

GOVERNMENT OF INDIA
MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE

RAJYA SABHA
UNSTARRED QUESTION NO. 2293
TO BE ANSWERED ON 12.03.2026

Discrepancies in AQI figures

2293. SHRI MALLIKARJUN KHARGE:

Will the Minister of ENVIRONMENT, FOREST AND CLIMATE CHANGE be pleased to state:

- a) whether Government is aware of the media reports highlighting significant discrepancies between the Air Quality Index (AQI) figures reported by the Central Pollution Control Board (CPCB) and international sources such as IQAir;
- (b) if so, the details thereof and the reasons therefor; and
- (c) the steps being taken to ensure greater transparency, accuracy and international comparability of India's AQI data

ANSWER

MINISTER OF STATE IN THE MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE
(SHRI KIRTI VARDHAN SINGH)

(a) to (c): Air Quality Index (AQI) was launched by the Government in the year 2015 to provide air quality information to the people in easy to understand terms through one number, one nomenclature and one colour. It transforms air quality data of 8 air pollutants into a single number.

Air Quality Index (AQI) was developed by CPCB through a Committee comprising experts from Indian Institute of Technology Kanpur (IITK), Indian Institute of Technology Delhi (IITD), medical professionals (AIIMS Delhi, MAMC Delhi, SRMCRI Chennai), air quality experts (NEERI, IMD), SPCBs and representatives from NGOs. AQI was developed taking into account National Ambient Air Quality Standards, background concentrations, likely health impacts, and internationally comparable concentration breakpoints, etc.

AQI in the country is generated through Continuous Ambient Air Quality Monitoring Stations (CAAQMS), which are equipped with state of art reference-grade systems, delivering continuous and near real-time data. The real-time measurements from these systems are also indispensable being accurate and scientifically robust air-quality data for Air Quality Index (AQI) reporting. These monitoring systems provide accurate, traceable, and reliable data, which is essential for compliance

assessment under the National Ambient Air Quality Standards (NAAQS), for scientifically credible trend analysis and for regulatory purposes.

CPCB uses air quality data collected from nation-wide air quality monitoring network operated by SPCBs/ PCCs, national institutes such as IMD and IITM Pune to compute Air Quality Index (AQI) based on the approved methodology. These stations are operated following the standard protocol as per guidelines. Hence, air quality data generation using any technology other than that specified in National Ambient Air Quality Standard (NAAQS), 2009 is not used for regulatory purpose as its accuracy, linearity, reliability, and long-term performance are not yet fully established.

AQI is disseminated at CPCB website https://airquality.cpcb.gov.in/AQI_India/ and through a mobile application called SAMEER (available on Android and iOS). SAMEER mobile application and web portal provide near real-time air quality data and hourly Air Quality Index (AQI) information of more than 280 cities. CPCB issues a daily bulletin at 04:00 PM comprising AQI of various cities in the country. SAMEER app also serves as a grievance redressal mechanism, enabling citizens to report pollution-related complaints for prompt action by concerned authorities. Further, air quality monitoring data is also made available by respective SPCBs/PCCs on their websites.

Further, CPCB has issued guidelines for establishing Ambient Air Quality Monitoring stations namely, “Guidelines for the Measurement of Ambient Air Pollutants (Volume-I: Guidelines for Manual Sampling & Analyses, and Volume-II: Guidelines for Real Time Sampling & Analyses)”. CPCB has also issued “Technical Handbook for Installation, Maintenance, Calibration, Data Connectivity and Data Quality check of Continuous Ambient Air Quality Monitoring System (Real Time)”. Concerned State Pollution Control Boards/Pollution Control Committees install and operate monitoring stations to collect ambient air quality, in line with the criteria issued by the Central Pollution Control Board (CPCB).
