



Using the country risk profile to inform health security capacity development planning (NAPHS)

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Background

Sri Lanka is a signatory to the International Health Regulations-2005 (IHR) and has aligned its one health systems to implement IHR

We ensured evidence-based planning from the development of the first NAPHS 2019-2023

Several assessments were conducted in 2023, prior to development of the second NAPHS 2024-2028 to ensure continued evidence-based planning for health security in Sri Lanka

Sri Lanka conducted country risk profiling through STAR workshop prior to NAPHS development to ensure risk-based approach in health security planning.

NAPHS development 2024-2028; Systematic Approach



National Bridging WS

(IHR-PVS-NBW)

(Feb 2023)

Provided opportunity to human and animal health services to review their current collaboration gaps and develop a joint road map in key technical areas



STAR workshop

(MAY 2023)

- To ensure a risk-based approach
- Results of the STAR workshop directly linked to prioritize capacity building actions for 1–2-year operational National Action Plan for Health Security (NAPHS)



PVS

(July 2023)

The assessment identified strengths and weaknesses in veterinary services and provided recommendations across four main components of PVS tool

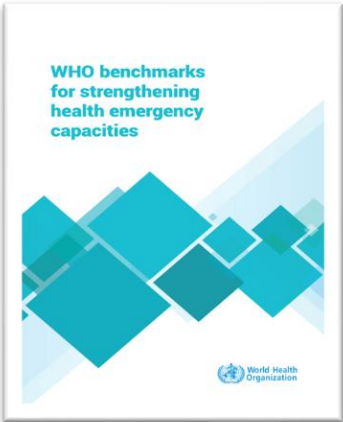


JEE

(Sept. 2023)

JEE scores with priority recommendations facilitated the NAPHS development as the main base

**Assessment's recommendations
(# 226)**



**NAPHS 2024-2028
Development
(FEB 2024)**

Capacity building of technical focal points on the costing of plans was conducted in 2023 prior to NAPHS development



Purpose

- To rapidly identify and assess public health risks for planning and prioritization of health emergency preparedness and disaster risk management activities



A multi-sectoral, whole-of-system involvement

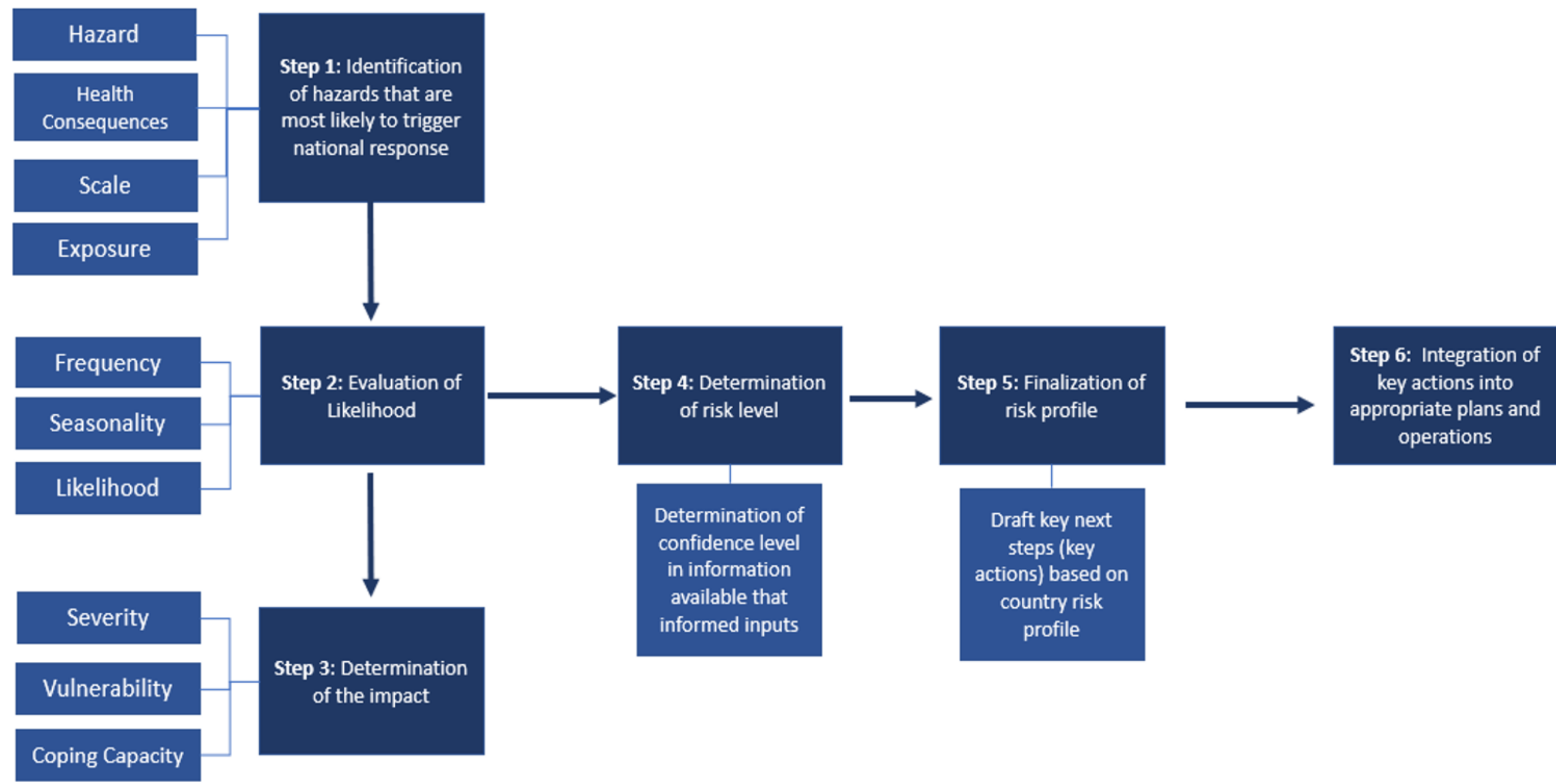
- Ministry of Health
- Animal Health
- Disaster Management Centre
- Meteorology Department
- Central Environmental Authority
- Census and Statistics Department
- National Building Research Organization (NBRO)
- Geological Survey and Mines Bureau
- Department of Agriculture
- Department of Irrigation
- Atomic Energy Regulatory Council
- Ministry of Defense including Tri forces
- Fire Department CMC
- Marian Environment Protection Authority
- Red Cross
- National Mine Action Centre



