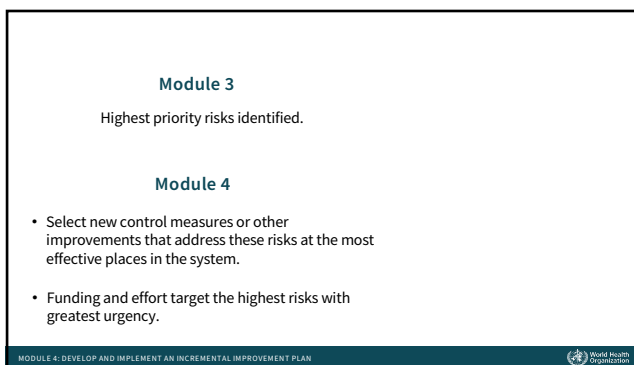




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2





3

Consider options to control identified risks.

Develop an incremental improvement plan.

Implement the improvement plan.




MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN 


4

STEP 4.1
Consider options to control identified risks

OBJECTIVE







To encourage the SSP team to consider a variety of ways to control risks, reducing risk levels.


MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN 

5

STEP 4.1
Consider options to control identified risks

Improvement options

-  **Option 1: Regulatory measures**
-  **Option 2: Technical control measures**
-  **Option 3: Management and operational control measures**
-  **Option 4: Behaviour change measures**


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6

STEP 4.1
Consider options to control identified risks


Improvement options

Option 1: Regulatory measures



Mechanisms to regulate the sanitation service chain.

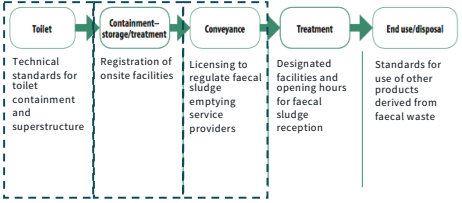
SSP measures should focus on ordinances and local by-laws passed by local authorities.

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7

STEP 4.1
Consider options to control identified risks

Examples of sanitation aspects covered by legislation and regulation




Toilet
Technical standards for toilet containment and superstructure

Containment-storage/treatment
Registration of onsite facilities

Conveyance
Licensing to regulate faecal sludge emptying service providers

Treatment
Designated facilities and opening hours for faecal sludge reception

End use/disposal
Standards for use of other products derived from faecal waste


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8


STEP 4.1
Consider options to control identified risks

Improvement options

Option 2: Technical control measures



Also called technology upgrades, refer to the construction or refurbishment of the sanitation system.

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9

STEP 4.1
Consider options to control identified risks

Examples of incremental technical control measures

```

    graph LR
      A[Toilet] --> B[Containment-storage/treatment]
      B --> C[Conveyance]
      C --> D[Treatment]
      D --> E[End use/disposal]
  
```

Toilet
Constructing or repairing toilets in households or other settings.

Containment-storage/treatment
Elevate the pits or implementing container-based sanitation.

Conveyance
Make motorized and/or manual pumps available to the workers.

Treatment
Construction of faecal sludge treatment plant and transfer stations or new wastewater treatment plant or process element.

End use/disposal
Low-contact irrigation methods.

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN

10

STEP 4.1
Consider options to control identified risks

Improvement options

Option 3: Management and operational control measures

Methods, procedures and routines to carry out a specific activity within the sanitation service chain.

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN

11

STEP 4.1
Consider options to control identified risks

Improvement options

Examples of incremental technical control measures


- Development and adherence to SOP
- Training of key actors on service delivery
- Vector control programs
- Crop restrictions and withholding times

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN

12


STEP 4.1
Consider options to control identified risks

Improvement options



Option 4: Behaviour change measures


Programs designed to foster behaviour change at the levels of the individual, the household, the community and key stakeholders involved in sanitation delivery.

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN 

13


STEP 4.1
Consider options to control identified risks

Improvement options



Depending on the specific situation, **desired user behaviours** include:

- **Abandoning open defecation** and adopting safe sanitation facilities.
- Ensuring the **regular desludging** of such facilities.
- **Connecting** to a sewerage system where available and paying the service charges.
- **Wearing** Personal Protective Equipment.


MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN 


14

STEP 4.1
Consider options to control identified risks

Behaviour change approaches

- Information, education and communication-based (IEC) messaging approaches.
- Community-based approaches.
- Social and commercial-marketing approaches.
- Approaches based on psychological and social theories.



