

Climate Centre for Cities

Building Climate Actions in Indian Cities



01

P4 Support

Provide Policy, Planning, Program and Project development support to incorporate climate change considerations in land use planning, master planning, housing and urban development, in addition to implementing demonstrative local climate actions and supporting the national program related to climate change.



02

Research & Knowledge Management

Conduct research and develop knowledge products to inform relevant climate interventions in urban development.



03

Technology, Data Solutions & Innovations

Create opportunities for solution providers to innovate, create tools and methods, and to incorporate data analytics to support informed decision making in addressing climate challenges in cities.



04

Capacity Building

Develop capacity amongst urban practitioners and public officials to understand and apply a climate change perspective to projects and decisions aimed at reducing future risks and enhancing urban resilience.



05

Advocacy & Communications

Develop communication materials to inform and influence public and private sector decision-makers at the city, state and national levels.



06

Partnerships

Build national and global partnerships that can complement and support MoHUA and C-Cube in advocacy, knowledge management, capacity building, innovation, and financing to address the increasing climate risks in Indian cities.

ClimateSmart Cities Alliance

The ClimateSmart Cities Alliance is intended to bring together the diverse skills, strengths and resources available across various organizations working with Indian cities to complement and scale the efforts towards mobilising advocacy, knowledge sharing, capacity building, innovation, and resources to address climate risks.

Starting with 26 member organisations that contributed to development of the CSCAF 1.0, the Alliance continues to play a key role in driving the climate smart cities discourse, including implementation and review of the CSCAF. In June 2020, the Climate Centre for Cities (C-Cube) was given the mandate to manage the Alliance Secretariat and further strengthen the Alliance as a national level multi-stakeholder partnership to facilitate and build urban climate action in India. As of January, 2021, the Alliance has over 50 partner organizations including international agencies and networks, donors, (I)NGOs, private sector organizations, rating agencies, data and technology firms, incubators, etc. Of these, 25 partner organisations provided on-ground handholding and data collection support to cities in implementing the CSCAF 2.0. The general terms of reference for Alliance Members include, and are not limited

to:

- Providing technical and financial support, sharing tools & toolkits, innovation, proofs-of-concept and good practices to facilitate implementation of pilots and projects in cities
- Support/ collaborate with C-Cube to bring in knowledge and resources for strengthening capacities of ULBs/ Smart City SPVs and scale up transformative actions

As Alliance Secretariat, C-Cube facilitates network engagement – Partner to Partner, Partner to City and City to City – to enable knowledge sharing, P4 (policy, planning, program and project) support, peer learning and engagement. As a way forward to CSCAF 2.0 evaluation, C-Cube will conduct a needs mapping for the 126 cities and provide them with network support for accessing technical, financial and project implementation assistance towards improving their performance. C-Cube will also continue to facilitate training and handholding support to cities on-ground for the subsequent phases of CSCAF evaluation.

How cities can benefit from the Alliance

- Seek strategic support for performance improvement on CSCAF indicators and meeting national and international targets on ease of living, climate action and sustainable development
- Access technical assistance for development of city level strategies, action plans, projects (DPRs) and procurement (ToRs, tenders, etc.) for climate-smart development
- Access cutting-edge research, technology, innovative solutions, proofs-of-concepts, use cases for implementation of pilots
- Access tools & toolkits, training, capacity building and handholding support for strengthening institutional capacities and business processes for climate-informed decision-making
- Peer-to-peer learning and engagement with cities in India and beyond
- Showcase pioneering initiatives and participate in national and international events, platforms, challenges, awards and project proposals



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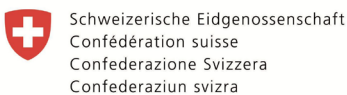
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Building climate capacities in the cities

For mainstreaming climate actions, cities require a detailed understanding of their baseline GHG emissions, climate related risks emerging from hydro-meteorological hazards and vulnerabilities. While city administrations are actively focussing on development to cater to the growing urban population, they sometimes lack the capacity to undertake relevant climate measures. Being at the crossroads of urban transformation, cities have an unique opportunity to cater to sustainable and resilient development. With this intent, the Climate Centre for Cities is in the process of undertaking several initiatives to help build conceptual, technical, administrative and innovation capacities across key areas of ULBs.



Dedicated trainings aligning to CSCAF indicators

Technical know-how to progress across CSCAF

Dedicated technical training for all the CSCAF indicators are being developed in association with experts and climate alliance partners to enable cities progress across their indicators of choice over time. Training for flood management, water conservation, preserving open areas and biodiversity, increasing green cover, management of construction and demolition waste have already been provided till date. In addition to city representatives, trainings were also provided to trainers from regional training institutions through the National Urban Learning Platform (NULP) to enable ease of access and scaling up of such trainings beyond. Regular training to cities in partnership with regional institutions across all indicators are planned.



