

Coalition for Disaster Resilient Infrastructure

October 2022

About CDRI



Launched at the
UN Climate
Action Summit on
23 September
2019



Based in New Delhi,
CDRI was recognized
as an **International
Organization** on
22 August 2022

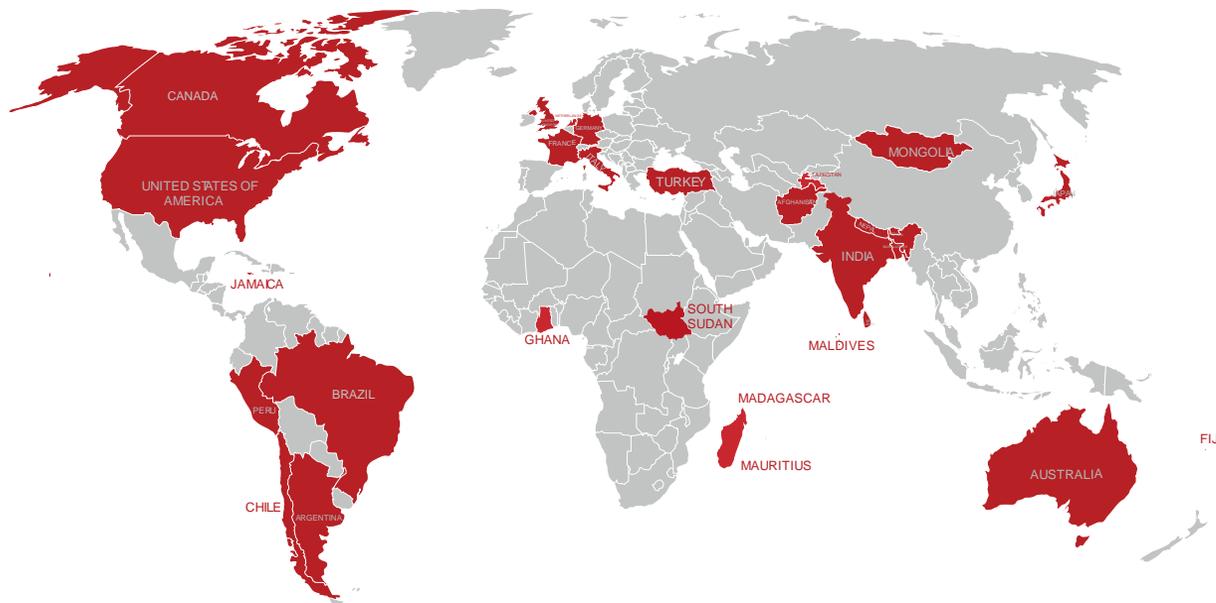


- Multi-stakeholder partnership of national governments, UN agencies and programmes, multilateral development banks and financing mechanisms, the private sector and knowledge institutions
- Provide a forum for countries at all stages of development — to access knowledge and resources from other members, to make their infrastructure resilient and thus, contribute to each other's economic growth and progress

CDRI Membership



Member Countries



Member Organisations

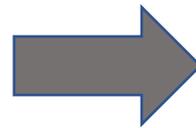


As on **September 2022**

US\$80 Trillion to be invested in infrastructure in the next 15 years

Challenges

- Accentuated climate and disaster risks to people and infrastructure
- Rapid urbanization and population increase
- Increasing demand and significant transitions in critical sectors
- Interdependencies

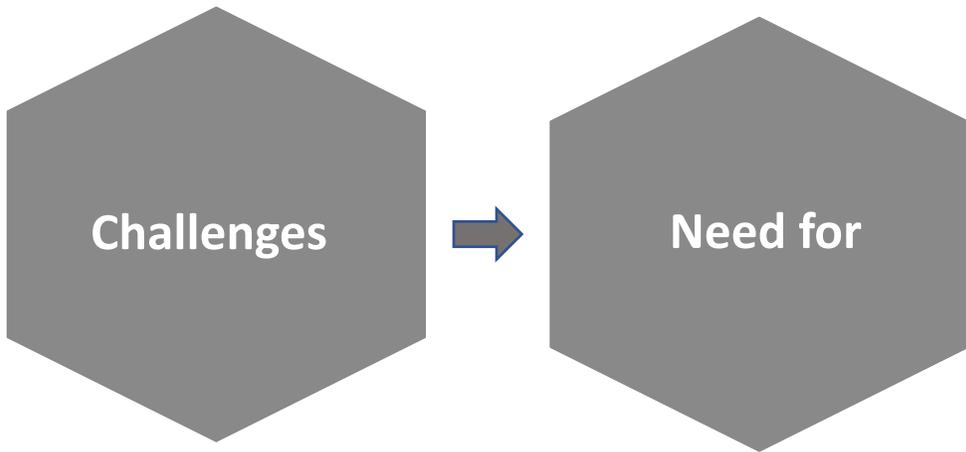


Need for

- Integrated, inclusive planning and investment in sustainable infrastructure
- Sustainable infrastructure - social, ecological and grey/physical infrastructures
- Climate-resilient critical infrastructure development – energy, transport, telecom

