



India: NAPCC Process Country Case Study

This Country Case Study was developed as part of a series on the national adaptation planning (NAP) process in selected countries. The purpose of the series is to provide an update on the current NAP process, showing first lessons learned and giving an outlook on the next steps to be taken in the iterative NAP process, considering how it contributes to reaching the countries' adaptation goals. In the case of India, there is no NAP process in the narrow sense. Rather, national adaptation goals are addressed under the National Action Plan for Climate Change (NAPCC) with respective state-specific State Action Plans on Climate Change (SAPCC).

Climate risks in India

India has been ranked as the most vulnerable country to climate change in 2018¹, not only because of its physical exposure to climate-related disasters, but also due to the economic dependency of a high percentage of its population on climate-sensitive sectors. Especially extreme weather events continue to hit India more frequently, preventing a full recovery for affected locations and people. The most common extreme weather events in India are heatwaves and changing rainfall patterns leading to floods and droughts. 65% of India's landscape is drought prone, 12% is flood prone, and 8% is susceptible to cyclones².

Furthermore, more than half of India's population lives in rural areas and relies on climate sensitive sec-

tors to secure their livelihoods, such as agriculture, forestry, tourism, animal husbandry and fisheries³. The poorest and most vulnerable social groups – primarily women and children – are expected to suffer the greatest consequences of these threats to economic sustainability.

India's energy supply mix is largely dependent on hydropower and thermal power generation, which depend on a steady water supply. A failed or delayed adaptation can lead in both cases to failing energy and water security for a demanding and fast-growing population.

In order to promote pro poor climate resilient development and inclusive growth that simultaneously advances economic and environmental objectives, India developed a **National Action Plan for Climate Change (NAPCC)**. Furthermore, to address regional and state specific climate risks, **state-specific State Action Plans**

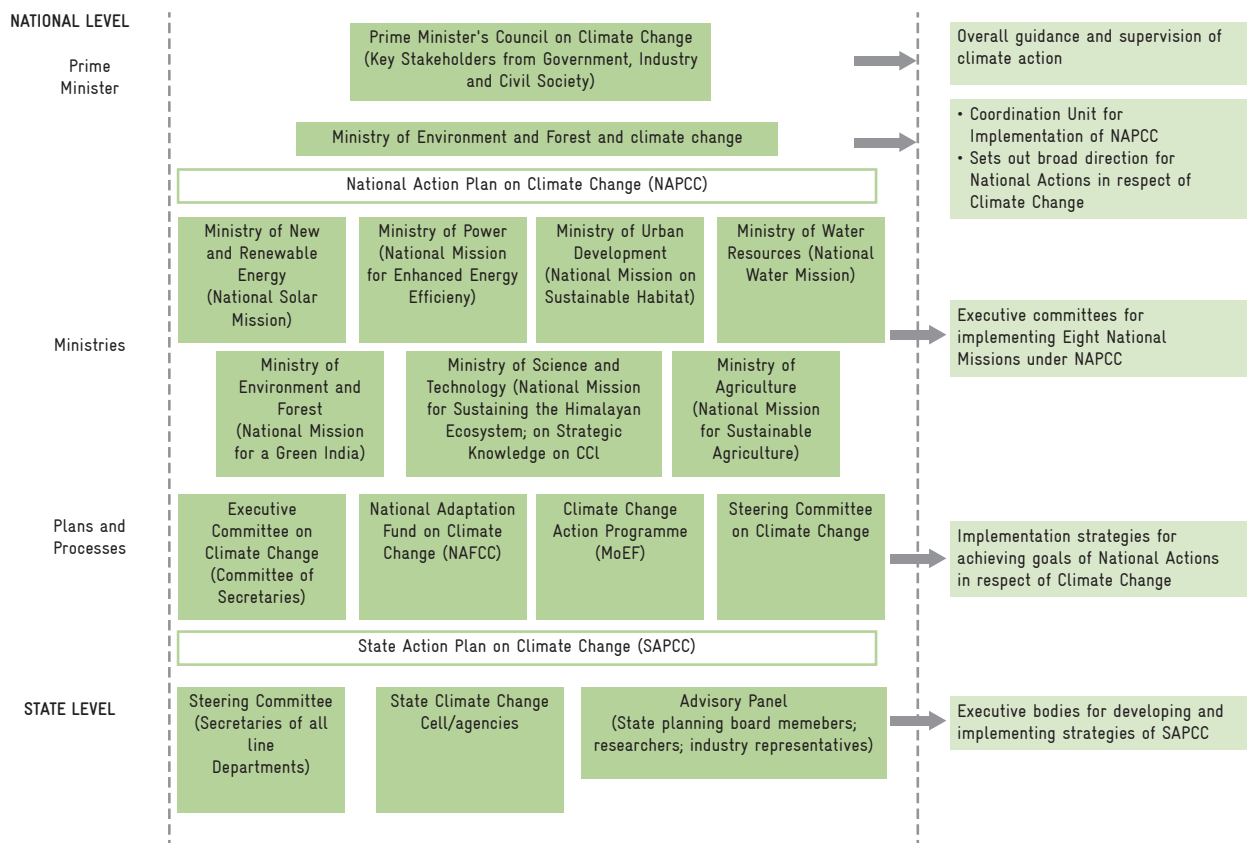
¹ World Economic Forum. www.weforum.org/agenda/2018/03/india-most-vulnerable-country-to-climate-change Published March 2018. Accessed March 2019.

