and Saldana, the Miles Huberman analysis includes data collection, data reduction, data presentation, and conclusion drawing. Data collection is information that helps researchers draw conclusions and take action. Data reduction is the process of selecting, focusing, and simplifying information to support research data. Data presentation involves organizing information to draw conclusions in qualitative research. Drawing conclusions is the final process and is derived from data that has been analyzed and data that has been verified based on evidence obtained at the research location [18].

Results and Discussion

A. Gender-Responsive Sanitation Access in Larangan Village: Improving Women's Health and Well-being

Larangan Village, located in Candi District, Sidoarjo Regency, East Java Province, covers an area of approximately 82.24 hectares and is one of the 24 villages in the district. This village borders Sidokare Village and Celep Village to the north, Bligo Village and Tenggulunan Village to the south, as well as Tenggulunan Village to the west and Bligo Village to the east. The coordinates of Larangan Village are -7.470559, 112.715491. With a population of 6,009 people consisting of 2,967 men and 3,042 women, this village has 1,819 households. The percentage of poor families in this village reaches 14%, and there are 4 people with disabilities.

Desa Larangan has 9 Neighborhood Associations (RW) and 47 Community Units (RT), which indicates a well-organized social structure. Analysis of this data shows that Larangan Village has significant potential in the development of social and sanitation programs, especially considering the relatively large population and organized community structure. The high percentage of poor families and the number of people with disabilities also indicate the need for special attention in development planning. In addition, the presence of 9 neighborhood units (RW) and 47 community units (RT) can be utilized to enhance community participation in gender-responsive and sanitation programs, thereby improving the overall health and well-being of the community.

Table 1. Number of Houses Without Access to Sanitary Latrines in Larangan Village

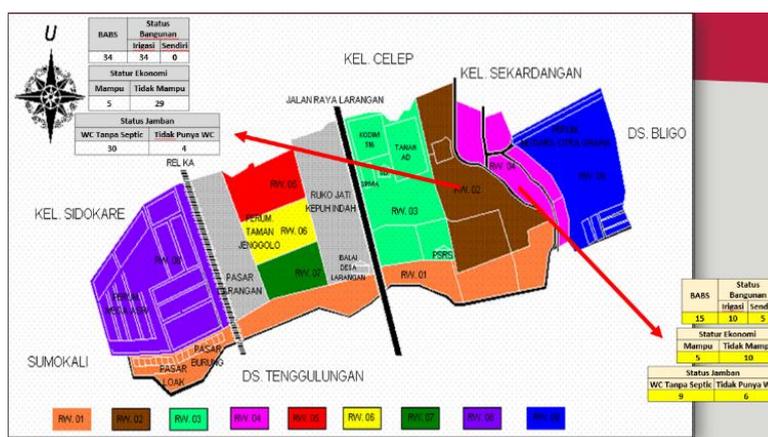
No	RT/RW	The number of people who do not have access to proper sanitation facilities
1	01/01	19 house
2	02/01	6 house
3	03/01	-
4	04/02	13 house
5	05/02	13 house
6	08/02	23 house
7	14/04	20 house
8	15/04	3 house

Source: Larangan Village, 2024

Based on Table 1 of Larangan Village in 2024, there are several RT/RW that still have houses without proper sanitation facilities. RT/RW 01/01 has 19 houses without proper sanitation facilities, RT/RW 02/01 has 6 houses without proper sanitation facilities, RT/RW 04/02 has 13 houses without proper sanitation facilities, RT/RW 05/02 also has 13 houses without proper sanitation facilities, RT/RW 08/02 has 23 houses without proper sanitation facilities, RT/RW 14/04 has 20 houses without proper sanitation facilities, and RT/RW 15/04 has 3 houses without proper sanitation facilities.

Desa Larangan has a fairly balanced demographic structure, with a significant proportion of young and early working-age groups. This indicates the presence of a large labor potential, which can contribute to village development. However, the high number of children and adolescents also requires attention in terms of education and health, to ensure they have adequate access to the necessary services.

The population of Desa Larangan under 15 years old is 868, while the population aged 15-24 years is 1,014. The population aged 25-34 years is 964, and the population aged 35-44 years is 864. Additionally, the population aged 45-54 years is 934, the population aged 55-64 years is 812, and the population aged 65 years and above is 553. Desa Larangan has a relatively balanced population distribution with several significant age groups. The age groups of 15-24 years and 25-34 years play an important role in the village population because they are part of the productive generation that can contribute to the development and economic growth of the village. Meanwhile, the age groups under 15 years and over 65 years play an important role in the social and economic development of the village because they are part of the generation that will determine the future of the village. Therefore, it is necessary to implement a development strategy that focuses on education, health, and community empowerment to improve the quality of life of the residents in Larangan Village.



