WASH Sector

Rapid Needs Assessment Report

Khatlon Floods, 2021

Led By: UNICEF
Supported by: WB, RWSSP-PMU, RCST and GNT

May 20-27, 2021

List of Acronyms

Abbreviation	Detail
FGD	Focus Group Discussion
HHI	Household Interview
KII	Key Informant Interview
WASH	Water, Sanitation and Hygiene
CoES	Committee of Emergency Situations
SUE KMK	State Unitary Enterprise - Khujagi Manzili Komunnali
SES Department	Sanitary Epidemiological Safety, Emergencies and Emergency Medical Aid Department
MHM	Menstrual Hygiene Management
NFIs	Non-Food Items
WB	World Bank
GNT	Good Neighbors Tajikistan
RWSSP-PMU	Rural Water supply and Sanitation Project – Project Management Unit
UNICEF	United Nations Children's Fund

Contents

KEY FINDING - SNAPSHOT

Households (Camp and off-camp setting)

1. 44% of the assessed population is using water provided through water trucking while 28% still have access to functional public water collection points. The remaining 28% are consuming water from a number of other sources.
2. 21% of the flood affected respondents reported that they had to walk for more than 30 minutes to 1 hour (return trip) to reach the nearest drinking water source/collection point and fetch water while 24.6% reported that it takes them about two hours or more to do the same. Around 42% reported that it takes them under 30 minutes to fetch water. However, they do not have access to it within the premises. Only 7% reported having access to water within premise of their houses. It is alarming to see that 58% of the assessed respondents expressed dissatisfaction in terms of access to water.
3. 76% of the respondents reported that the key issue was lack of water storage jointly at HH and communal level. 36% of the respondents mentioned having no water storage available at HH level.
4. 71% of respondents expressed that the current quantity available is not sufficient based on their requirement.
5. 50% of the assessed respondents may be at a risk in terms of consuming water with contamination for potable purposes. 44% rely on water trucking which could not be considered a safe source unless quality is properly monitored.
6. 20% of people do not treat water before use and 42% treat at times which also shows a high probability of not treating it before use.
7. 29% of the respondents reported to have no access to latrines.
8. 84% of the respondents shared that the toilets accessible to population are not easily accessible for people with disabilities.
9. 81% of HHs interviewed use unimproved excreta disposal mechanisms.
10. Approx. 68% of HHs reported that they have to share sanitation facilities post flooding.
11. 45% of the respondents reported not having access to a functional handwashing facility.
12. 10% of respondents had experienced diarrhea in the last 2 weeks.
13. 54% of HHs (women) expressed lack of access to MHM products.

Schools:

1. 56% schools have no water source available while 22% were using water trucking. 56% of these schools do not have the available treatment mechanism to improve the quality of this water.
2. 46% schools have pit latrines without a concrete slab or stable platform. This is considered unimproved.
3. 66% of the latrines in schools are not accessible for children with disabilities.
4. 67% of the affected schools do not have any dedicated handwashing facility for students to regularly wash hand complying with IPC protocols.

1. INTRODUCTION

The torrential rains of 7 – 12 May 2021 triggered floods, landslides and mudflows in many of the country's districts. The largest number of losses and destructions are faced by districts and cities of Khatlon province. Disasters affected following cities and districts Kulob, Shamsiddini Shohin, Qushoniyon, Dangara, Yovon, Khuroson, Dusti, Vaksh, Vose, Muminobod, Hissar and Jomi.

CoES reported that disasters caused the death of 9 people. Very preliminary estimates indicated that around 1500 HHs out of the 1800 assessed were affected by the floods. Very modest estimations indicate damages caused by disasters to private and social infrastructure caused disruptions to the livelihoods of around 22,000 people.

Government of Tajikistan activated an Inter-Agency Commission on Emergency Situations (Commission) in each disaster affected district, which fully facilitates the response operations. Furthermore, Emergency Operations Centers (Shtab) were set up in each disaster affected district, which collects and analyzes relevant information and coordinates the response activities.

Following that, the REACT mechanism was also activated by the UN Resident Coordinator and the Chairman, CoES. This led to the agreement within the Inter Sectoral Coordination Group (ISCG) to carry out sector specific assessments to gather more information on specific needs that maybe used as the basis of sectoral response plans.

WASH Sector initiated its rapid assessment on the 19th May, 2021 finalizing the assessment methodology and tools which led to the conversion of tools on KoBo and a two-day training (20-21 May, 2021) of enumerators from World Bank (RWSSP-PMU), Good Neighbors Tajikistan and UNICEF in partnership with Red Crescent Societies Tajikistan (RCST). The field testing was conducted on the 22nd May, 2021 and some adjustments to the tools were made. The data collection began on the 23rd May, 2021 followed by data cleaning and analysis on 25-26 May, 2021.

2. OBJECTIVES OF THE ASSESSMENT

The main objectives of the assessment were:

1. To identify and assess key humanitarian WASH needs of the flood affected communities in the flood affected districts of Khatlon Region.
2. To identify key gaps that cannot be covered by the Government keeping in view of the urgency of the need
3. To identify possible interventions to address the identified/prioritized needs.

The analysis and triangulation of data collected through primary and secondary sources as well as direct observation has helped to finalize key findings and devise recommendations for the interventions.

3. METHODOLOGY

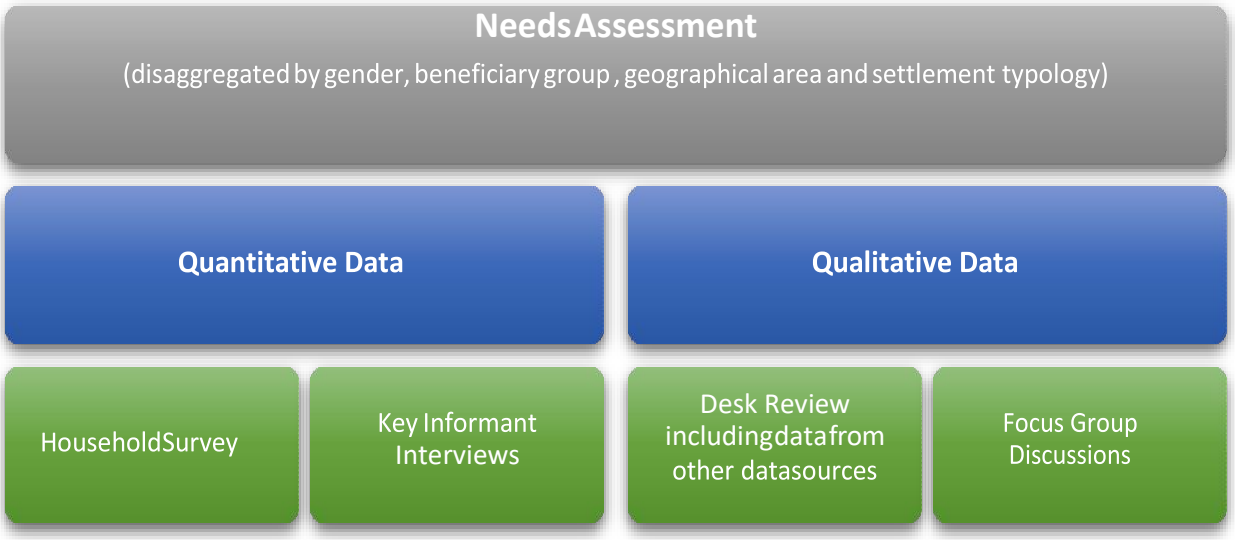
3.1. Target Population

Flood affected communities in the origin, host communities and spontaneous settlements/camps

3.2. Method of reaching out

For more detail and in-depth information regarding WASH cluster, three different approaches will be used to collect data on different variables.

1. Household Questionnaire: For interviews at door step of the target population (HH level)
2. Focused group discussion: 8 – 12 person from the community (at village level)
3. Key Informant interviews: with community leaders and focal person in relevant departments (CoES, KMK, SES and Local Hukumat)



3.3. Sampling

3.3.1. HH Interviews:

Probability proportion to size sampling procedure under which the probability of a unit being selected is proportional to the size of the ultimate stratum, giving larger stratum a greater probability of selection and smaller stratum a lower probability. In order to ensure that all units in the population have the same probability of selection, irrespective of the size of the stratum, sampling units were sampled according to the size of stratum unit it contains.

First, each district was divided into strata's (jamoats/villages) and list respective strata's population size, then cumulative sum of the population will be calculated for each strata and range will be defined for each strata. After that the cumulative population size is calculated. Then the sample interval was obtained by dividing the total cumulative population upon the number of sample interviews to be conducted for that specific district.