² United Nations Development Programme. www.adaptation-undp.org/sites/default/files/downloads/undp-alm-casestudy_india_oct2012.pdf. Accessed March 2019.

³ Government of India 2016 www4.unfccc.int/sites/NDCStaging/pages/Party.aspx?party=IND. Accessed March 2019.

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Climate Governance Structure



on Climate Change (SAPCC) were developed with a primary focus on adaptation.

Governance structure for adaptation to climate change



The **Prime Minister's Council on Climate Change** is the apex body providing guidance and supervision to climate action in India. The **Ministry of Environment, Forest and Climate Change**

(**MoEFCC**) functions as the lead institution responsible for coordinating climate change at international, national and state level. The MoEFCC plays a key role in the NDC implementation process. It is the National Designated Authority for the **Green Climate Fund**, and serves as nodal agency for the **United Nations Environment Programme** as well as for the follow-up of the United Nations Conference on Environment and Development. The MoEFCC acts as focal point for the **Commission on Sustainable Development** and the **Global Environment Facility**. MoEFCC is also responsible for the National Adaptation Fund on Climate Change.

The MoEFCC is responsible for the overall coordination of the NAPCC. There are different National Missions

under the NAPCC with sectoral and thematic foci. Each mission is institutionalized within respective line ministries. The Prime Minister's Council is responsible for periodically reviewing and reporting on each mission's progress. The missions are organized through an inter-ministerial executive committee on climate change under the Prime Minister's Council. At the State level, the **State Action Plan on Climate Change (SAPCC)** is implemented by the state governments and union territories through identified executive bodies.

Adaptation Policy Framework

Adaptation planning efforts in the country have become a key component of India's National and International development agenda. Under the Paris Agreement, India has submitted its Nationally Determined Contribution (NDC) to the UNFCCC. Although the quantifiable targets are mitigation-based, such as the reduction of emission intensity of its Gross Domestic Product (GDP) by 33 to 35% by 2030 from the 2005 level and creation of additional carbon sinks of 2.5 to 3 billion tonnes of CO₂ equivalent through additional forest and tree cover by 2030, adaptation does feature prominently in the NDC. The NDC adaptation goals notably pertain to sustainable lifestyles, climate friendly growth paths,

climate change adaptation, climate change finance and capacity building and technology. On adaptation, the NDC specifically states the need to better adapt to climate change by enhancing investments in development programmes in sectors vulnerable to climate change, particularly agriculture, water resources, coastal regions as well as health and disaster management. The Himalayan region is explicitly mentioned as a focus region.