Source: Processed Primary Data, 2024

Figure 2. Status of the Larangan Village Latrine

Sanitation inadequacy, particularly related to the lack of access to healthy latrines, can have a negative impact on society in the long term. The overall sanitation quality in Larangan Village is classified as low, which is reflected in the minimal level of sanitation services. Several factors contributing to this condition include the lack of knowledge and awareness among residents regarding the importance of access to safe sanitation. Many residents still use the closed Open Defecation System (ODS), especially those living in residential areas near rivers. For residents with sufficient financial means and land, they continue to use the closed ODS. This shows that sanitation issues are not only related to knowledge and awareness but are also influenced by economic factors, land limitations, and the lack of regulations and law enforcement related to sanitation management.

Furthermore, the residents of Larangan Village tend to feel that there is no need to use toilet suction services as long as there are no issues with their septic tanks. They believe that the existing septic tank is functioning well, both technically and physically. In addition, the lack of information regarding the Technical Implementation Unit (UPT) for Domestic Wastewater Management (PALD) also poses a challenge in improving sanitation quality. Lastly, there is an urgent need. Based on the image, the condition of the latrines is the main problem in Larangan Village.

for physical assistance and infrastructure related to sanitation, such as the construction of latrines, shared septic tanks, and communal Wastewater Treatment Plants (WWTPs). These efforts are very important to improve the sanitation conditions in the village and support public health as a whole.

The Sanitation and Hygiene Program (IUWASH) in Larangan Village is motivated by the condition of the community living along the riverbanks and lacking septic tanks. Previously, the environment around the river was very dirty, and defecating in public places often occurred. Health cadres highlight the importance of having a healthy latrine and a good waste disposal system, which previously flowed directly into the river. The high rate of open defecation free (ODF) is one of the fundamental reasons for implementing this program. Supported by the testimony of Mia Tri Handani, as a health cadre:

"Previously, the environment around the river was very dirty, and defecating in public places often occurred." We strongly emphasize the importance of having healthy latrines and a good waste disposal system, because previously all waste flowed directly into the river. The high ODF rate is one of the fundamental reasons for implementing this program. "We, as health cadres, want to ensure that every village resident has access to proper sanitation and a clean environment."

(July 19, 2024)

Senasih, a representative of the riverside residents, highlighted the concerning environmental conditions.

"Here, many residents still defecate in the open, and the environmental conditions have become very dirty." (July 19, 2024)

Health cadre, Mia Tri Handani, emphasized the importance of having healthy latrines and a good waste disposal system. Previously, waste flowed directly into the river, which contributed to the high open defecation free (ODF) rate in the village. This shows that the sanitation problem in Larangan Village is not only related to infrastructure but also to the behavior of the community that needs to be changed. Senasih, a representative of the residents, emphasized that the environmental conditions are very concerning, with many residents still defecating in public places. This indicates a gap between knowledge of good sanitation and the practices carried out by the community.

Here are the results of the interview with Mia Tri Handani, a health cadre who describes the sanitation conditions in Larangan Village. He stated that many villagers do not have proper latrines.

"Many villagers still do not have proper latrines." The availability of clean water is very important, and we need to ensure there is no open defecation and keep the rivers clean. "Access to safe drinking water must also be considered." (July 19, 2024)

Agus Siswanto, the Village Head, explained the steps taken to address this issue.

"We have implemented a communal septic tank program to tackle stunting in the village, in accordance with the Village Budget. We also received support from USAID WASH in promoting the use of communal septic tanks. The village government strives to empower the community by involving USAID to build septic tanks for the welfare of the residents through socialization and education related to health and maintaining environmental quality." (19 Juli 2024)

Agus Siswanto, Kepala Desa, menjelaskan bahwa program pembuatan septic tank komunal dilaksanakan sebagai upaya untuk mengatasi masalah stunting di desa. Dalam rapat awal dengan Badan Permusyawaratan Desa (BPD) dan musyawarah desa. Program ini juga didukung oleh USAID WASH dalam sosialisasi mengenai penggunaan septic tank komunal. Pelaksanaan program ini juga sudah sesuai dengan yang tertuang dalam Anggaran Pendapatan dan Belanja Desa (APBDesa).