Review of relevant information/data available and consensus building through discussions

- Categories of hazards in the Disaster Management Act No.13 of 2005.
- Previous formal or informal risk assessments.
- Reference information; from surveillance, and capacity assessment reports including Desinventar (<http://www.desinventar.lk/>)
- Hazards from neighbouring countries or geographic areas with potential cross-border risk.
- Previous responses to emergencies drawing on the collective experience of multi-sectoral experts
- WHO Classification of Hazards

Steps of the country risk assessment process and integrating recommendations to plans/operations



STAR outputs

Specific Hazard	Risk Level	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Landslide	High												
Flood (SW)	High												
Flood (NE)	High												
Respiratory pathogens with pandemic potential (influenza, coronavirus, orthopox virus, etc.)	High												
Dengue	High												
Tsunami	Moderate												
Cyclone	Moderate												
Radiation agents	Moderate												
Air pollution	Moderate												
Malaria	Moderate												
Leptospirosis	Moderate												
AMR (MDR Klebsiellan pneumoniae, MDR Streptococcus pneumoniae)	Moderate												
Earthquake	Low												
Chemical agents	Low												
Fire	Low												
Plant diseases (Fall Armyworm affecting Maize)	Low												
Drought	Low												
Hot days/warm nights	Low												
Marine-related incident	Very low												

Sri Lanka national emergency and disaster risk calendar

Impact →	Critical	• Earthquake	• Cyclone		
	Severe	• Tsunami • Radiation agents • Malaria	• Landslide • Respiratory pathogens with pandemic potential (influenza, coronavirus, orthopox virus, etc.)	• Dengue	
	Moderate	• Marine-related incident	• Chemical agents	• Air pollution • AMR (MDR Klebsiellan pneumoniae, MDR Streptococcus pneumoniae)	• Flood (SW) • Flood (NE)
	Minor		• Fire • Plant diseases (Fall Armyworm affecting Maize) • Drought • Hot days/warm nights	• Leptospirosis	
	Negligible				
		Very unlikely	Unlikely	Likely	Very likely Almost certain
		Likelihood →			