To calculate the number of interviews in each strata, random number between 1 and SI (sample interval) was selected which gave us the interview location and repeating the process till end by adding SI to the last location will give us the number of interviews in each strata. For those units whose population was not known, stratified sampling technique have been adapted for grouping of strata and assigning sample size for each strata.

The random walk was used to select the household for survey. A central location to be determined as a starting direction for each interviewer. All families in this direction will be counted. The total number of families will then be divided by the number of interviews that are needed to be conducted in each direction and the interviewer interview families at specific interval. If the number of families in a given direction are less than or equal to the required number of families in that direction, all families in a given direction will be interviewed. The interviewee will then return to the central location of the village to select another direction to complete the required number of the interviews.

3.3.2. Focused group discussion:

This technique was used to facilitate data collection for larger sample group at one time for precise attribution of findings. Two FGD's (one male & one female) will be conducted in every profiling village/jamoat. To identifying the respondents for FGD, Mixed Purposeful Sampling technique will be used, first maximum variation sampling technique will be used to capture variety of responses then criterion sampling technique will be used to identify the respondents based on the defined variables.

3.3.3. Key Informant Interviews:

This method was used to gather an overview of the situation which will be used to triangulate the information collected through FGDs and HH interviews. The interview will be structured around the number of variables. Two KI interviews will be conducted in each of the targeted village/jamoat intervened in every strata.

3.4. Determining Sample Size

To conduct the sample size calculation, the following statistical considerations were maintained. Each district was considered to be an independent cohort. Given the existence of this sample frame, this was considered to be the most accurate, precise and reliable sample selection methodology.

$$\text{Calculation of sample size /strata} = \frac{\text{Design Effect} \times 1.962 \times \text{Prevalence} \times (1-\text{Prevalance})}{\text{Precision2}}$$

Design Effect = 1. In the case of this sampling methodology, random sample selection approach, the design effect enhancement is not applicable.

Precision = 5%. The premise for a 5% prevision level is based on WASH Sector assessment being a baseline survey.

Prevalence = 50%. The expected prevalence of primary variable of interest is not known with reference to the target population being surveyed. As uncertain, the assumed prevalence of 50% is employed to devise the largest and most conservative sample size estimate.

3.5. Sample Allocation

Keeping in view all the above considerations, the following table reflect the sample size allocated for each strata.

No.	Districts Affected	Affected HHs	Schools selected	HH Sample	Total enumerators	HH Interviews Per enumerator	KIIs/Day	FDGs/day (1 with men and 1 with women) - split by enumerators	Sector Partners		
									PMU	GNT	UNICEF/RCST
1	Kulob	504	Kulob, schools #51,52,43	200	26	8	4 with authorties at district level (KMK, CoES, Municipality a and SES) and 1 with head of Jamoat	2 per jamoat. 1 with men and one with women	2	8	16
2	Shamsiddini Shohin	50	Sh.Shohin, school #30	10	1	10					1
3	Qushoniyon	50		8	1	8					1
4	Dangara	100	Danghara, school #29	18	2	9					2
5	Yovon	52	Yovon Schools #3, 31, 51	8	1	8					1
6	Khuroson	50	Khuroson, school #12	8	1	8					1
7	Dusti	50		8	1	8					1
8	Vose	27		8	1	8			1		
9	Vaksh	52	Vakhsh, school occupied by displaced families	18	2	9					2
10	Muminobod	120		18	2	9					2
11	Jomi	187	Jomi, school #50	40	5	8					5
12	Hissar	50		8	1	8					1

The assessment carried out 352 HH interviews including in and off camp settings (based on 95% confidence interval)

The assessment used the mixed method approach where the quantitative information gathered through households' survey (352 HH interviews including in and off camp settings based on 95% confidence interval) was complemented with a range of qualitative methods such as Focus Group Discussions, Key Informant Interviews and field observations. The triangulation of qualitative and quantitative information facilitated mapping and strengthening of the argument for the observed extent of need and particular ranking of the priorities. Whilst the qualitative elements were covered by drawing analysis from the qualitative tools including FGDs, the overall analysis was supported by

quantitative household survey.

3.6. Limitations & Constraints

Overall, the assessment progressed smoothly; however, the assessment and quality of analysis for the assessment is constrained by the fact the assessment being quasi-experimental with household survey design relying on disproportionate sampling methodology, it has inherent limitations. The most important of these limitations is the fact results cannot be generalized across the UCs. For the household survey, disproportionate stratified sampling was adopted with the understanding these findings are skewed toward the affected population. This methodology is appropriate to the situation keeping in view a relatively less number of affected population in the UCs vis-à-vis total population and thus needed specific treatment to ensure their views are adequately captured in the household survey.

3.7. Ethical Considerations

As experienced and responsible assessors, the team adhered to and followed norms, standards and ethics to ensure consistency with research practices and principles. The assessment team throughout the evaluation exercise remained impartial and ensured all the activities were done in a transparent manner.

At the outset, each respondent in the household survey as well as participant in the FGDs was informed of the purpose of assessment, role of the assessment team members and his/her acceptance to be part of the assessment process. Similarly, keeping in view the cultural consideration, few field pictures were taken with due permission of the communities and respondents. The enumerators felt obliged to treat collected data at all times with care and anonymity and, hence, no personal data is reported in the report.

3.8. Quality Assurance Mechanisms

Following set of measures were put in place for the purpose of quality assurance at all levels throughout the process, these include:

1. Monitoring by SUE KMK (Government counterpart)
2. Locally engaged, aware of local context and conversant in local languages, gender balanced and adequately trained field enumerators;
3. Detailed notes from FGDs;
4. Use of KoBo Toolbox to digitize data collection use it as a well-established tool for data analysis and necessary triangulation;
5. Different partners were included as part of the assessment with varying set of expertise. The data analysis was carried out and provide by the World Bank
6. Development and application of qualitative tools in the field by Core Team members;
7. Maintained regular contact & shared updates between all team members for shared understanding of approaches and implementation process.

3.9. Assessment Management:

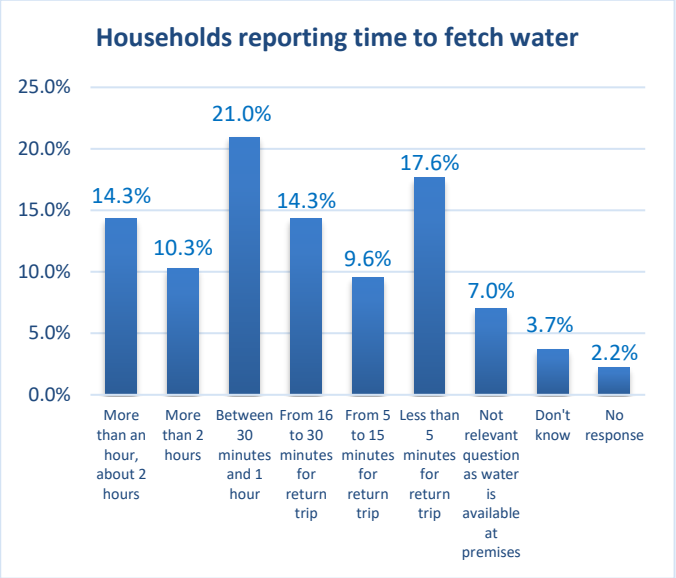
The assessment was managed and led by UNICEF WASH Team (Sector lead for REACT) and supported by the World Bank, RWSSP-PMU, Good Neighbors Tajikistan and Red Crescent Society Tajikistan. UNICEF led the development of methodology and tools, training on tools and field testing, field level coordination and reporting. WB supported with the cleaning of data and analysis and through RWSSP-PMU also supported on conversion of the tool on KoBo and training enumerators on the usage. Also supported on adjustment of the tools during field testing. GNT and RCST supported in terms of data collection in the field.

