

CERCA Weekly Newsletter

May 3, 2019

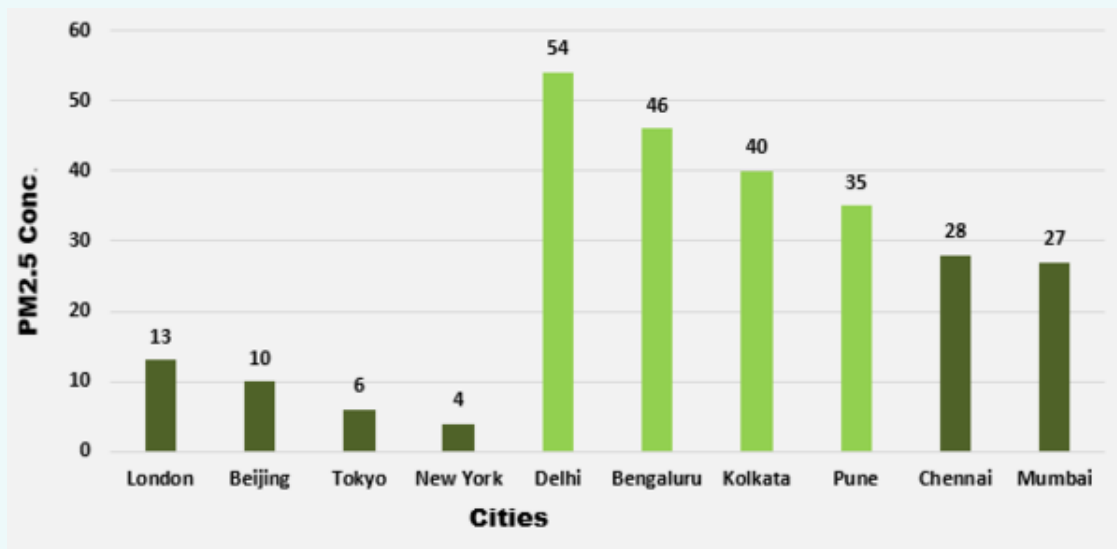
Centre of Excellence for Research on Clean Air



Indian Institute of Technology, Delhi



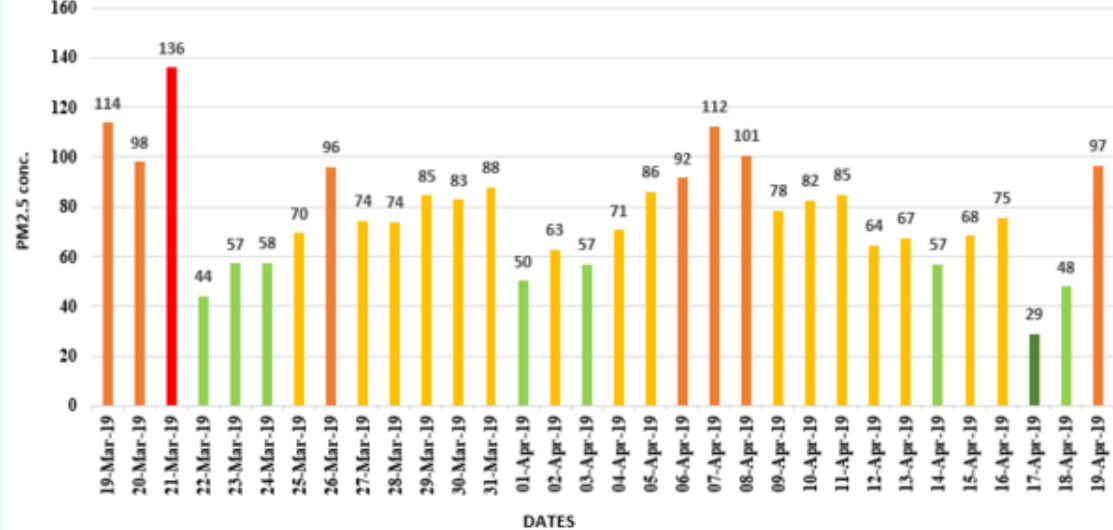
Air Quality in different cities



April 03, 2019, 11:00-12:00 IST (Hourly Average)

Data Source: Berkeley Earth

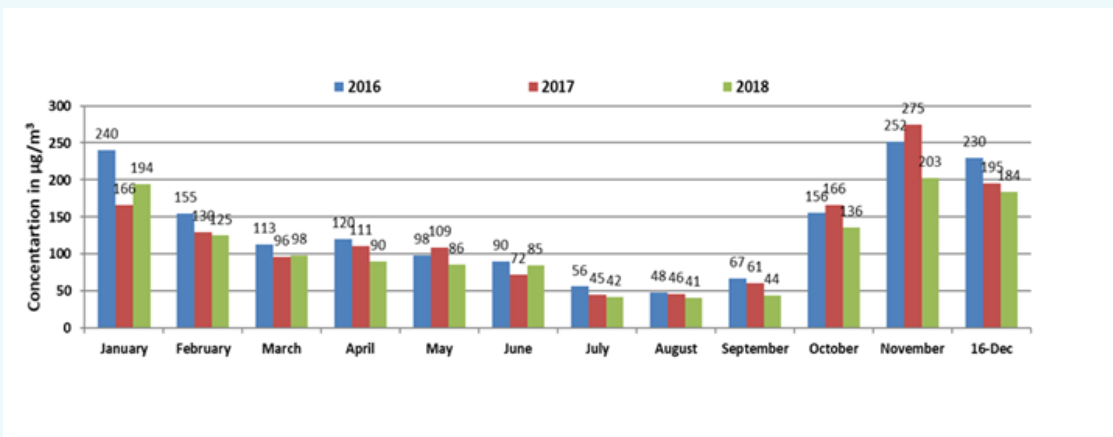
Delhi air quality for last 30 days



Average PM2.5 Air Quality for 10 stations in Delhi. Delhi has seen few better air quality days.

