T 2.A3

Water, sanitation & energy assessment

Summary: Going toward a Zero-Waste school goes beyond waste management only. Assessing all the resources and material produced and consumed at the school in terms of water supply, sanitation system and energy will help identifying potential rooms for improvement and synergies on material recovery options.

Description

In order to close the loop of all resources and material, water supply, sanitation systems and energy sources and consumption of the school should also be looked at. The main information of interest are:

— Part 1 - Water:

- How much water is consumed at the school and from which water sources?
- Is drinking water always accessible or not?
- Is there any water treatment system?
- Does the water quality meet WHO guidelines for presence of residual chlorine, E.Coli, Arsenic, Lead? (see values in Tool 2 A3)
- Is there any storage system and how well it is maintained?
- What kind of practices are done at the school to apply the 3R concept to water?

— Part 2 - Sanitation:

- What kind of toilets type is used at school?
- What kind of collection, storage and/or treatment system is used?
- Is there any wastewater treatment system in place or is it connected to a sewer?
- How many (usable) toilets are there?
- In which state are these toilets?
- Does the sanitation system works properly or is there any issues of smell, overflow, etc?

— Part 3 - Energy:

- How much energy is consumed at the school and in which form? (electricity, cooking fuel, etc.)
- What are the main electricity/energy sources?
- Is energy always accessible/available or not?
- What kind of practices are done at the school to apply the 3R concept to energy?

To access this information, you can use the pre-made questionnaires of Tool 2.A3. Note that the questionnaires might need to be adapted to your specific context.

People able to answer these questions at the school are typically:

- School administrator (for bills and payment on water and energy supply)
- School technicians or school caretaker

Key steps are described in the table below.

Steps

- Step 1. Adapt the questionnaire to the school context (1/2 day)
- Step 2. Fix appointment for interviews and field observation and send the questionnaire to the interviewee (1/2 day)
- Step 3. Fulfill the questionnaire (1-4days)*
- Step 4. Preliminary analysis of the results (1 day)
- Time needed depends on the information already available

Resources

Tool 2.A3 Water, sanitation & energy assessment questionnaires

Additional resources:

Schelbert et al., Facility Evaluation Tool for WASH in Institution (FACET)