4. KEY FINDINGS

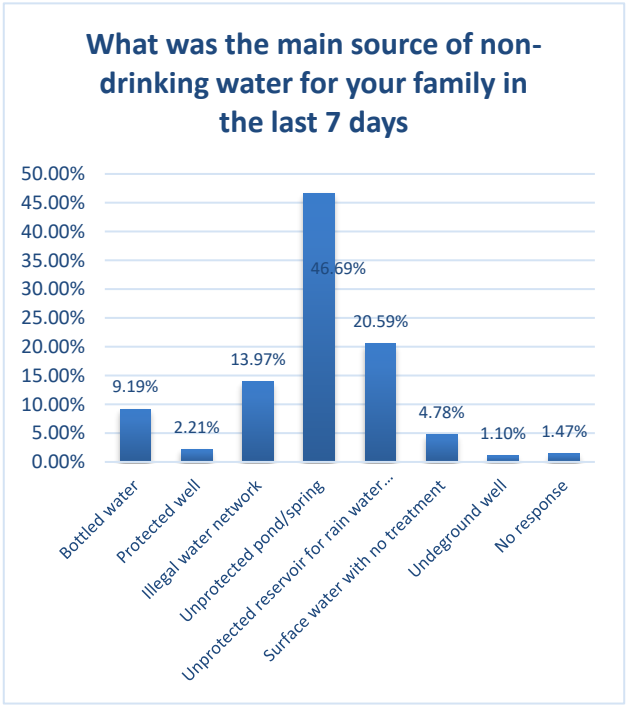
Out of the 12 districts where assessment was carried out, two districts, Vakhsh and A. Jomi had displaced communities living in camp settings with access limited and poor quality of WASH services. The remaining districts had off-camp settings. Some people are living with relatives and neighbors especially those whose houses are fully or partially destroyed while others live in their own houses with need of improved WASH services. The below analysis represents overall situation in all 12 districts both at community level and in schools.

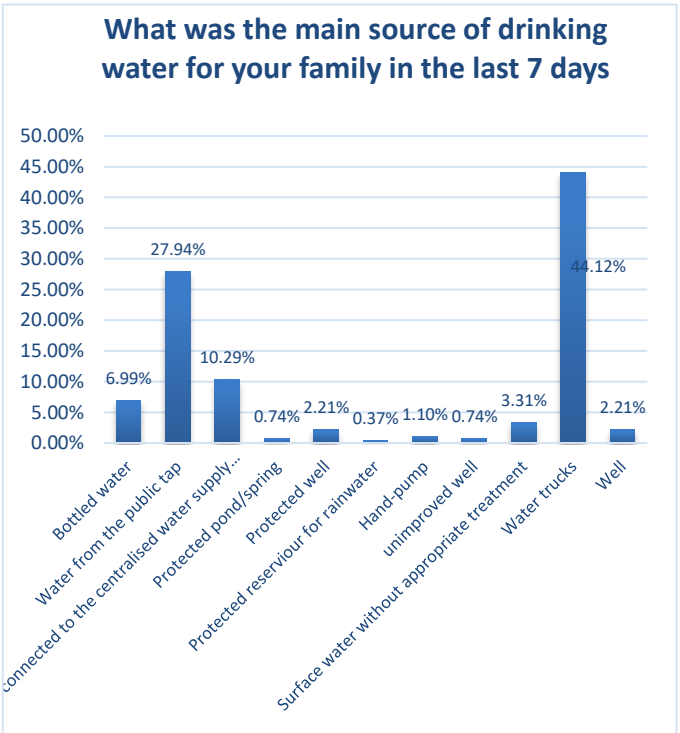
1. Access to Safe Drinking Water

1.1. Water Sources



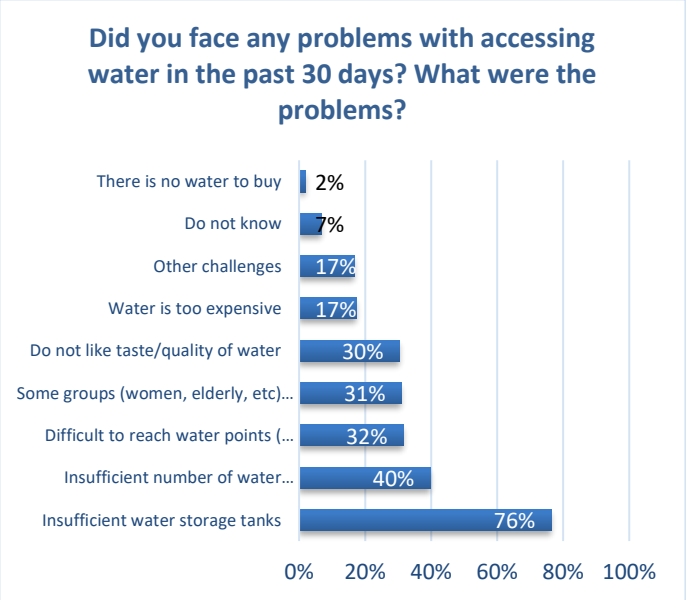
Water provision through trucking and public water taps are the two main source of water since the onset of floods for drinking purposes. **44% of the assessed population is using water provided by through water trucking** while 28% still have access to functional public water collection points. The remaining 28% are consuming water from a number of other sources as listed in the graphical representation. It is pertinent to mention that some of the water supply systems (mainly networks and pumping stations) were damaged by the flooding and mudflows that further made the access to safe drinking water challenging. Similarly for non-potable purposes, **47% the respondents reported using unprotected ponds/springs (surface water) which may have compromised water quality and can have affects on skin and general hygiene.**



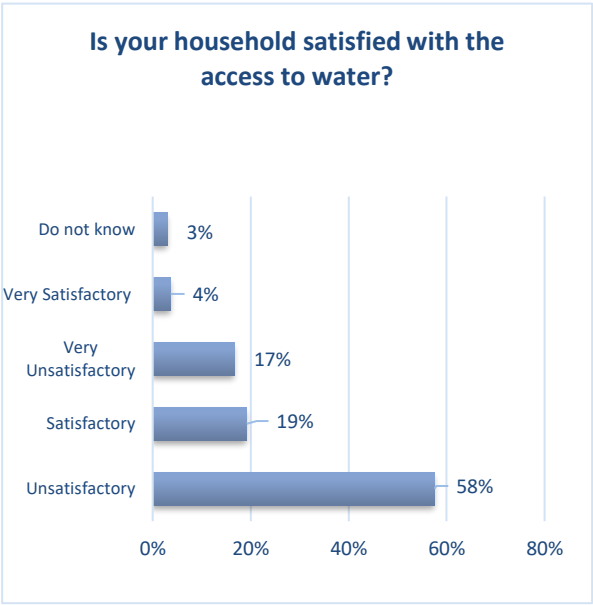


1.2. Access to Water Sources

21% of the flood affected respondents reported that they had to walk for more than 30 minutes to 1 hour (return trip) to reach the drinking water source/collection point and fetch water while 24.6% reported that it takes them about two hours or more to do the same. Around 42% reported that it takes them under 30 minutes to fetch water. However, they do not have access to it within their premises. Only 7% reported having access to water within premises of their houses. It is alarming to see that 58% of the assessed respondents expressed dissatisfaction in terms of access to water. Additionally, 17% expressed high level of displeasure due to the conditions of access. Only 23% expressed different levels of satisfaction.



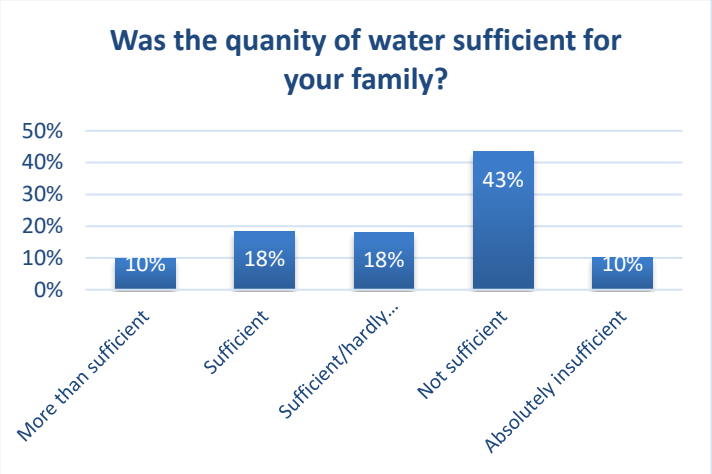
In terms of access, **76% of the respondents reported that the key issue was lack of water storage availability at HH and communal level.** Due to this, the water cannot be accessed when needed. Those HHs that are now living with neighbors or have been displaced to camps also reported on the limited availability for water points in comparison to the need. Issues in terms of access for vulnerable groups such as people with disabilities, women and elderly were also reported. (30-31%).



Two key challenges highlighted by the respondents that are also very critical are 1) poor quality of water and 2) unaffordability to buy water. This also identifies that water is not accessible for everyone free of cost. As HH's economic capacity is already compromised, this is expected to add additional burden.