Data Source: CPCB

Delhi long term air quality trend



About 18 % decrease in PM2.5 levels in October, about 26 % in November and about 6 % in December 2018 in comparison to corresponding months in 2017 have been observed.

Air quality health impacts

Air quality	AQI Category (range)	PM2.5 24-hr (range)	Likely Health Impacts
Good	0-50	0-30	Minimal Impact
Satisfactory	51-100	31-60	May cause minor breathing discomfort to sensitive people
Moderately polluted	101-200	61-90	May cause breathing discomfort to the people with lung disease such as asthma and discomfort to people with heart disease, children and older adults
Poor	201-300	91-120	May cause breathing discomfort to people on prolonged exposure and discomfort to people with heart disease with short exposure
Very Poor	301-400	121-250	May cause respiratory illness to the people on prolonged exposure. Effect may be more pronounced in people with lung and heart diseases
Severe	401-500	250-	May cause respiratory effects even on healthy people and serious health impacts on people with lung/heart diseases. The health impacts may be experienced even during light physical activity

Thought Leadership

[Why the Silence?](#)

<https://www.post-gazette.com/opinion/letters/2019/05/03/Why-the-silence/stories/201905030053>

Source: Post-Gazette

New Measures and Initiatives

[India to develop own certification facility for air pollution monitoring equipment](#)

The National Physical Laboratory (NPL), one of the country's premier research and development units, is developing India's own certification facility for air pollution monitoring equipment.

<https://www.livemint.com/news/india/india-to-develop-own-certification-facility-for-air-pollution-monitoring-equipme-1556561927930.html>

Source: Livemint

[Soon, New Forecasting System to Alert People on Air Pollution](#)

The forecasting system, developed by the US-based National Center for Atmospheric Research in collaboration with the Indian Institute of Tropical Meteorology in Pune provides 72-hour forecasts of fine particulate matter, known as PM2.5.

<https://www.ndtv.com/delhi-news/soon-new-forecasting-system-to-alert-people-on->

Source: NDTV

Health Impact

[Can tech protect from the impact of air pollution?](#)

Marketed solutions to air pollution claim to help combat its worst effects, but questions about their effectiveness remain unanswered.

<https://www.raconteur.net/healthcare/air-pollution-tech>

Source: Raconteur

[Researchers Now Have Even More Proof That Air Pollution Can Cause Dementia](#)

Research implicating air pollution as one factor that can contribute to dementia was alarming, consistent, and, ultimately, “suggestive.

<https://www.motherjones.com/environment/2019/05/researchers-now-have-even-more-proof-that-air-pollution-can-cause-dementia/>

Source: Motherjones

International Developments

[Closing Roads to Motor Traffic Leads To Dramatic Fall In Air Pollution](#)

Sections of last week’s London Marathon route benefitted from a significant and almost instant drop in air pollution.

<https://www.forbes.com/sites/carltonreid/2019/04/30/closing-roads-to-motor-traffic-leads-to-dramatic-fall-in-air-pollution/#511365896ac3>

Source: Forbes

[Urban air pollution to be determined with new advance technology](#)

Advanced instrumentation and information technology may allow gauging the health risks of air pollution on an individual level, researchers have revealed in a recent study.

<https://www.asianage.com/life/more-features/030519/urban-air-pollution-to-be-determined-with-new-advance-technology.html>

Source: Asianage

New Research (study) or Policy

Revolutionary paint offers solution to air pollution

The paint is activated using light energy, enabling the active ingredient to convert NOx into nitric acid.

<https://www.thehindu.com/sci-tech/energy-and-environment/revolutionary-paint-offers-solution-to-air-pollution/article26903323.ece>

Source: The Hindu

Biosolar leaf' project targets air pollution on London campus

World's first "biosolar leaf", which they claim can mop up carbon dioxide and discharge oxygen into the atmosphere more efficiently than a typical tree.

<https://www.theguardian.com/environment/2019/apr/28/biosolar-leaf-project-targets-air-pollution-on-london-campus>

Source: The Guardian

New Technology

M&M to deploy 50 electric vehicles on Uber platform

Automaker MahindraNSE 0.81 % & Mahindra Ltd Thursday announced the deployment of 50 of its Electric Vehicles (EVs) to Uber, an on-demand ride-sharing company, to provide zero emission mobility here.

<https://economictimes.indiatimes.com/industry/auto/auto-news/mm-to-deploy-50-electric-vehicles-on-uber-platform/articleshow/69041964.cms>

Source: Economic Times

Maruti to phase out diesel models from April 2020

The country's largest carmaker Maruti Suzuki India (MSI) will phase out all diesel cars from its portfolio with effect from April 1, 2020.

<https://economictimes.indiatimes.com/industry/auto/auto-news/maruti-to-phase-out-diesel-models-from-april-2020/videoshow/69040875.cms>

Source: Economic Times

For more details, visit our website <http://cerca.iitd.ac.in>

CONTACT US

Coordinator

Prof. Mukesh Khare
Indian Institute of Technology Delhi

Email: cerca@iitd.ac.in

Co-Coordinator

Dr. Nimesh Bolia
Indian Institute of Technology Delhi

Phone: +91 (11) 2659 7361