Master class

Fostering peer to peer learning

In addition to building technical capacities, understanding the processes involved in administrative decision-making taking into consideration the operational and financial feasibility are crucial. Master classes focus on bridging this gap by providing a platform for senior city administrative officials and decision makers to share their experience around mainstreaming city actions with officials from other cities. The first master class was conducted in February, 2021 by the CEO of Indore Smart City and provided details on the processes required for cities towards generating additional revenue from carbon credits. Moving forward, C-Cube plans to organize a master class every month to showcase the journey of decision makers and what it takes to foster climate actions in Indian cities.



E-learning series

For cities to improve climate actions

The e-learning series targetting city officials will focus on the governance and management processes required for addressing climate challenges. Aligning to the themes of CSCAF, the series will bring thematic experts and city officials to discuss the best practices in conserving biodiversity, rejuvenation of freshwater ecosystems, developing city climate action plans and implementing nature based solutions. The e-learning series is conceptualized in association with WRI India and intends to demonstrate the benefit of cross-sectoral and multi-institutional collaborations for implementing climate actions.



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Indian cities are beginning to understand the high cost of climate change and the need for climate mitigation and adaptation. Building capacities to plan and implement climate-smart measures is crucial for successfully addressing climate risks. The holistic approach of CSCAF inherently guides cities with the way forward and can help in identifying capacity gaps that need to be addressed for building effective climate actions.



Understanding the Future Podcast to advance innovative climate measures

Focussing on successful innovations at the intersection of sustainability, climate change and urban development, the podcast provides a platform for practitioners from both public and private sectors to provide their perspectives on the future of cities grounded on current innovation and their interventions at macro and micro scales. The podcast reveals the aspects of 'how to do it' with an intent to support urban professionals and urban managers in implementing such innovations in their cities. A total of 13 podcasts have been conducted in season one.



Chat for Change Webinar series for conceptual orientation

The webinar series titled, 'chat for change' brings national and international climate experts who share experiences, insights and good practice examples with urban professionals, city officials and decision makers. The focus of this webinar series is targetted towards strengthening local capacities for reducing GHG emissions, improving air quality, bringing efficiency in water and waste management, and safeguarding green cover and biodiversity. So far, 8 webinars have been conducted.



ClimateSmart Cities - Self Assessment Tool Tool to assess GHG emissions

The ClimateSmart Cities – Self Assessment Tool (CSC – SA Tool, developed by GIZ) is an excel-based emissions assessment tool that is aligned with the CSCAF. The tool follows the 'Global Protocol for Community-Scale Greenhouse Gas Emission Inventories' (GPC) to estimate indicator-wise GHG emissions. The intent is to highlight the mitigation potential that cities can prioritise for adopting interventions aligned to the CSCAF indicators. Based on the emission numbers, the tool provides recommendation to cities for focusing actions and prioritising relevant sectors and indicators. The tool is available at <https://www.niua.org/csc/index.html>

I Supporting Data and Innovation



Climate data observatory **Enabling data informed decision making**

Given the myriad challenges of rapid urbanization being experienced by Indian cities, it is necessary for cities to shift towards data-informed decision making. The significance of data collection, correlations and data visualization is key for promoting evidence-based approaches. With this intent, a common platform for cities, solution providers, institutions, and partners has been developed.

The observatory will help cities and solution providers to visualize and analyze the performance of cities and potential areas for action. It will act as a platform to host both spatial and non-spatial data for decision makers based on evidences from the cities.

With data insights giving a greater picture of resources, capabilities, and aspirations, cities will be able to position themselves effectively to strategize and augment their abilities to access the support provided by the state, national government and global organizations for mainstreaming climate actions.



Innovation Facilitation Centre **Fostering urban innovation**

Innovations can greatly benefit cities in addressing urbanization and climate related challenges in an optimal manner using limited resources. The central government has actively encouraged start-ups to support urban innovation and some cities have also witnessed improved management of service delivery from the innovation developed by start-ups. To strengthen the urban innovation ecosystem to develop sustainable, resilient and inclusive cities, an Innovation Facilitation Centre (IFC) will be established within C-Cube.

The IFC will work in a systematic manner to map city challenges and provide training to innovators. IFC will leverage the outcomes of the CSCAF 2.0, Climate Data Observatory, National Urban Learning Platform and the Climate Alliance to connect innovators with the cities. Training for start-ups on urban climate challenges and city administrative processes will enable them in aligning their innovation to better meet the needs of city administration for upscaling.

In association with the Future Cities Catapult, 12 start-ups from India and the UK were provided strategic training on city engagement during 2020 and similar engagement with more start-ups from India are planned.

Grounding Climate Actions

One of the key objectives of the CSCAF is to enable cities to adopt a climate-sensitive approach to urban planning and development besides regularly monitoring their progress on the same. To that end, the following 4 cross-cutting areas of interventions will be undertaken:



Convergence with national and international programs and initiatives

Leveraging national and international programs and initiatives on urban climate action and sustainable development can go a long way in availing the required technical resources and gap funding. For instance, the National Mission on Sustainable Habitat provides the overall guidance framework to undertake actions on various thematic areas as identified under the CSCAF. At the same time, the Jal Jeevan Mission (U), Swachh Bharat Mission (U) and AMRUT provide technical as well as financial resources for implementation of initiatives on water management, sanitation, sewage and solid waste management. The recently released 15th Finance Commission Report provides an overall outlay of more than INR 1.21 lakh crores for cities to undertake actions on ambient air quality, water supply, sanitation and solid waste management. Convergence with these programs can help cities in implementing and building on proposed and current initiatives.