India's key national priorities and the development strategies are inextricably linked to the SDG targets. India has several flagship programmes on issues like poverty, sustainable growth, health, nutrition, gender equality and quality education, among several others, which highlights India's commitment of leaving no one behind in the context of sustainable development.



The Government of India developed the **National Action Plan on Climate Change (NAPCC)** in June 2008. It is the framework for the Union and State government to address the challenges of climate change.

The NAPCC identifies measures that promote India's development objectives while also yielding co-benefits for addressing climate change effectively. It outlines a number of steps to simultaneously advance India's development and climate change-related objectives of adaptation and mitigation. The NAPCC identifies eight National Missions, which form the core of the National Action Plan, out of which five missions are focusing on adaptation (see box 1).

NAPCC and SAPCC Process

NDC	PA ratified	Yes, 02.10.2016
	NDC submitted	Yes, 02.10.2016
	Adaptation component in NDC	Yes
	Reference to NAP	Yes, reference to both NAPCC and SAPCC
NAPCC	NAPCC process initiated in	06.2008
	Timeframe for implementation	Differing timeframes for SAPCCs
	Responsible institution	Prime Minister's Council on Climate Change
	Current status	Various programmes being drafted/implemented under the missions
	Financing	Available under respective National Missions
	Scope of NAPCC document	Sector and region-specific adaptation and mitigation strategies of each ministry on eight critical areas (solar energy, energy efficiency, sustainable habitat, water, Himalayan ecosystem, reforestation, sustainable agriculture, CC knowledge)
	Reference to NDC	No, as NAPCC developed prior to NDC. However, strong linkages, with similar prioritised sectors Strong linkage, with similar prioritised sectors
SAPCC	SAPCC process initiated in	08.2009
	Timeframe for implementation	Provides for short, medium and long-term strategies for climate action
	Responsible Institution	Ministry for Environment, Forestry and Climate Change (MoEFCC) for coordination, state nodal climate change department/agencies for development and implementation
	Current status	32 (out of 36) SAPCC have been endorsed by the National Steering Committee on Climate Change. SAPCCs are being revised to align with NDC
	Financing	No dedicated financing available for SAPCC For pilot projects under SAPCC financing available through National Adaptation Fund on Climate Change (NAFCC)
	Scope of SAPCC document	State-specific adaptation and mitigation measures in regard to Climate Change (Climate Change Action Plans)
	Reference to NDC	No, as SAPCCs started prior to NDC. Currently under revision for alignment with the NDC.

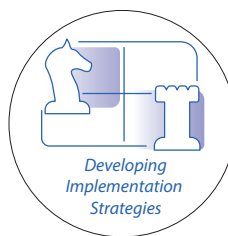
Box 1 Core Missions formulated under the NAPCC

1. **National Water Mission:** The goal is to ensure integrated water resource management systems helping to conserve water, minimize wastage and ensure more equitable distribution both across and within states.
2. **Mission for Sustaining the Himalayan Ecosystem:** The goal is to evolve management measures for sustaining and safeguarding the Himalayan glacier and mountain ecosystem, as well as establishing an observational and monitoring network for the Himalayan environment.
3. **National Mission for a Green India:** The goal is to enhance ecosystem services including carbon sinks to be called Green India, giving special importance on reforestation and afforestation.
4. **National Mission for Sustainable Agriculture:** The goal is to devise strategies to make Indian agriculture more resilient to climate change by investing in new technologies, integrating traditional knowledge, and employing new credit and insurance mechanisms.
5. **National Mission on Strategic Knowledge for Climate Change:** The goal is to identify the challenges of, and the responses to, climate change through a global exchange in research and technology development.