Country risk matrix

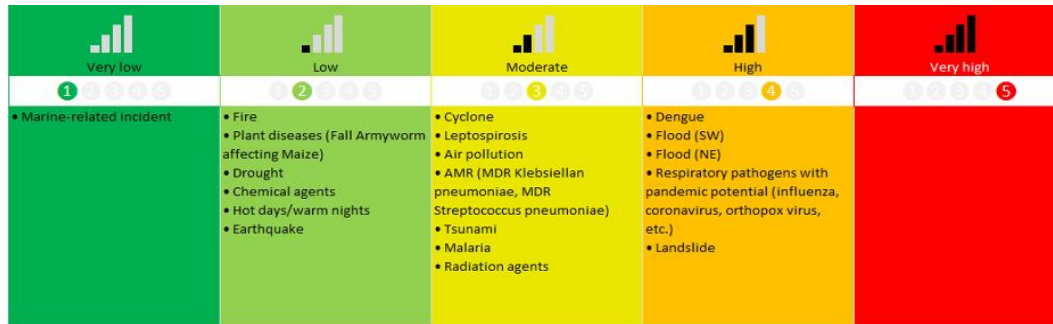
Hazard	Priority Action	Responsible	Stakeholders	Geographic Areas(s)	Justification
Landslide Flood	• Review and update landslide hazard zonation maps and flood inundation maps.	National Building Research Organization (Landslide), Dept. of Irrigation (Flood)	Disaster Management Center, Dept. of Irrigation, National Building Research Organization, Dept. of Meteorology, Ministry of Health, Road Development	Subnational (Flood: river basin level)	To detect changes in different localities
	• Review existing landslide early warning threshold limits and upgrading monitoring system	National Building Research Organization, Dept. of Irrigation	Authority, Urban Development Authority, Central Environmental Authority, Mahaweli Authority, Local Government Authorities, District Secretariats, 1990	Subnational	Respond to changes in rainfall patterns
	• Development of policy and strategies to integrate management of floods and rainfall induced landslides	National Building Research Organization, Dept. of Irrigation, DMC	Authority, Urban Development Authority, Central Environmental Authority, Mahaweli Authority, Local Government Authorities, District Secretariats, 1990	Ratnapura, Kalutara, Galle and Matara	To enhance effectiveness of management plan
	• Develop risk communication and community engagement strategic planning.	Ministry of Health	Authority, Local Government Authorities, District Secretariats, 1990	National	For collaborative actions to mitigate emergency and risk situations
	• Capacity building on risk management	DMC and Local Authorities	Emergency Response NGOs and INGOs	National and vulnerable districts	For strengthening preparedness and response to landslides and floods

Recommendations

Using STAR outputs for health security planning

STAR Country Risk Profile

Multisectoral experts and leaders have come together to review country risks, including hazard-specific coping capacity and vulnerability and discuss priority actions through a participatory process.



Risk Overview

Hazards Group	Hazards
Geophysical	Landslides Tsunami Earthquake
Hydro-metrological	Flood Cyclone
Climatological	Drought
Environmental	Marine Environment related incidents
Biological	Respiratory pathogens with pandemic potential Vector Born Diseases -Dengue, Malaria Zoonoses – Leptospirosis Plant diseases – fall armyworm AMR - MDR Klebsiella pneumoniae, MDR Streptococcus pneumoniae
Human-induced (Technological/ Societal)	Fire (Urban) Chemical accidents Radio nuclear accidents Air Pollution

Emergency Preparedness & Response Planning



National Action Plan for Health Security 2024-2028



Technical area specific plans e.g. AMR



Risk/Disease specific plans and sector-specific plans



Investment plans and prioritization of actions/operations/funds

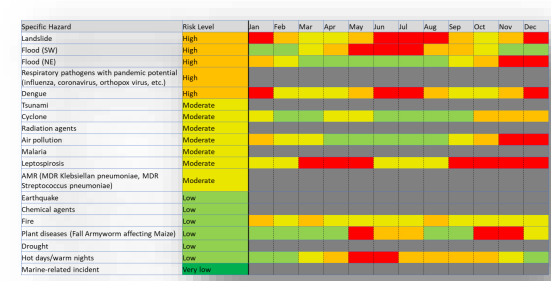
Linking risk profile to NAPHS: applying key actions to capacity planning