Infrastructure- A Priority for Adaptation

US\$80 Trillion to be invested in infrastructure in the next 15 years



79% of all greenhouse gas emissions & 88% of total adaptation cost attributed to infrastructure (UN, 2021)

Low and middle-income countries -US\$ 4 return on every US\$ 1 spent on future-focused resilient infrastructure (UN, 2021)

Resilient and climate-compatible infrastructure development will strengthen climate adaptation, DRR, and sustainability agenda – Paris Accord, SDGs, SFDRR

Important to consider climate risks & adaptation plans in infrastructure planning process

Policy shift, technologies and innovation, knowledge and capacities, and sustainable finance is critical

Aim to address the challenges of building resilience into infrastructure systems and associated development

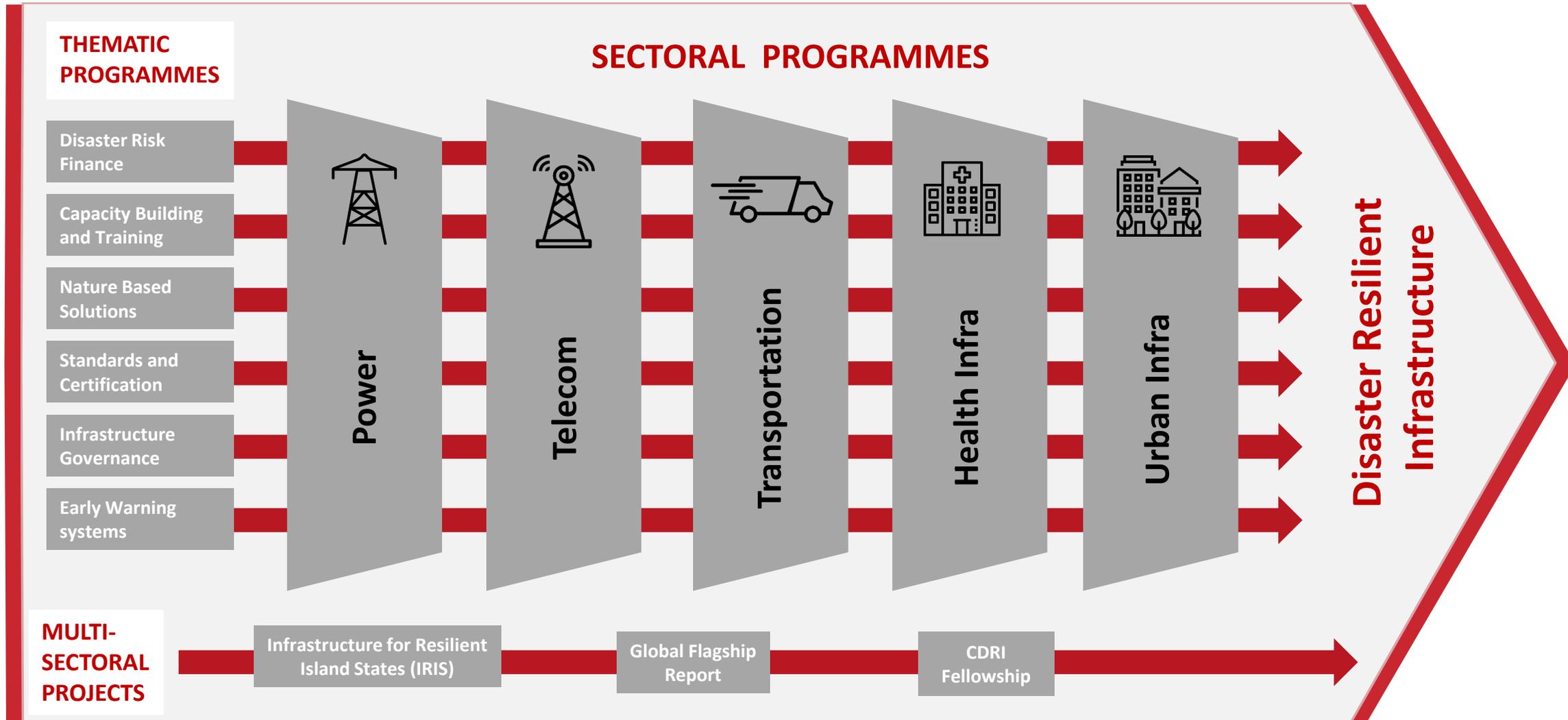
Delivers on the climate adaptation agenda through an infrastructure resilience perspective