In order to operationalize NAPCC at the state level, in 2009, the Prime Minister's Council on Climate Change furthermore introduced the **State Action Plans on Climate Change (SAPCC)**. Addressing responses to both climate change mitigation and adaptation, states in India have successfully engaged in creating a policy framework half way between the national policy level and realities on the ground of districts, cities and villages. The formulation of SAPCCs is therefore an important milestone in developing domestic policies around climate change in India. This action also represents a pro-active stance from the Government of India in decentralizing the efforts towards climate change actions. SAPCCs describe in detail the climate change impacts and vulnerability assessments, adaptation and mitigation options as well as financing and capacity building needs to implement the identified interventions. Key sectors covered by SAPCCs include amongst others agriculture, water, habitat, forestry, health and disaster management. Considering that climate change is still a nascent subject, these plans have been kept evolutionary in nature. The updating of these plans provides entry points for the incorporation of newer developments, both in climate science and socio-economic equation resulting from climate change SAPCCs by and large have followed guidance

from National Government. The National Action Plan on Climate Change (NAPCC, 2008) emphasizes on adopting a 'co-benefit' approach taking measures that promote development objectives while also yielding additional benefits for climate change effectively. The institutional setting of the process to create SAPCC has ensured the involvement of Principal Secretaries of the line departments and a final approval by the Chief Secretary of the state. India's NDC refers to the NAPCC as providing a sharper focus on required interventions and the SAPCC as instrument to mainstream climate change concerns at state level.

Alignment to other national policies and mainstreaming



The broad policy framework on environment and climate change is laid down by the **National Environment Policy (NEP)** of 2006, which promotes sustainable development along with respect for ecological constraints and the imperatives of social justice.

India is implementing several schemes on organic farming, efficient irrigation systems, watershed management, soil health and climate resilient agriculture that supplement the adaptation efforts. The **National Policy for Farmers** focuses on sustainable development of agriculture. The **National Agroforestry Policy (NAP)** deals with problems faced by agroforestry sector, including adverse policies, weak markets and a scarcity of institutional finance. The **Pradhan Mantri Krishi Sinchayee Yojana (PMKSY)** has been formulated with the vision of extending the coverage of irrigation and improving water use efficiency 'More crop per drop' in a focused manner with end to end solution on source creation, distribution, management, field application and extension activities. Under the **National Watershed Development Programme**, the Department of Land Resources in the Ministry of Rural Development is administering three area-based watershed programmes for development of wastelands/degraded lands namely Drought Prone Areas Programmes (DPAP), Desert Development Programme (DDP) and Integrated Wastelands Development Programme (IWDP) to check the diminishing productivity of wasteland and loss of natural resources. **Neeranchal** is another programme by Government to give additional focus to

watershed development. Another noteworthy policy is the **Mahatma Gandhi National Rural Employment Guarantee Act 2005 (MGNREGA)**, which seeks to improve the rural infrastructure, augment land and water resources, and strengthen the livelihood resource base of the rural poor by providing at least one hundred days of guaranteed wage employment in a financial year to every household.

The effort to mainstream climate change adaptation by making it part of national development planning in India is at the early stages. A robust process of mainstreaming climate change actions into the development process is essential and must involve multi-stakeholders to achieve sustainable development and pro-poor economic growth. The NAPCC and SAPCCs serve as the guiding documents for mainstreaming climate change concerns in sectoral plans and policies both at national and state level. GIZ is working with state nodal agencies on approaches for mainstreaming climate change into policies and programmes at subnational level while demonstrating ways to implement SAPCC priorities. GIZ's multi-pronged approach for facilitating policy guidance aims to create an enabling environment to promote climate action. This includes human and institutional capacity development, climate proofing of sectoral policies, evidence-based adaptation planning, climate finance readiness and promoting climate-friendly technology. The approach builds on three guiding components: 1) finding the entry points and making the case; 2) understanding implementation challenges by piloting the case; and 3) advocacy for mainstreaming climate action into policy processes. A key focus of GIZ's approach is stakeholder engagement that occurs throughout – from inception through to implementation, monitoring, and policy advocacy and outreach.