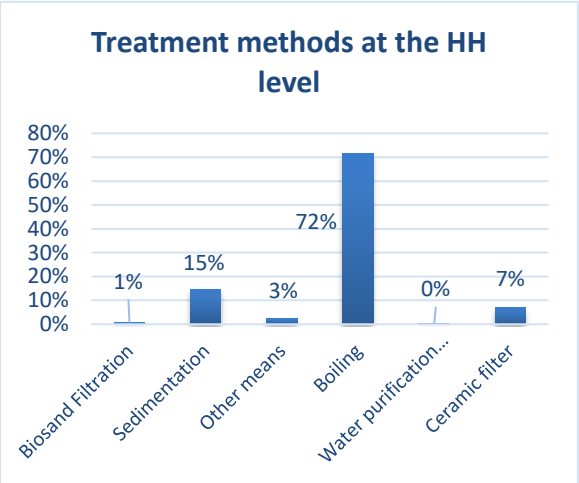
In those cases where water is not available within premises and had to be fetched from a collection point, women and adolescent girls are mainly responsible for fetching water from drinking water sources. They usually do this labor of carrying water on their heads which further exacerbate their health conditions which are already jeopardized because of poor food intake, poor personal hygiene, stress, lack of access to timely and quality health services, excessive physical labor in supporting their family chores etc. Girls and adult women are mainly responsible for fetching water for the family.

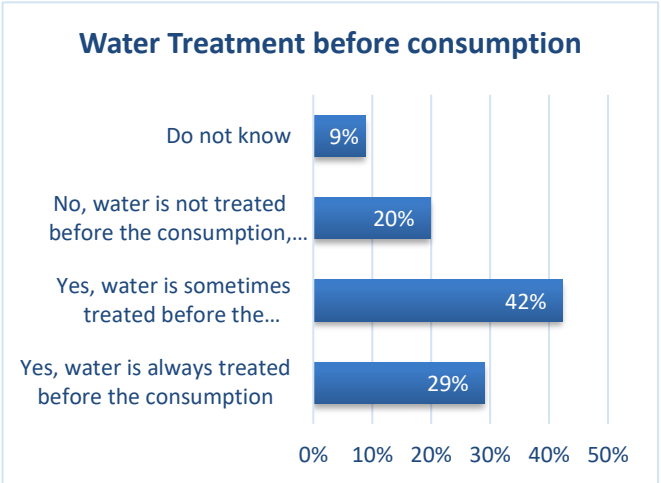
71% of respondents expressed that the current quantity available is not sufficient based on their requirement. Out of this, 10% reported that their requirements are not met at all, 43% reported the amount supplied to them doesn't suffice their needs and 18% reported they hardly meet their needs with the available quantity of water. 28% reported sufficient water is available to them when needed.



1.3. Water Quality

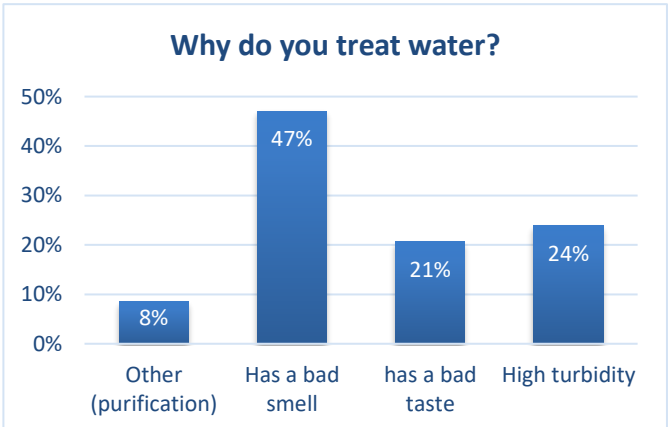
No water testing was conducted as part of the assessment. However, keeping in view the use of unimproved water sources, there may be a risk of contamination leading to waterborne diseases. **According to the data analysis, 50% of the assessed respondents may be at a risk of consuming water with contamination for potable purposes.** 44% rely on water trucking which could have two potential contamination routes. 1) if water at the source level is contaminated and not treated before delivery and 2) water is contaminated due to lack of safe storage and poor means of provision. Additionally, 3% use surface water for drinking. 2% use open wells and 1% use hand pumps accessing shallow water tables. (unimproved source).



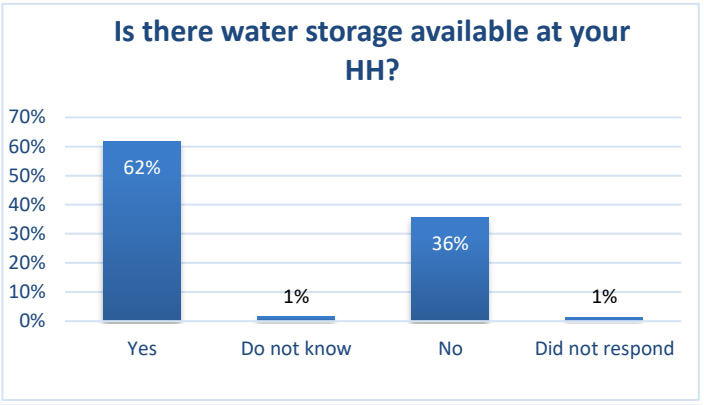


20% of the respondents do not treat water before use and 42% only treat at times which could also be interpreted with a high probability of not treating it before use. Out of those 20% who are treating water, 72% are practicing boiling as their main treatment method while the rest of are using either sedimentation techniques to settle turbidity/particles or using different filters available at HH level.

The key reasons mentioned by respondents was bad smell (47%), bad taste (21%) and high turbidity (24%).

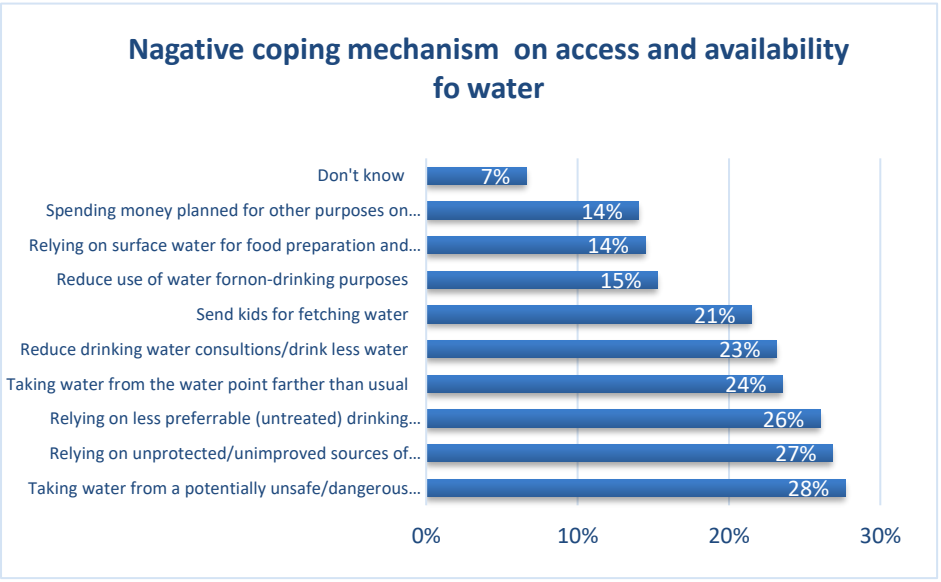


1.4. Water Collection and Storage



36% of the respondents mentioned having no water storage available at HH level. Usually the water they receive is collected in small containers which are not sufficient to store water for the required use. The water provision through public piped network is generally intermittent and is not reliable in terms of availability.

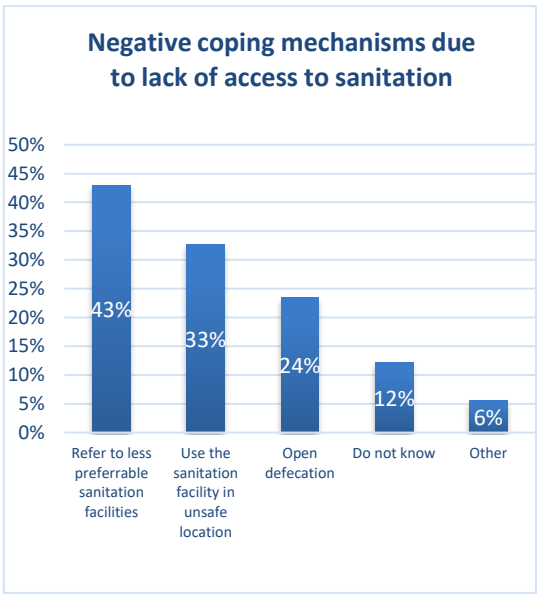
Generally based on the feedback of the respondents, the topmost negative coping mechanism against the lack of sufficient quantity of water for potable and non-potable purposes is using water from unsafe and unimproved sources which also involved fetching water from distant locations. This also raises additional concerns in terms of safety and protection.