Engages with member countries through research, knowledge management and advocacy initiatives to deliver the global climate goals

Mainstreams resilience principles in sector wide policies, processes and practices across different stakeholder groups through well defined sectoral focus and thematic areas.

Promotes economic, social and climatic well being of societies through climate and disaster resilient infrastructure

CDRI Programme Approach



Pillars of Biennial Report on Infrastructure Resilience

1 Global Infrastructure Risk Model (GIRM)

8 components

2 Global Infrastructure Resilience Index (GIRI)

3 components

3 Nature-based Solutions

Thematic focus on Nature-based Solutions in First Edition

4 Progress Monitoring

Progress monitoring towards meeting global goals

5 Financing Infrastructure Resilience

Focus on building the financial and economic case for resilience in infrastructure

Key Components and Outputs of Biennial Report

Pillar 1

Global Infrastructure Risk Model

Global Infrastructure Exposure Model

Vulnerability Functions

Update of GAR buildings exposure model

Landslide **hazard** model

Flood and hydrological drought **hazard** model

Tropical cyclone **hazard** model

Multi-hazard risk modelling

National Resilience Studies

Pillar 2

Global Infrastructure Resilience Index

Infrastructure Resilience Index

Open-source data platform for resilience assessment by countries

Global Infrastructure Resilience Survey (GIRS)

Pillar 3

Nature-based Solutions

Thematic focus on **Nature-based Solutions** in First Edition

Pillar 4

Progress Monitoring

Baseline of infrastructure risk and resilience metrics

Progress monitoring towards meeting global goals

Pillar 5

Financing Infrastructure Resilience

Focus on building the **financial case for resilience** in infrastructure

GOAL: To achieve sustainable development in SIDS through a systematic approach towards resilient, sustainable and inclusive infrastructure



**First Call for Proposal at
COP27**

- Outcome 1: Increase resilience of SIDS infrastructure to climate change and disaster risks
- Outcome 2: Strengthen knowledge and partnerships for integrating resilience in SIDS infrastructure
- Outcome 3: Promote gender equality, disability inclusion and social inclusion through resilient SIDS infrastructure
- Hosted at CDRI Secretariat
- Geographic coverage: Pacific, Caribbean, Atlantic and the Indian Ocean SIDS
- Physical presence in different SIDS through regional hubs
- Hubs to be co-located within existing regional organizations /facilities

Infrastructure for Resilient Island States



Donors and Partners



Infrastructure for Resilient Island States



SIDS representatives and stakeholders



Aim

Higher education **students and professionals** across various countries in the world have **access to** a supportive learning ecosystem **to enable them to champion disaster and climate resilience of infrastructure** in their home country and the region.

Objectives

- › To **ensure availability/ access to** Doctoral / masters / elective / Professional development courses on DRI
- › To **foster collaborations with government department and private organizations** for supporting students with scholarships and immersive learning opportunities through internships and industry placements
- › To contribute to **ongoing knowledge creation through action -based learning** in real situations by way of infrastructure resilience labs.