At the international level, inter-governmental programs such as the Global Environment Facility (GEF) and international network initiatives such as the Resilient Cities Network, Global Covenant of Mayors, International Urban and Regional Cooperation, and the Coalition for Disaster Resilient Infrastructure are also providing support for building climate and disaster resilience of Indian cities. Interested ULBs/ Smart City SPVs may seek support from C-Cube to align with the same.



Engagement with States

Engagement with the states is crucial to build climate actions in the cities, especially to enhance efficiency and coordination among various stakeholders, and to further streamline the process in other cities. In view of this, several states in India have established climate change cells to assist in the preparation of the State Action Plan on Climate Change (SAPCC) and to monitor its progress.

C-Cube aims to scale up this initiative to all the states and act as a facilitator to enhance state level collaboration for synergistic climate actions. The key focus of engagement with the states will be regarding data informed decision making and building capacities. In this context, identifying existing institutions, analysing their institutional capacity, expertise, financial & human resources are the next steps to assess the functions and scope of the state level institutions for ensuring climate actions.

In order for such institutions to be fully empowered to discharge their roles, they must be equipped with the essential legal sanction, well-defined mandate supported with a pool of expertise drawn from diverse backgrounds inter alia; state government officials, research institutions/think tanks, private sector, civil societies, etc. This will ensure that these centres have necessary institutional capacity and budgetary allocation for an efficient implementation of climate actions.

An area of engagement with the states is in the field of data sharing across different sectors and departments for developing effective climate actions in the cities. The CSCAF 2.0 provides valuable data on the status of cities, their contributions to overall GHG emissions from various sectors and highlights major gaps in climate actions besides underscoring the priority

sectors which require urgent attention. There is potential to update the SAPCC to prepare more comprehensive climate action plans by augmenting the various sectoral strategies pertaining to energy & green building promotion & adoption, mobility, air quality, water management, waste management, urban planning & green cover in the urban sector. Further, data relating to hazard vulnerability mapping of urban socio-economic systems from the CSCAF could assist in preparing robust State Disaster Management Plans (SDMPs).

The other area of engagement with the states is in the field of capacity building and resource mobilization for building climate actions. Various training provided to ULB officials as a part of the CSCAF enables them to participate and contribute to developing climate resilient actions for the urban sector. States could set up climate change cells and strengthen existing cells to build institutional capacity to address climate change with relevant and contextual solutions. Well informed state and city administrators would be sensitive to the need for mainstreaming climate change aspects in the city development plan and its effective implementation and monitoring.



Mainstreaming in city level initiatives, institutional and governance framework

Addressing climate risks in city development agenda, including master plans, local area plans, infrastructure development projects and municipal budgets is the first step towards enabling local action. Cities may refer to the recommendations enlisted in their respective City Diagnostic Reports for the same and seek required technical and financial support from the Ministry and the Climate Alliance through C-Cube.

Besides, establishing supporting institutional and governance structures it is equally important for ensuring implementation of the plans and projects. ULBs/ Smart City SPVs should constitute the city climate cells, advisory committees and other institutional structures as prescribed under various guidelines and regulations, and recommended by this report under various thematic chapters. These should include representation from governmental organizations; private sector; academia, and civil society organizations and local community. C-Cube has also established a network of 'Climate Practitioners' to provide on-ground support to ULBs/ Smart City SPVs. Cities are recommended to seek overall guidance, advisory/assistance and work in close collaboration with these expert/ advisory committees and practitioners. Appointing a nodal person within the climate cell is recommended to convene stakeholders and coordinate inter-departmental initiatives.

As cities are collecting large amount of data through various assessments viz. CSCAF, Ease of Living, Swachh Survekshan and the Integrated Command and Control Centres (ICCCs), it becomes crucial to manage this data and make it accessible to various development agencies to inform decision-making processes. To that end, C-Cube is developing use-cases to help cities in implementing digital solutions and urban observatories within the ICCCs for data-driven climate action planning. Cities are recommended to seek assistance from C-Cube on the same.



Scaling initiatives by Alliance members/ partners organisations

Many ClimateSmart Cities Alliance members and partner organisations are supporting city level risk assessments, capacity building programs, formulation and implementation of interventions and pilot projects across urban India. These initiatives are currently being implemented by partners with support from MoHUA and C-Cube, NIUA.

Learnings from such initiatives can help cities in informing their development projects. Furthermore, a closer collaboration with non-state actors at the local level will help in scaling these pilots for transformative action. Cities are encouraged to seek support from C-Cube to facilitate this process.



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