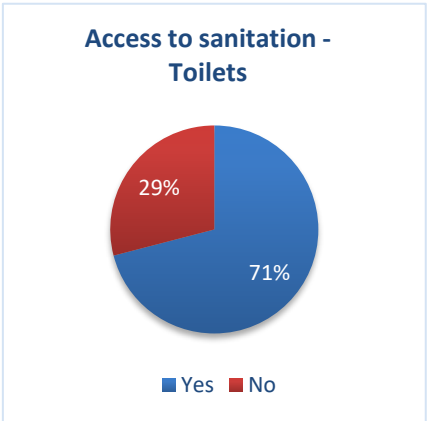


2. Access to Sanitation

2.1. Availability of and access to Latrines

29% of the respondents reported to have no access to latrines. These are from mainly those households whose houses were partially or fully damaged and they are either living with relatives or in a tented settlement. The highest losses to infrastructure is mainly reported in Kulob.

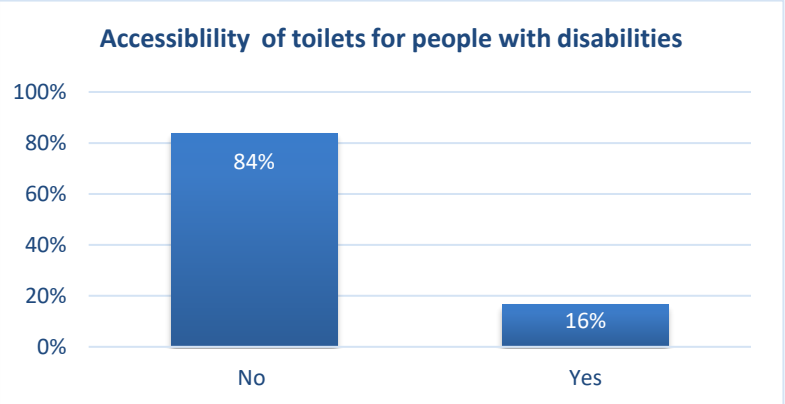




29% of the HH who do not have access to a latrine are either dependent on a shared facility that is available in the vicinity (15%) or are engaged in a negative coping mechanism such as open defecation which subsequently poses risk of fecal contamination.

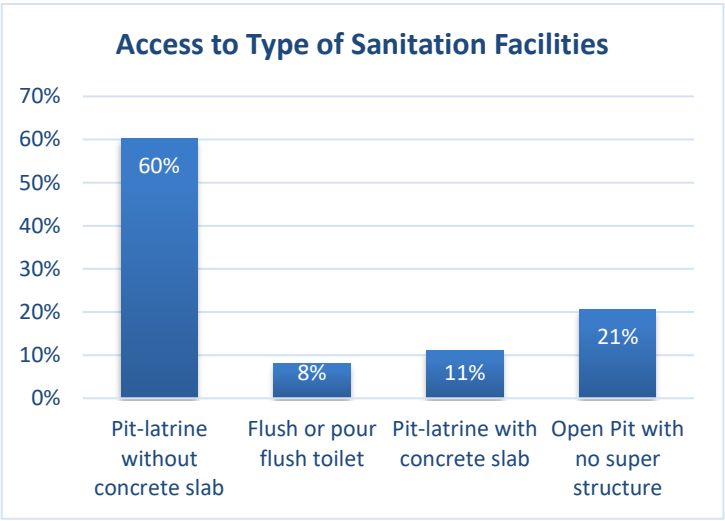
2.2. *Inclusive Access to latrines.*

Although, the exact proportion of people with disabilities remain unclear, 84% of the respondents shared that the toilets accessible to population are not easily accessible for people with disabilities. The key reason is the design of the facilities and the lack of focus on recognition of such needs.

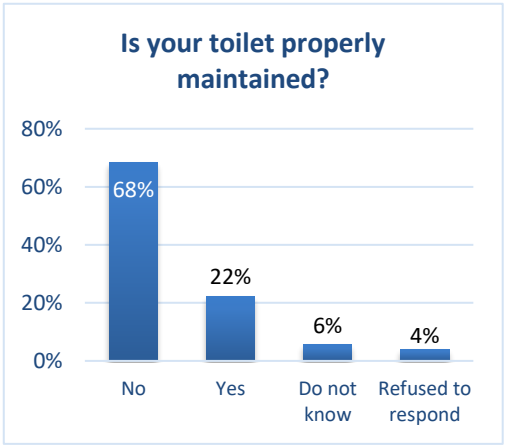


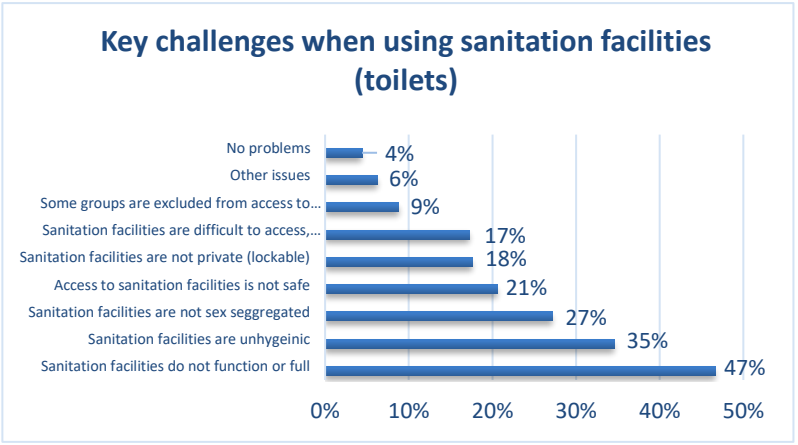
2.3. *Type, Maintenance, and challenges in terms of use*

A large majority (60%) of HHs covered under the assessment mainly used pit latrines without a proper concrete slab/platform. Such type of latrines are categorized as unimproved as per JMP definition. Additionally, 21% of HHs used open pit with no superstructure which can be a contributor of fecal-oral contamination as the excreta is not disposed off properly. As a small number also use hand pumps, such toilets can also be a cause for contaminating perched water table depending on the soil density and type. **This means 81% of HHs interviewed use unimproved excreta disposal mechanisms.** Only the remaining 19% have access to improved sanitation (8% to fluish/pour flush toilets and 11% to pit basic pit toilet with slab)

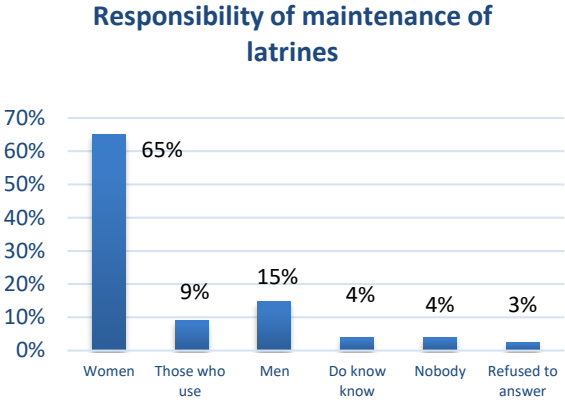


Mainly women (65%) in the community hold the responsibility of cleaning and maintaining the latrines. However, in some cases HHs shared that either men (15%) or those who use the facility are responsible for maintaining it. In camp settings where the latrines are shared (mainly Vakhsh and Jomi districts), maintenance is a problem. The responsibility rests jointly with the community or those who use it but in 68% of the cases is not maintained properly.





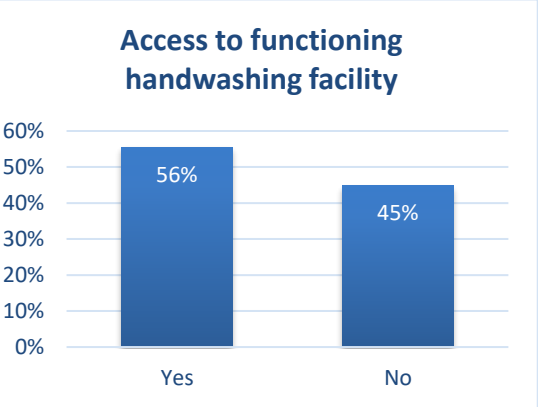
Approx. 68% of HHs reported that they have to share sanitation facilities post flooding and it is either not properly functional (47%), unhygienic (35%), not sex disaggregated (27%), not private 18%) or are difficult to access (17). Some women (21%) shared that they don't feel safe going to latrines that are used at communal level or in other HHs.