The village government is trying to empower the community by involving USAID in building septic tanks. This shows that the village government is committed to improving the welfare of the residents. This program not only focuses on the physical construction of septic tanks but also involves socialization and education related to health and maintaining environmental quality. This education is very important to raise public awareness about the importance of maintaining sanitation and the environment. This program not only focuses on the physical construction of septic tanks but also involves socialization and education related to health and maintaining environmental quality. This education is very important to raise public awareness about the importance of maintaining sanitation and the environment.

The sanitation program in Larangan Village reflects a collaborative effort between the village government and the community to improve the quality of life. With the implementation of the communal septic tank program, it is hoped that health issues caused by poor sanitation can be reduced. The dirty environmental conditions and the practice of open defecation are the main challenges that must be addressed. Public awareness of the importance of access to proper

sanitation needs to be increased through education and socialization. The implementation of this program, in line with the government's work plan, demonstrates a commitment to achieving better sanitation targets. However, challenges such as inadequate infrastructure and low public awareness need to be addressed so that this program can run effectively and sustainably.

The construction of communal septic tanks to improve sanitation conditions and support public health. Health cadres emphasize the importance of having healthy latrines and a good waste disposal system, so education and socialization about access to proper sanitation need to be enhanced through gender-responsive programs. Thus, the discussion on gender-responsive sanitation access in Larangan Village is appropriate to provide the community with equal rights in accessing productive resources in the environment, granting the right to obtain proper sanitation. This is in line with the research by Noviati and Sitti Marya Ulva, which emphasizes the importance of education and socialization about access to proper sanitation through gender-responsive programs to improve sanitation conditions and support public health [19]. In addition, the communal septic tank system that can serve the surrounding residents with sufficient capacity to improve sanitation conditions and support public health [20]. The communal septic tank that can be utilized by two to three households to enhance sanitation quality and support public health [21]. In the awareness and understanding of the community about the importance of healthy latrines and good waste disposal systems through gender-responsive programs [22].

B. The Importance of Participation for Change

The Larangan Village Government has built latrines and their drainage systems with the aim of improving the community's access to adequate sanitation. However, the implementation of this program did not go well to achieve the expected goals. Although this program successfully reaches the poor, there are still challenges to be faced. One of the main obstacles is that the toilets built with subsidies have not fully changed the community's behavior in using the existing facilities. To address this issue, active community participation is essential. Community involvement at every stage of the program, from planning to implementation, can enhance the sense of ownership and responsibility towards sanitation facilities.

This sanitation and hygiene program (I UWASH) shows that success in improving sanitation does not only depend on physical infrastructure but also on changing community behavior. With the presence of education and outreach involving the community, it is hoped that they will become more aware of the importance of using healthy latrines and maintaining environmental cleanliness. In addition, community participation in the maintenance and management of sanitation facilities is also important to ensure the sustainability of the program. The community must be involved in the process of monitoring and enforcing rules related to toilet use, so as to create a better sanitation culture and reduce the habit of open defecation. Thus, community participation becomes key to achieving better sanitation goals in Larangan Village.

Mia Tri Handani, as a health cadre, revealed that one septic tank is planned for four households, especially for those living along the riverbanks who do not yet have access to adequate sanitation facilities. This reflects an inclusive approach, where the needs of the target group are identified and accommodated.

This program has been very well received. The residents support the government because the programs provided are very good. At first, the unpleasant smell was very disturbing, but now it has started to decrease. One septic tank for four households, especially on the riverbank where there are no septic tanks." (July 19, 2024)

Mahkulin, a village resident, also added.

"We feel that this program is very helpful and open to the village's progress." The

obstacles is the low public awareness regarding the importance of using healthy latrines. This is often caused by a lack of knowledge about healthy lifestyles and the negative impact of open defecation on individual and environmental health. Research shows that there is a significant relationship between community knowledge and their sanitation behavior, where communities with a good understanding tend to adhere more to the expected sanitation norms. To improve the effectiveness of the sanitation program, better control is needed through several strategies.

First, intensive education and socialization, as well as public education about the importance of good sanitation, must be carried out continuously. Second, social support from various parties, including health officers and community organizations, is very important to encourage the community to be more active in maintaining cleanliness and using the provided sanitation facilities. Third, community empowerment in the management and maintenance of sanitation facilities must also be strengthened.