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15

STEP 4.1
Consider options to control identified risks

Multi barrier approach
Sanitation systems should provide more than one barrier against the different types of pathogens (multiple barriers)

Technical measure
Management and operational measure
Behaviour change measure
Regulatory measures

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN

16

STEP 4.1
Consider options to control identified risks

Consider all types of improvement options in each step of the sanitation service chain

	Installation of flush toilets	Training of masons for correct installation	Program to encourage correct use and maintenance	Technical standards on material, dimensions and location
	Ensuring properly functioning septic tanks	Building a data base of on-site sanitation infrastructure	Program to encourage the remediation of tanks	Guidelines on periodic inspection of onsite-systems
	Installation of faecal sludge transfer stations	Establishing a call centre for septic tank emptying	Consumer protection program	Licensing of emptying service providers

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN

17

STEP 4.1
Consider options to control identified risks

Consider all types of improvement options in each step of the sanitation service chain

	Construction of a faecal sludge treatment plant	Development of Standard Operating Procedures for operation and maintenance	Internal awareness raising program to ensure occupational health and safety	Standards for effluent and sludge from treatment facility
	Additional treatment of dried sludge (e.g. co-composting)	Training farmers on crop selection (e.g. only crops not eaten raw)	Household food safety program (to encourage washing of produce)	Standards for products made sludge

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN

18

STEP 4.1

Consider options to control identified risks

Evaluation of improvement options

When selecting improvement options, think about:

- **Potential** for improving existing control(s).
- **Cost** relative to its effectiveness.
- Technical **effectiveness**.
- **Acceptability** to workers or exposure groups and **reliability**.
- **Responsibility** for the new measure.
- Potential for the control measure to **work under different climate change scenarios**

19

STEP 4.2

Use selected options to develop an incremental improvement plan



OBJECTIVE

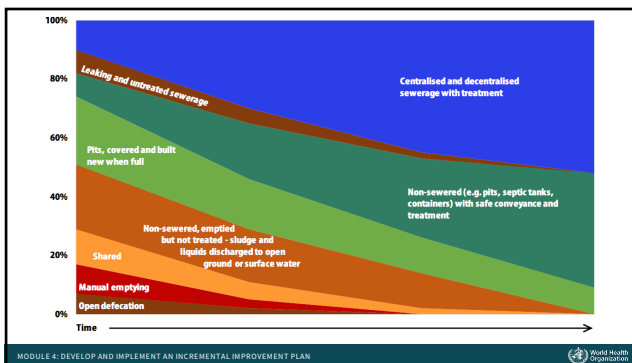
To consolidate the options into a clear plan of action.



To formulate inclusive, equitable and practical solutions:

- It is essential to understand the mix of sanitation systems in use
- Plan how that mix should change over time as progress is made
- **Outcome:** incremental and context specific improvement of the sanitation system.
- Interventions can be targeted and sequenced to maximize their positive impacts on public health.

20



21

STEP 4.2

Use selected options to develop an incremental improvement plan

While preparing the incremental improvement plan

- Prioritize improvements, based on hazards with **highest risks**.
- Identify the **person or agency responsible** and the **timeline**.
- Ensure **coordination**.
- May choose **more affordable interim control measures**.
- **Adaptive management processes** suitable to respond to emergent and unforeseen conditions.

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22

STEP 4.2

Use selected options to develop an incremental improvement plan

For instance, this may include incorporating an emergency management plan for specific climate-related hazards.

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23

STEP 4.3

Implement the improvement plan



OBJECTIVE

To achieve the expected benefits

Implementation of the improvement plan, which requires major coordination and implementation efforts:

- Part of the funds should be secured up-front.

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24

STEP 4.3

Implement the improvement plan

However, many activities will require commitment from the responsible organizations.

- **Regulatory and management control measures**, as local ordinances and guidelines can be prepared within the daily work of the authorities involved.
- **For behaviour change measures** targeting the general population, coordination is needed for community mobilization and awareness-raising campaigns.

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN



25

Consider options to control identified risks.

Use selected options to develop an incremental improvement plan.

Implement the improvement plan.



MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN



26

MODULE 4: DEVELOP AND IMPLEMENT AN INCREMENTAL IMPROVEMENT PLAN



27

Module 5: Monitor control measures and verify performance

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28

SANITATION SAFETY PLANNING

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Second Edition



29