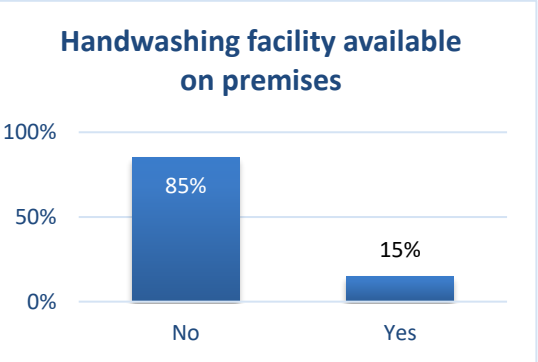
3. Hygiene Promotion:

3.1. Access to functional washing facilities with soap:

45% of the respondents reported not having access to a functional handwashing facility. Out of that, only 15% reported to have it available in the premises whereas the remaining 85% do not. Within those 15% HHs, 59% did not have soap available at the handwashing facility (observation).



Upon probing, the key reasons for not having soap available, 25% of the respondents expressed that they are waiting for it to be distributed. 17% said that it is finished, and they will buy it soon. 11% were not satisfied with the quality of soap and the added value of the use, 7% expressed unaffordability concerns and 3% shared that it was not needed as water alone can clean hands. **This analysis also suggests that between 45-65% do not wash their hands at critical times.**



3.2. Disease Prevalence and Management

A considerable proportion of HHs during the FGDs highlighted prevalence of diseases after the floods. This mainly included diarrhea and skin diseases in adults. In the HH interviews it was also confirmed that approx. 10% of respondents had experienced diarrhea in the last 2 weeks.

When probed, it was learned that a majority don't take any remedial measure when they or their family members get diarrhea. There was no information shared on any specific treatment measures by the HHs

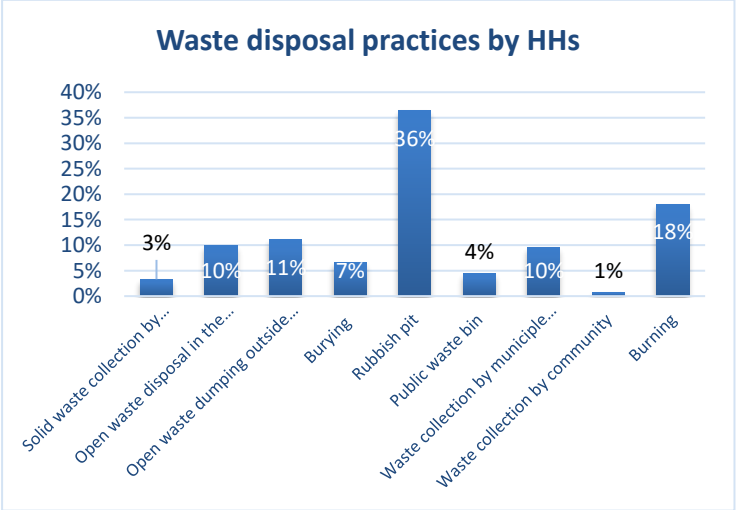
During the FGDs, questions regarding the knowledge about the causes of diarrhea were asked. 30% consider that dirty hands are main cause of diarrhea while another set of 13% respondents expressed that dirty food is the main cause of diarrhea. The remaining could not specify a reason. This also means that understanding of key preventive measures is limited.

3.3. Menstrual Hygiene Management

54% of HHs expressed lack of access to MHM products.

3.4. Waste Disposal

36% of the HH use a dedicated pit for disposal of solid waste, 18% prefer burning their waste 10% dump it within their street and 11% dump the waste outside. 14% of waste is either collected by municipality or established community mechanisms. Improper management of solid waste can be an ongoing risk in terms of disease transmission and contamination of water sources especially with water runoff during rainfall. It also attracts vectors that leads to secondary diseases like dengue and malaria.

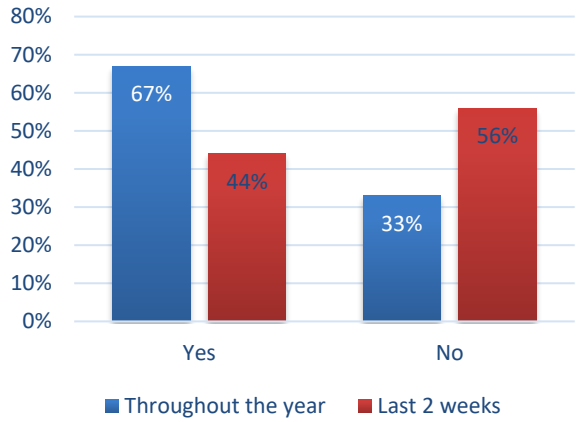


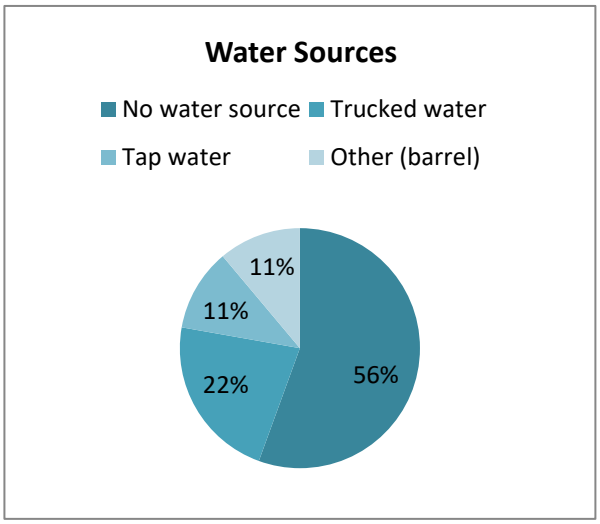
The graph also highlights various frequencies of waste collection.

4. WASH in Schools

4.1. Water source and availability:

11 schools affected by the floods in 7 districts namely Kulob, Shamsiddin Shohin, Dangara, Yuvon, Khuroson, Vakhsh and Jomi were assessed .56% has no water source available while 22% were using water trucking. Only 11% had accesss to public water supply.

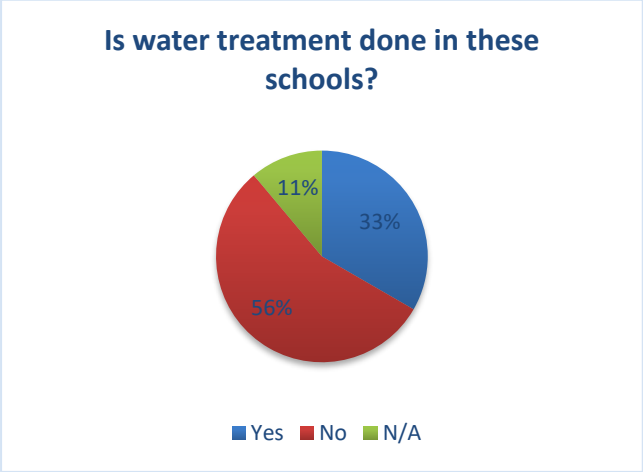


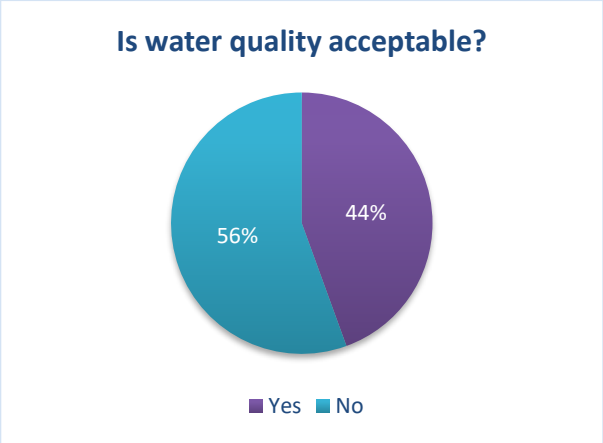


67% of these schools have water available throughout the year whereas only 33% face problems in terms of seasonal deficits. However, in the past two weeks due to floods and damage to the water infrastructure, 56% of these schools no not have access to water both for potable and non-potable purposes.