Mia Tri Handani, a health cadre, explained the implementation of the sanitation and hygiene program (IUWASH) socialization in Larangan Village. Here is Mia Tri Handani's account:

"The supervision stage was carried out by involving the neighborhood association (RW) and residents, where the socialization was conducted directly." We also formed a team to ensure that the community understands the importance of good sanitation. One of the challenges we face is collecting data on who does not yet have a proper latrine, while also conducting socialization about the construction of communal septic tanks. (19 July 2024)

Agus Siswanto, the Village Head, added:

"The monitoring program is conducted through socialization meetings to ensure smooth implementation." We introduced a savings book to facilitate management and use a WhatsApp group to maintain communication. This is very helpful in coordination, especially during the disbursement of funds through SISKUEDES. We have also installed educational banners about the importance of clean sanitation, although we face challenges such as limited land and the need to register residents who do not have latrines. The USAID party conducts an annual audit, while the village government conducts a semi-annual audit. (19 July 2024)

Based on the interview results above, it can be concluded that USAID controls once a year, while the village government controls every six months. The control conducted by USAID and the village government regularly ensures that the program runs as planned. By involving the community in the decision-making process and program implementation, they will feel ownership and responsibility for the sustainability of sanitation facilities. This can help change community behavior and reduce the open defecation rate in Larangan Village. Thus, effective control in the sanitation program in Larangan Village does not only rely on physical development but also on increasing knowledge, awareness, and community participation. Collaborative efforts between the government, the community, and other related parties are crucial to achieving better sanitation goals and improving the quality of life for the community. The sanitation and hygiene program in Larangan Village involves collaboration among various parties to raise awareness and understanding of the importance of good sanitation facilities. Supervision involving citizens and the use of communication technology such as WhatsApp groups play an important role in the coordination and implementation of sanitation and hygiene programs.

The actors involved in the implementation of the sanitation and hygiene program (IUWASH) in Larangan Village include the Village Government, Village Consultative Body (BPD), Neighborhood Association (RW), Community Association (RT), community leaders, and private entities such as USAID IUWASH.

Mia Tri Handani, a health cadre, explained the actors involved in the sanitation and hygiene program (IUWASH) in Larangan Village. Here is the account from Mia Tri Handani.

In this program, many actors are involved, such as the Village Government, BPD, RW, RT, community leaders, and private parties. All parties have an important role in the socialization and implementation of the program." (July 19, 2024)

The Village Government acts as the director and manager of the program, ensuring that the necessary policies and regulations to support sanitation and hygiene are implemented. BPD functions as a liaison between the community and the government, providing input and overseeing the implementation of programs. RW and RT play a role in socializing with residents, ensuring active community participation in this program. Community leaders serve as motivators and drivers, encouraging residents to participate in sanitation activities. External parties, such as USAID IUWASH Tangguh, provide technical support and resources to improve access and raise public awareness about the importance of sanitation and hygiene. The stages of supervision by the Larangan Village Government in socializing this program involve collaboration among all actors. The Village Government, together with the Village Consultative Body (BPD), Neighborhood Associations (RW), and Neighborhood Units (RT), conducted direct socialization to the residents. For example, the neighborhood association holds meetings at the community level, where residents are invited to attend and receive information related to the sanitation program. In addition, the Village Community Empowerment Institute (LPMD) or the Village Community Institution (LKD) is also involved in meetings to ensure a focus on health and environmental cleanliness. This process aims to build awareness and community participation in maintaining sanitation and hygiene for the sake of public health. Thus, effective control in the sanitation program in Larangan Village does not only rely on physical development but also on increasing knowledge, awareness, and community participation. Desa Larangan has had fair and equal control over resources. Zakiyatul et al.'s research shows that community participation not only plays a role in the implementation of activities but also in the evaluation and monitoring of programs. The community also plays a role in planning, implementing, and evaluating health programs [25].

D. Benefits of the Sanitation Program in Larangan Village

The sanitation program being implemented aims to improve community access to adequate sanitation facilities, which in turn can reduce the risk of waterborne and waste-related diseases. With adequate sanitation facilities, the community can maintain personal and environmental hygiene, which is crucial for preventing the spread of diseases. One of the main benefits of this program is the increased public awareness of the importance of good sanitation. Through education and campaigns conducted alongside infrastructure development, the community has become more aware of the negative impacts of open defecation (BABS) and the importance of using healthy latrines. Here is the table of the Realization of Communal Septic Tanks in Larangan Village.

