

# Prospects

Aperiodic – no. 24/320 – 28 November 2024

## The point of view

### Climate issues catch up with India

For more than a month now, the residents of New Delhi – India’s overpopulated capital, home to more than 30 million people – have been suffocating under a cloak of pollution. The city’s air quality index has reached an all-time high, rising well above the 400 mark beyond which prolonged outdoor exposure becomes dangerous to the human body.

The city’s hospitals have also reported a huge surge in the number of consultations for pulmonary infections and respiratory difficulties. **Pollution is estimated to be responsible for around 12,000 deaths a year in New Delhi, equivalent to over 10% of all deaths in the city.** The authorities are in denial, stubbornly claiming that “there is no conclusive data available to establish a direct correlation of death exclusively with air pollution”.

Behind this spike in pollution are fires deliberately lit by farmers in the north of the country to burn crop residues after harvest and prepare the ground for subsequent crops – a practice that is strongly discouraged because of its severe environmental impact, but which the authorities have not failed to regulate. Then there is pollution arising from the construction sector, the burning of fossil fuels and, of course, extremely heavy traffic.

**These episodes underscore India’s extreme vulnerability to climate issues.** Eighty of the world’s one hundred most polluted cities are in India, which is seventh on the list of countries most exposed to extreme weather events, particularly those involving rain (floods and droughts) and heat.

#### India’s exposure to climate risks

Region/Event	Floods	Droughts	Cyclones
North	High	Medium	Low
South	High	High	High
East	High	Medium	High
Northeast	Medium	Low	Low
West	Medium	High	Medium
Centre	Low	Medium	Low

Source: Council on Energy, Environment and Water<sup>1</sup>

<sup>1</sup> [India’s Climate Change Vulnerability Index | District-Wise Study \(ceew.in\)](https://etudes-economiques.credit-agricole.com)

## The long road to transition

**India is already the world's third-largest emitter of greenhouse gases**, though it has the lowest emissions per capita of any G20 country. Despite efforts to invest in renewable energy, particularly solar and wind energy, the country remains heavily reliant on coal (which accounted for 75% of its energy mix in 2023), which contributes to fine-particle emissions and thus to pollution. At COP26 in Glasgow in 2021, India committed to meet 50% of its energy requirements from renewable sources and install 500 GW of renewable energy capacity by 2030. This is an ambitious bet but not an impossible one: in 2024, renewable energy capacity has risen by 24.2 GW year on year to 203.2 GW.

**The transition will also mean growing electric vehicle (EV) sales – another priority for the authorities.**

While sales of new EVs have risen over the past two years, up from 1.75% of all vehicle sales in 2021 to 6.4% in 2023, they are still well short of the government's 2030 target of 30%. For the time being, sales are mainly concentrated in motorcycles, more affordable to Indian consumers. But the sector is supported by a policy of substantial subsidies designed not only to help people buy new EVs but also to expand domestic production capacity, buoyed by Indian manufacturer Tata Motors, the undisputed leader, with a market share of over 70%.

## The role of agriculture

**This view of a modern country racing to develop renewable energy and clean transport must not be allowed to obscure the other face of India – that of a still underdeveloped and mostly rural country.**

**The challenges involved in energy transition are also intimately linked with agriculture, which continues to play a central role in India, where 64% of the population still lives in rural areas.**

With India's population exceeding China's in 2023, some states – particularly in the east of the country – already face very high levels of water stress. Agricultural yields are still well below those of the main cereal-producing countries: the sector, which still employs 43% of the population, remains heavily reliant on manual labour and is dominated by very small farms (averaging one hectare), most of them family-owned and often operating at close to subsistence levels. Because India is so densely populated – China, for example, has three times the amount of land per capita – this presents a huge productivity challenge.

**Above all, harvests are heavily dependent on the monsoon**, the timing and magnitude of which are increasingly unpredictable. Rainfall in the 2023 monsoon season was below the historical norm, notably in the east of the country, as a result of the El Niño weather phenomenon. Conversely, India has this year benefited from the influence of La Niña. This has meant a fairly satisfactory summer monsoon season (July to September), which accounts for 70% of India's total rainfall, though still with significant variations between regions.

**Harvests, and thus food prices, are at heart of many of India's economic challenges.** Among the key demands of India's farmers are guaranteed agricultural prices and their expansion to cover more crops. Their anger boiled over into months of protests in 2021 and again in 2024, just a few weeks before the general election in which Narendra Modi's party would significantly underperform, notably in the heavily agriculture state of Haryana.

The consumer price index is also dominated by food products, which account for 46% of items making up the index. In the past, periods of inflation have primarily been triggered by shortages of the "TOP" vegetables (tomatoes, onions and potatoes), which are staples of Indian cuisine, and some cereals (rice and wheat).