4.2. Water quality and treatment

The water quality in the 44% of the flood affected schools is poor where it is provided through water trucking, piped water network and barrels. Common issues reported are taste, smell and turbidity in water (not fit for human consumption)

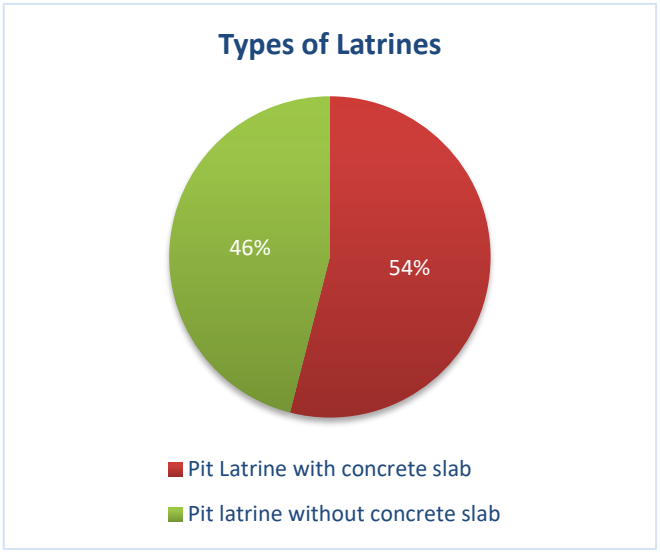


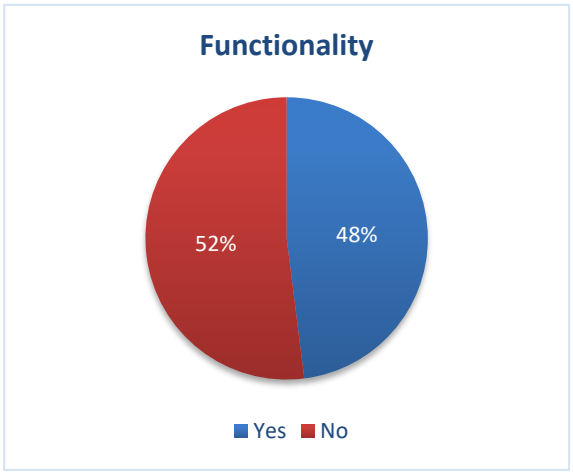


56% of these schools do not have a treatment mechanism available to improve the quality of this water and 11% of the respondents in schools felt it was not applicable as the water could be consumed without treatment. Only 33% treat water. 22% mainly use chlorine treatment. However, having good understanding on the use of chlorine is still questionable. It is important to note that overdosing of chlorine and lack of proper monitoring could lead to multiple health risks.

4.3. Types of sanitation facilities, functionality, O&M and MHM

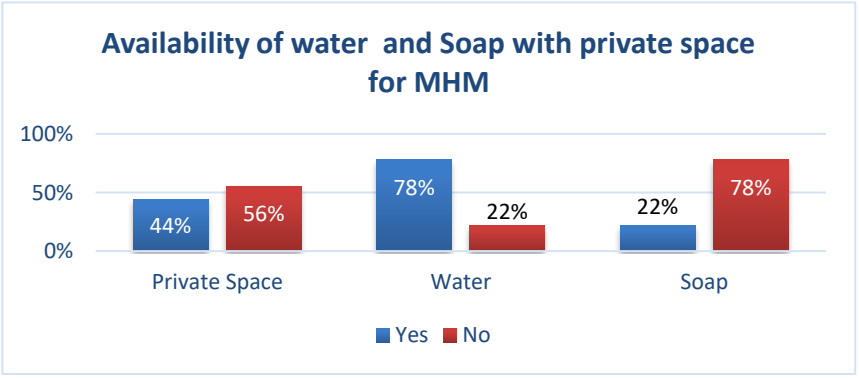
In the assessed schools affected by floods, there are mainly two types of latrines installed 54% are dry pit latrines with concrete slabs or platform. This type falls improved sanitation classification. However, the remaining 46% have pit latrines without a concrete slab or stable platform. This is considered unimproved.

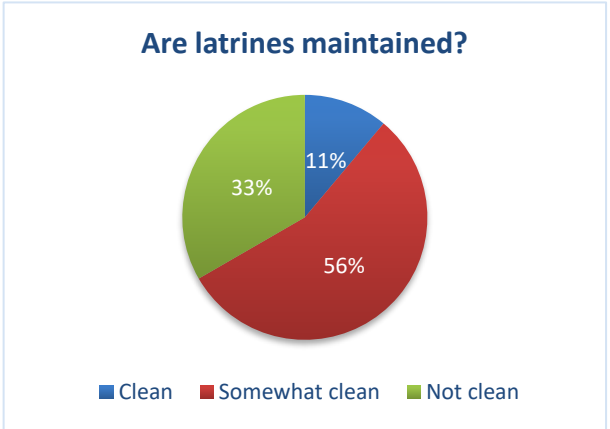




As these schools have been affected by the recent flood the almost 52% (half of them) do not have functional sanitation facilities which creates a huge problem in terms of safe access for the students enrolled. The 48% that are still functional also require minor repairs for optimal functionality. 11% of these toilets are not sex disaggregated and adds to limited access especially for girls.

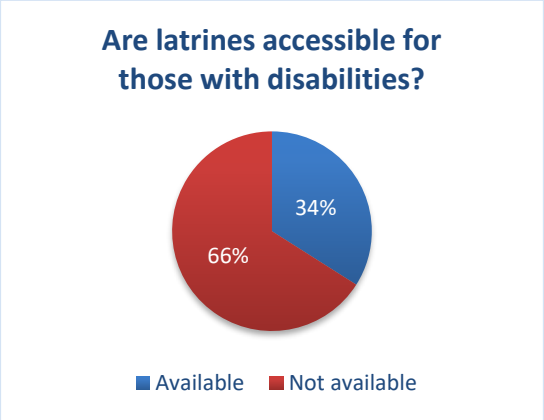
For adolescent girls with MHM needs, 56% of schools lack private space to cater for MHM needs. 22% do not have any water available within the facility and 78% do not have soap available at the facility. None of these schools have waste disposal bins to dispose of MHM waste.





33% of the latrines in these schools are not properly maintained by the administration whereas the remaining 56% cannot also be put under the “clean and maintained” category. These are maintained to a level which does not comply with IPC protocols at schools. Only 11% are properly maintained (observation).

4.4. Accessibility:



66% of the latrines in schools are not accessible for children with disabilities. The designs are not inclusive to accommodate the needs. However, only 34% of schools have access but only in line with limited parameters.

78% of these latrines also do not have any lighting available. This may become a problem specifically for those who attend schools in the evening shift especially girls.

4.5. Access to handwashing facility with soap and water

67% of the affected schools do not have any dedicated handwashing facility for students to regularly wash hand complying with IPC protocols.

0% (none) of the schools have soap available at the handwashing facility and 67% of schools do not have water and soap available at the handwashing facility.

5. Severity Ranking

Districts	Severity Index (Scale 1–10)	Settlement Type	Population in need
Kulob	10	Off-Camp Setting	6,936
Jomi	9	Camp Setting	1,496
Vaksh	9	Camp Setting	416
Yovon	8	Off-Camp Setting	288
Sh. Shohin	7	Off-Camp Setting	208
Dangara	7	Off-Camp Setting	1,325
Dusti	7	Off-Camp Setting	350
Vose	6	Off-Camp Setting	880
Qushoniyon	6	Off-Camp Setting	120
Muminobod	6	Off-Camp Setting	960
Hissar	5	Off-Camp Setting	108
Khuroson	3	Off-Camp Setting	100

5. KEY RECOMMENDATIONS

Short Term Needs:

Camp setting (Districts A. Jomi and Vakhsh)

1. Water trucking to locations where the quantity of water is reported to be insufficient
2. Building capacity of SES department on emergency water quality surveillance
3. Provision of chlorine High Test Hypochlorite (HTH) for water treatment
4. Provision of communal water reservoirs to improve water storage capacity
5. Quick fixes and restoration of existing water and sanitation facilities in the school in Vakhsh district where affected communities are displaced
6. Installation of emergency latrines to have improved and equitable access following a ratio of 1:20
7. Provision of hygiene kits and WASH NFIs
8. Restoration of existing after drainage/ sewerage to be able to function under stress.
9. Hygiene promotion to specify use of certain supplies and emphasis on key messages pertaining to suitable hygiene practices and IPC

Non-Camp Setting (Other Districts)

1. Water trucking to locations where the quantity of water is reported to be insufficient
2. Building capacity of SES department on emergency water quality surveillance
3. Provision of chlorine High Test Hypochlorite (HTH) for water treatment
4. Quick fix rehabilitation of water systems, repair or provision of pumps, generators and treatment system; provision of consumables and fuel, using whenever possible community – based skills and resources
5. Water quality assurance including treatment, distribution of chlorine, water filters or alternative household water treatment systems (HWTS) and monitoring at source and household level. All HWTS distribution will be associated systematically with training on how to use them
6. Installation of emergency latrines/repair of existing facilities and bathing facilities and organization for their management in consultation with the affected people.
7. Installation of solid waste collection points, distribution of garbage collection items and agreements with local authorities for solid waste management and removal
8. Basic hygiene awareness sessions supported by generic IEC materials, supported by locally selected people and distribution of soap, female hygiene items and including post-distribution monitoring
9. Debris removal and canal cleaning using cash for work schemes
10. Quick trainings on O&M to the community

Medium Term Needs:

Non-Camp Setting:

1. Improve, install, or fully rehabilitate existing water systems (Scale up water supply to 50-70 l/c/d; transition to more durable water supply options (boreholes with submersible pumps, Hand pumps, damaged distribution networks, replacement/repair of pumps)
2. Distribute water storage tanks at communal/HH level (if relevant)
3. Reconstruct and rehabilitate permanent bathing and sanitation facilities
4. Distribute waste bins, recruit solid waste collectors, facilitate solid waste removal by municipal service providers/community workers
5. Ensure safe final treatment and disposal of waste
6. Distribute bathing soap, female hygiene items, or cash id applicable (condition to market access and lack of livelihoods)
7. Hygiene promotion and community mobilization – Development and dissemination of relevant messages

8. Activate WASH committees for operation and maintenance minor repair, monitoring and safety audits
9. Reinforce and systematize community feedback mechanisms

Schools:

1. Cleaning and disinfection of schools
2. Rehabilitation of water supply network, pumping devices, water reservoirs connecting school to functional water supply
3. Rehabilitate/repair toilets. If possible, covert to improved structures (VIP, Flush and Pour flush) depending on the availability of water.
4. Repairing of damaged floors, walls ceilings to ensure it is properly washable
5. Rehabilitation/installation of handwashing facilities
6. Provision of hygiene kits and WASH NFIs including soap and MHM kits
7. Improve and expand water storage capacity in schools
8. Ensure availability of water treatment mechanism and technical capacity at school level
9. Carry out hygiene promotion campaigns to disseminate key messages and promote key hygiene behaviors in line with IPC protocols
10. Improve solid and liquid waste management facilities and mechanism at school level

List of schools with WASH needs identified;

No.	Districts Affected	Schools selected	Structural work needed in addition
1	Kulob	School #51	Renovation
2		School #52	Renovation
3		School #43	Renovation
4	Shamsiddini Shohin	School #30	Reconstruction of Building
5	Dangara	School #29	Renovation
6	Yovon	School #3,	Renovation
7		School #31	Renovation
8		School #51	Renovation
9	Khuroson	School #12	Reconstruction of Building
10	Vaksh	Vakhsh, school occupied by displaced families	Renovation
11	Jomi	School #50	Renovation

6. REQUIRED FUNDS ESTIMATION - Tentative

Fund Requirement Estimation - USD													
Districts	**A. Jomi**	**Kulob**	**Vakhsh**	**Yuvon**	**Sh. Shohin**	**Vose**	**Momiobod**	**Dangara**	**Dusti**	**Khoroson**	**Qushonion**	**Hissar**	**Total**
Population Affected	1,496	6,936	416	288	208	880	960	1,325	350	100	120	108	13,187
Schools affected	1	3	1	3	1			1		1			11
Short term													**1,431,633**
Camp setting:													
1. Water trucking to locations where the quantity of water is reported to be insufficient	22,440		6,240										**28,680**
2. Building capacity of SES department on emergency water quality surveillance at district level	1,000		1,000										**2,000**
3. Provision of chlorine High Test Hypochlorite (HTH) for water treatment	8,000		4,000										**12,000**
4. Provision of communal water reservoirs to improve water storage capacity	6,000		3,000										**9,000**
5. Quick fixes and restoration of existing water and sanitation facilities in the school in Vakhsh district where affected communities are displaced			10,000										**10,000**
6. Installation of emergency latrines to have improved and equitable access following a ratio of 1:20	26,180		7,280										**33,460**
7. Provision of hygiene kits and WASH NFIs	20,944		5,824										**26,768**
8. Restoration/quick fixes of existing after drainage/ sewerage to be able to function under stress.	15,000		15,000										**30,000**
9. Hygiene promotion to specify use of certain supplies and emphasis on key messages pertaining to suitable hygiene practices and IPC	10,000		10,000										**20,000**
Non-Camp Setting:													
1. Water trucking to locations where the quantity of water is reported to be insufficient		62,424		2,592	1,872	7,920	8,640	11,925	3,150	900	1,080	972	**101,475**
2. Building capacity of SES department on emergency water quality surveillance		1,000		1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	**10,000**
3. Provision of chlorine High Test Hypochlorite (HTH) for water treatment		40,000		20,000	20,000	20,000	20,000	20,000	20,000	20,000	20,000	20,000	**220,000**
4. Quick fix rehabilitation of water systems, network, repair or provision of pumps, generators and treatment system; provision of consumables and fuel, using whenever possible community – based skills and resources		10,000		10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	**100,000**
5. Water quality assurance including treatment, distribution of chlorine, water filters or alternative household water treatment systems (HWTS) and monitoring at source and household level. All HWTS distribution will be associated systematically with training on how to use them		138,720		5,760	4,160	17,600	19,200	26,500	7,000	2,000	2,400	2,160	**225,500**
6. Installation of emergency latrines/repair of existing facilities and bathing facilities and organization for their management in consultation with the affected people.		208,080		8,640	6,240	26,400	28,800	39,750	10,500	3,000	3,600	3,240	**338,250**
7. Installation of solid waste collection points, distribution of garbage collection items and agreements with local authorities for solid waste management and removal		20,000		5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	**65,000**
8. Basic hygiene awareness sessions supported by generic IEC materials, supported by locally selected people and distribution of soap, female hygiene items and including post-distribution monitoring		10,000		6,000	6,000	6,000	6,000	6,000	6,000	6,000	6,000	6,000	**64,000**
9. Debris removal and canal cleaning using cash for work schemes		40,000		10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	**130,000**
10. Quick trainings on O&M to the community		1,000		500	500	500	500	500	500	500	500	500	**5,500**
District Wise Total - Short Term	**109,564**	**531,224**	**62,344**	**69,492**	**64,772**	**104,420**	**109,140**	**130,675**	**73,150**	**58,400**	**59,580**	**58,872**	
Medium Term Needs:													**1,788,773**
Non-Camp Setting:													
1. Improve, install, or fully rehabilitate existing water systems (Scale up water supply to 50-70 l/c/d; transition to more durable water supply options (boreholes with submersible pumps, Hand pumps, damaged distribution networks, replacement/repair of pumps)	100,000	250,000	80,000	55,000	50,000	50,000	50,000	50,000	50,000		40,000	40,000	815,000
2. Distribute water storage tanks at communal/HH level (if relevant)													
3. Reconstruct and rehabilitate permanent bathing and sanitation facilities	26,180	121,380	7,280	5,040	3,640	15,400	16,800	23,188	6,125	1,750	2,100	1,890	230,773
4. Distribute waste bins, recruit solid waste collectors, facilitate solid waste removal by municipal service providers/community workers													
5. Ensure safe final treatment and disposal of waste (solid + liquid)	15,000	50,000	15,000	15,000	15,000	15,000	15,000	15,000	15,000	15,000	15,000	15,000	215,000
6. Distribute bathing soap, female hygiene items, or cash id applicable (condition to market access and lack of livelihoods)	6,000	10,000	6,000	6,000	6,000	6,000	6,000	6,000	6,000	6,000	6,000	6,000	76,000
7. Hygiene promotion and community mobilization – Development and dissemination of relevant messages	15,000	40,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	155,000
8. Activate WASH committees for operation and maintenance minor repair, monitoring and safety audits													
9. Reinforce and systematize community feedback mechanisms													
WASH in Schools:													
1. Cleaning and disinfection of schools													
2. Rehabilitation of water supply network, pumping devices, water reservoirs connecting school to functional water supply													
3. Rehabilitate/repair toilets. If possible, covert to improved structures (VIP, Flush and Pour flush) depending on the availability of water.													
4. Repairing of damaged floors, walls ceilings to ensure it is properly washable													
5. Rehabilitation/installation of handwashing facilities													
6. Provision of hygiene kits and WASH NFIs including soap and MHM kits	27,000	81,000	27,000	81,000	27,000			27,000		27,000			**297,000**
7. Improve and expand water storage capacity in schools													
8. Ensure availability of water treatment mechanism and technical capacity at school level													
9. Carry out hygiene promotion campaigns to disseminate key messages and promote key hygiene behaviors in line with IPC protocols													
10. Improve solid and liquid waste management facilities and mechanism at school level													
District Wise Total - Medium Term	**189,180**	**552,380**	**145,280**	**172,040**	**111,640**	**96,400**	**97,800**	**131,188**	**87,125**	**59,750**	**73,100**	**72,890**	
District Wise Total - Short + Medium Term	**298,744**	**1,083,604**	**207,624**	**241,532**	**176,412**	**200,820**	**206,940**	**261,863**	**160,275**	**118,150**	**132,680**	**131,762**	
Grand Total													**3,220,406**