At the national level, GIZ India has been working on the aspects of adaptation to climate change with the Ministry of Environment, Forest and Climate Change (MoEFCC), Government of India (focal point for climate change issues in India) since 2009. Some of the priority issues of this collaboration are development and operationalization of SAPCCs, adaptation financing, loss and damage (L&D), and monitoring and evaluation (M&E) of climate change adaptation measures. At state level, GIZ is working on SAPCCs with key actors on various aspects, such as supporting preparation,

strengthening and implementation of SAPCCs, demonstrating approaches to mainstream climate change adaptation and mitigation into the local development planning process, and capacity development.

Results of the NAPCC and SAPCC process and country – specific lessons learned

- **SAPCC as a guiding document for climate action** at the sub-national level has the potential for multi-stakeholder engagement, providing advisory role to line departments in developing and prioritizing sectoral adaptation strategies, facilitate convergence at the district level by integrating climate change into district planning process, **generating awareness and facilitate access to climate finance from national and international sources.**
- It is crucial to **downscale SAPCCs to district level and develop comprehensive district level plans** with a robust strategy for managing climate related risks.
- **Prioritizing** sectors and actions; **strengthening capacities** at all levels of government, meaningful **participation** of sector representatives, including civil society, private sector and academia, improving the science basis, and **monitoring** impacts are the key steps for states to implement SAPCCs.
- A comprehensive response to climate change requires **multi-stakeholder engagement for adaptation planning and implementation**, bringing together key technical and financial resources for sustainable management of natural resources.
- The **stakeholders at the local level are the key sources of information and often local knowledge.** Bringing together different stakeholder groups also helps in highlighting the importance of cross sectoral issues.
- **Successful mainstreaming** CCA at the local level may be influenced by a variety of reasons, including
 - (i) Identifying the right entry point aligned to existing developmental objectives/plans/strategies at the local level;
 - (ii) Local leadership or champions are crucial for building awareness on the need for mainstreaming CCA in ongoing activities;
 - (iii) Mainstreaming CCA being an iterative process that can only be effective if the measures and approaches are accountable; and
 - (iv) Intensive stakeholder engagement in identifying the community requirements and ownership.

Way forward

NAPCC-Process: There are Eight National Missions which form the core of the National Action Plan, representing multi-pronged, long-term and integrated strategies for achieving key goals in the context of climate change. While several of these programmes are already part of current actions, they may need a change in direction, enhancement of scope and effectiveness and accelerated implementation of time-bound plans. The NAPCC hinges on the development and use of new technologies. The implementation of the Plan would be through appropriate institutional mechanisms suited for effective delivery of each individual Mission's objectives and include public private partnerships and civil society action.

SAPCC-Process: The SAPCC preparation process started with the aim to mainstream climate change action into local-level planning. Clarity is required to operationalize these plans financially and technically at the local level. Also, to track progress and enable monitoring of implementation of envisaged objectives, relevant indicators and reporting systems need to be developed and put in place. In addition, strengthening and implementing SAPCCs to achieve NDC adaptation goals has the potential to mobilize greater finance for adaptation.

Monitoring: The topic of adaptation monitoring has increasingly gained importance within the face of new and rapidly expanding adaptation portfolios in India. So far, no standard climate impact or adaptation monitoring framework exists at national or at state level in India to track SAPCC implementation or monitor the effectiveness of adaptation measures being implemented at local level. What is currently available is the monitoring mechanism of the currently implemented centrally and state sponsored schemes and M&E frameworks for projects endorsed under National and International climate funds. However, making adaptation count through measuring the effectiveness of implemented adaptation measures and its contribution to evidence-based decision-making in the future is a major challenge. It is important to develop clear M&E framework in order to increase accountability of ongoing initiatives which will attract further investment from climate funds and private sector.

Financing: The concrete financial support to operationalise NAPCC and SAPCC is still under discussion at the national level. At the national level, the funds are expected to come from the ongoing government budgetary processes at state level. In addition to that a national adaptation fund has been set up to support implementation of concrete adaptation projects under SAPCC. India is also active towards tapping international climate change adaptation finance sources, such as the **Adaptation Fund**, the **Global Environment Facility (GEF)** and the **Green Climate Fund (GCF)**.

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