**Nor can the political importance of food prices be overstated.** In 1998, a sharp rise in onion prices cost the Bharatiya Janata Party (BJP) the local elections in New Delhi. Highly volatile food prices make the central bank's job more complicated: adjusting base rates and injecting liquidity have little impact on vegetable and cereal prices. The Central Bank of India is even considering targeting only core inflation to exclude food prices. In October, inflation quickened to 6.2%, driven by food inflation (13.5%), with vegetable prices rising fastest.

☑ **Our opinion – The reality of climate change is catching up with India and could perhaps constitute the most significant risk factor facing the country.** Air pollution is making cities – particularly the capital, New Delhi – less and less liveable. And, as each monsoon season rolls around, unpredictable rainfall patterns plunge India into uncertainty: when will the rains come? Will there be enough rainfall... or will there be too much, with fatal consequences? Will it be evenly spread around the country? The importance of agriculture and the influence of harvests on income, prices and consumer spending still profoundly shape the Indian economy, making growth potentially highly volatile. In recent years, harvests have been increasingly affected by extreme weather events.

**Seen against this backdrop, the authorities' response has been lacklustre:** while the emphasis has been on renewable energy and developing the production and sale of clean vehicles, too little is still being done to combat pollution arising from other sectors, most notably agriculture and construction. And, when it comes to the health consequences of pollution, which already costs the people of New Delhi around ten years' life expectancy, one might be forgiven for thinking the government's attitude sometimes smacks of denial.

Sophie Wieviorka

[sophie.wieviorka@credit-agricole-sa.fr](mailto:sophie.wieviorka@credit-agricole-sa.fr)

## Consult our last publications

Date	Title	Theme
21/11/2024	<a href="#">Is China geared up to deal with the Trump onslaught?</a>	China
14/11/2024	<a href="#">New Caledonian nickel on a razor edge</a>	Sector
06/11/2024	<a href="#">France – 2024-2025 Scenario: modest growth against the backdrop of an orange alert on public finances</a>	France
05/11/2024	<a href="#">Italy – 2024-2025 Scenario: sluggish growth, a return to the past?</a>	Italy
04/11/2024	<a href="#">Eurozone – 2024-2025 Scenario: recalibration of the balance of risks</a>	Europe
31/10/2024	<a href="#">Will the real estate crisis bury China's dreams of prosperity?</a>	Asia
25/10/2024	<a href="#">United Kingdom – 2024-2025 Scenario: towards more moderate growth rates</a>	United Kingdom
24/10/2024	<a href="#">Spain – 2024-2025 Scenario: strong growth in the first half</a>	Europe
17/10/2024	<a href="#">China in the face of protectionism</a>	Asia
04/10/2024	<a href="#">World – Macro-economic Scenario 2024-2025: delicate balances</a>	World
03/10/2024	<a href="#">China's central bank strives to revive sluggish growth</a>	Asia
02/10/2024	<a href="#">France – The residential real-estate market: correction continued</a>	France
26/09/2024	<a href="#">Can Saudi Arabia afford its ambitions?</a>	MENA
24/09/2024	<a href="#">Essential of Semiconductors – Foundry</a>	Semiconductors
19/09/2024	<a href="#">Protectionism, US style</a>	USA, Asia
12/09/2024	<a href="#">Indonesia: the fraught road from Jakarta to Nusantara</a>	Asia
06/09/2024	<a href="#">The great legitimacy crisis</a>	Geopolitics

### Crédit Agricole S.A. — Group Economic Research

12 place des Etats-Unis – 92127 Montrouge Cedex

**Publication Manager and chief Editor:** Isabelle Job-Bazille

**Information center:** Elisabeth Serreau - **Statistics:** DataLab ECO

Contact: [publication.eco@credit-agricole-sa.fr](mailto:publication.eco@credit-agricole-sa.fr)

**Access and subscribe to our free online publications:**

**Internal Website:** <https://portaleco.ca-sa.adsi.credit-agricole.fr/en>

**Website:** <http://etudes-economiques.credit-agricole.com>

**iPad:** [Etudes ECO application](#) available in App store platform

**Android:** [Etudes ECO application](#) available in Google Play

*This publication reflects the opinion of Crédit Agricole S.A. on the date of publication, unless otherwise specified (in the case of outside contributors). Such opinion is subject to change without notice. This publication is provided for informational purposes only. The information and analyses contained herein are not to be construed as an offer to sell or as a solicitation whatsoever. Crédit Agricole S.A. and its affiliates shall not be responsible in any manner for direct, indirect, special or consequential damages, however caused, arising therefrom. Crédit Agricole does not warrant the accuracy or completeness of such opinions, nor of the sources of information upon which they are based, although such sources of information are considered reliable. Crédit Agricole S.A. or its affiliates therefore shall not be responsible in any manner for direct, indirect, special or consequential damages, however caused, arising from the disclosure or use of the information contained in this publication.*