Strategic Approach

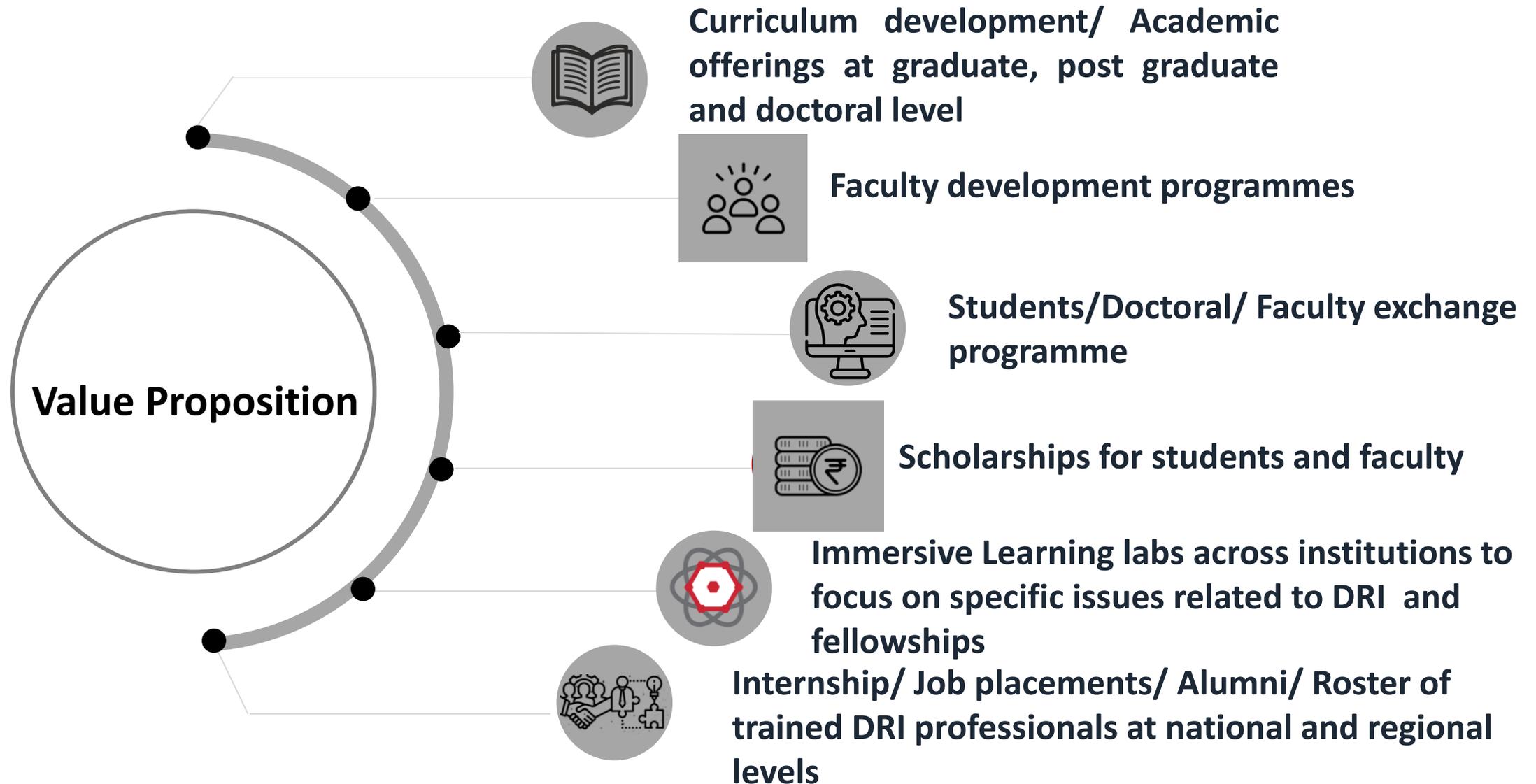
Engagement with **diverse stakeholders**

Focus on **trans-disciplinarity**

Promote **inclusion**

Foster **global collaboration**







- Greater frequency and severity of natural hazards and climate-induced weather events are creating disruptions in the global supply chain.
- World economy is set to lose up to 18% GDP from climate change if no action is taken (3.2°C increase) by 2050 and 4% if Paris Agreement targets are met (below 2°C increase)
- The world is highly interdependent for resources and services and the major share of global supply chain and trade is through infrastructure such as maritime and aviation.
- The value of global trade reached USD 28.5 trillion in 2021 with maritime trade accounting to 80% of international trade volume.
- Infrastructure needs to be resilient to damages and disruptions to reduce the stress on operations, supply and value chain, inflation, food security, use of construction materials and capex investments, and return on investment.

Charting Infrastructure Pathways for Climate Adaptation and Resilience



Infrastructure will be a key component of the climate adaptation and financing agenda. CDRI is being uniquely positioned, with the leadership of India, to leverage action on this critical agenda that has the potential for widespread impact globally.



Adoption of the Global Goal on Adaptation at COP26 (Glasgow), further positions resilience to climate change and its impacts as a critical pathway for attaining sustainable development with infrastructure resilience potentially playing a pivotal role.



CDRI will proffer technical assistance solutions, knowledge repository and policy engagement to strengthen capabilities of governments to undertake their adaptation agenda with a focus on making infrastructure systems resilient.

THANK YOU