Priority Action recommendation (STAR)	JEE technical area and linked recommendations	NAPHS actions
Flood/Landslides <ul style="list-style-type: none"> Develop risk communication and community engagement strategic planning Capacity building on risk communication and community empowerment and cascade training 	R5:Risk Communication and Community Engagement Review and adapt existing structures and processes to integrate RCCE and infodemic management into provincial, district and divisional annual action plans, infodeemic management interventions	<ul style="list-style-type: none"> Streamline the network with all relevant stakeholders for timely risk communication during health emergencies Integrate RCCE and infodemic management into provincial, district and divisional annual action plans
Tsunami/Cyclone/Earthquake <ul style="list-style-type: none"> Enhance surveillance capacity to ensure early warning and timely response Capacity building on risk management 	D2: Surveillance Systematically expand the scope of the surveillance system to enable multi-hazard public health events surveillance for priority risks by effectively leveraging the national digital health blueprint Designate and train teams at national and sub national levels to conduct sectoral and joint rapid and comprehensive risk assessments of potential and emerging multi-hazard threats as an integral part of the surveillance system	<ul style="list-style-type: none"> Review the existing surveillance systems in one health sectors and identify how to incorporate them into a common multi hazard surveillance system, collaboratively develop policies and operational mechanisms that are digitally enabled for efficient data sharing across sectors. Extend risk assessments to subnational levels for potential and emerging multi-hazard threats as an integral part of the surveillance system
Dengue <ul style="list-style-type: none"> Strengthen legislation supportive of dengue vector control by Identifying and addressing gaps in existing legislation 	P1 Legal instruments Conduct a mapping and analysis of legal frameworks relevant to the IHR (2005) across all sectors at national and subnational level and, based on the findings, identify priority actions for legal strengthening and responsible sectors, to be facilitated by the IHR Steering Committee	<ul style="list-style-type: none"> Conduct a mapping and analysis of legal frameworks relevant to the IHR (2005) across all sectors at national and subnational level Identify priority actions for legal strengthening and responsible sectors

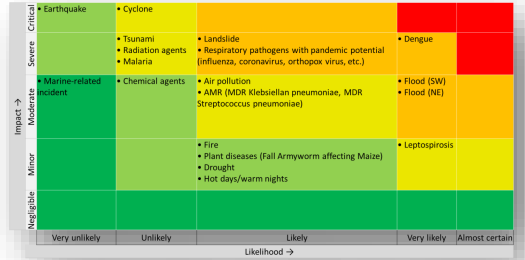
Linking risk profile to NAPHS: applying key actions to capacity planning cont..

Priority Action recommendation (STAR)	JEE technical area and linked recommendations	NAPHS actions
Radiation Agents <ul style="list-style-type: none">• Conducting Annual table-top exercises to test the level of preparedness and prevention• Establish health facilities with capacity to manage patients from radiation emergencies	RE: Radiation Emergencies <ul style="list-style-type: none">• To conduct specialized training for selected medical staff and make arrangements to prepare selected medical facilities across the country to handle radiation emergencies involving irradiated and/or contaminated patients• To pursue the development of standard operating procedures and technical guidelines for all the stakeholders involved in EMP and to test them accordingly in operational/tactical exercises	<ul style="list-style-type: none">• Conduct Emergency Simulation Exercise on selected scenarios and update the Emergency Plan accordingly• Develop facilities in selected medical institutions to handle radiation emergencies involving irradiated and/or contaminated patients.
Chemical Agents <ul style="list-style-type: none">• Establish an apex body for overall management of chemicals• Strengthen the laboratory facilities to identify components of used chemical• Establish a system for chemical accidents surveillance	CE: Chemical Events <ul style="list-style-type: none">• To establish an apex body for management of chemicals events throughout its lifecycle• Surveillance for chemical events to be strengthened especially for notification and dissemination information for action	<ul style="list-style-type: none">• Establish an apex body for management of chemicals events throughout its life cycle• Establish a functional surveillance system for chemical events in stepwise manner

Linking risk profile to NAPHS: applying risk profile to capacity planning



Risk calendar



Risk matrix

Key actions & recommendations

Hazard	Priority Action	Responsible	Stakeholders	Geographic Areas(s)	Justification
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- Health consequences
- Coping capacity

- Geographic areas
- Likelihood
- Vulnerability



OPERATIONAL PLAN				Prioritization		
Activity ID	Source	Detailed activity description	Activity Type	Risk and readiness specific		
				risk-specific	Risk level	
				Feasibility	Impact	Priority

e-NAPHS excel sheet

Reviewed each proposed operational action in terms of relevance to risk profile/risk level during NAPHS workshop through e_NAPHS platform and prioritized accordingly

- Risk profile considered for risk-informed IHR-based capacity-building, including:
- Operational NAPHS 2024-2025
 - Strategic NAPHS 2024-2028

Thank you