Table 2. Realization of Communal Septic Tanks in Larangan Village

No	Year	Number of Points	Number of Houses	RT
1	2022	1	4	14
2	2023 (Tahap I)	10	40	14,13,08,15,05
3	2023 (Tahap II)	5	19	04,02,01
4	2024	4	12	01, 10

Source: Processed Primary Data, 2024

Based on Table 2, it shows that the community has benefited from the installation of communal septic tanks at several points. In 2022, a communal septic tank was installed in Desa Larangan for 4 houses in RT 14. In 2023, the first phase saw the construction of 10 communal septic tanks for 40 houses in RT 14, 13, 08, 15, and 05 in Desa Larangan. In 2023, the second phase saw the construction of 5 communal septic tanks for 19 houses in RT 04, 02, and 01 in Desa Larangan. In 2024, 4 communal septic tanks were built for 12 houses in RT 01 and 10 in Desa Larangan. Thus, the installation of communal septic tanks continues to increase and provides significant benefits to the community in Desa Larangan. With the construction of communal septic tanks, it is hoped that community awareness of clean living will grow. Here are the pictures of the construction of the communal septic tank in Larangan Village.



Source: Processed Primary Data, 2024

Figure 4. Construction of a Communal Septic Tank in Larangan Village

Based on the picture above, it can be seen that the septic tank construction in Larangan Village. The existence of this development can also encourage more positive behavioral changes, so that the community becomes more disciplined in maintaining the cleanliness and health of their environment. In addition, sanitation programs also provide economic benefits. With good sanitation facilities, the community can reduce expenses for treating diseases caused by poor sanitation. Better health also contributes to the productivity of society, thereby increasing their income. However, to maximize the benefits of the sanitation program, continuous monitoring and evaluation are necessary. The collection of accurate data regarding the use and condition of sanitation facilities is very important for planning appropriate interventions.

By understanding the needs and challenges faced by the community, the government can

formulate policies that are more effective and responsive to local needs. Overall, the sanitation program in Larangan Village not only focuses on physical development but also on improving the quality of life of the community through education, behavioral change, and economic empowerment. Thus, the benefits obtained from this program are very extensive and impact various aspects of community life.

Mahkulin (community representative), the success of the program in maintaining environmental cleanliness.

"Alhamdulillah, the benefits are very good, and there are almost no obstacles." This program really helps us in maintaining environmental cleanliness. (19 July 2024)

Senasih (a representative of the residents) shared a personal experience that demonstrated real changes in the surrounding environment, particularly regarding river cleanliness.

"I personally feel the great benefits, especially because I live on the riverbank." Now, the river is cleaner and more pleasant to look at. (19 July 2024)

Mia (Health Cadre) also emphasized the importance of the program in raising public awareness about safe sanitation.

"This program is very helpful in increasing public understanding of the importance of cleanliness for the common good and the environment." The benefits are very significant, our river has become clean. (19 July 2024)

Ir. Anwari (Head of Social Welfare) added that the residents' enthusiasm is very high and there is hope to expand the program's reach.

"The benefits are numerous. The residents are very enthusiastic, and we hope that in the future we can reach more areas that have not yet received sanitation." (19 Juli 2024)

It can be concluded that the sanitation and hygiene program (IUWASH) has had a significantly positive impact on the community. The community obtains and enjoys the benefits from the utilization of resources or joint development. This program not only improves environmental cleanliness, especially rivers, but also raises public awareness about the importance of maintaining cleanliness. The enthusiasm of the residents to expand the program to other areas shows that they are aware of its benefits and are committed to maintaining a cleaner and healthier environment. Ramadhan et al. also stated that the IUWASH program is effective in improving water and sanitation services in Indonesia [26]. The sanitation and hygiene program provides benefits for maintaining public cleanliness and health, as well as improving overall quality of life [27].

Conclusion

Fundamental Finding : The IUWASH program in Desa Larangan, Candi, Sidoarjo has successfully improved access to proper sanitation through community awareness and infrastructure development, such as household latrines. Active participation, particularly by women and girls, played a vital role in planning, managing, and maintaining sanitation facilities. **Implication :** The program highlights the importance of equitable access, participation, and control of resources to achieve lasting behavior changes. Health improvements, especially for vulnerable groups like women and girls, demonstrate the significance of combining infrastructure efforts with education and socialization to change habits such as open defecation. **Limitation :** Despite progress, challenges persist, including low awareness levels, limited land availability, and inadequate infrastructure in some areas. These barriers hinder the complete elimination of unsafe sanitation practices, particularly for communities near riverbanks. **Future Research :** Future studies should explore sustainable approaches to overcome community awareness gaps and infrastructure

constraints. Additionally, examining innovative technologies for sanitation in limited-space areas and strategies to foster long-term community ownership and maintenance of facilities would enhance program sustainability and effectiveness.

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