

pollution in cities across the world in respect of PM_{10} / $PM_{2.5}$ (particulate matter) which is based on extrapolation of data and based on conversion factors. Data of few years are required to show increasing or decreasing trend of pollution level. Therefore, care has to be exercised before drawing any inference.

Human health is affected by number of factors such as food habits, occupations, socio-economic status, medical history, immunity, etc. Cancer is a complex group of diseases with many causes which *inter alia* include genetic factors, smoking, tobacco, diet, physical activity, exposure to radiation and chemicals, virus, other infection, etc. Air pollution could be one of the triggering factors for health ailments.

Government has formulated National Clean Air Programme (NCAP) as a long term time bound national level strategy to tackle increasing air pollution across the country in comprehensive manner. The overall objective is to augment and evolve effective ambient air quality monitoring network across the country besides ensuring comprehensive management plan for prevention, control and abatement of air pollution. The NCAP focuses on collaborative and participatory approach comprising all sources of pollution and coordination between relevant Central Ministries, State Governments, local bodies and other stakeholders. Government has further taken several steps to address air pollution which *inter alia*, include notification of Graded Response Action Plan for different levels of air pollution in NCR; notification of National Ambient Air Quality Standards; setting up of monitoring network for assessment of ambient air quality; introduction of cleaner / alternate fuels like gaseous fuel (CNG, LPG etc.), ethanol blending, launching of National Air Quality index; universalization of BS-IV by 2017; leapfrogging from BS-IV to BS-VI fuel standards by 1st April, 2020; notification of Construction and Demolition Waste Management Rules; banning of burning of biomass; promotion of public transport network; streamlining the issuance of Pollution Under Control Certificate; issuance of directions under Section 18(1)(b) of Air (Prevention and Control of Pollution) Act, 1981 and under Section 5 of Environment (Protection) Act, 1986; notification of about 115 emission/effluent norms for 104 different sectors besides 32 General Standards and special measures for critically polluted areas, etc.

Deterioration of air quality in Delhi

1499. DR. SUBRAMANIAN SWAMY: Will the Minister of ENVIRONMENT, FOREST AND CLIMATE CHANGE be pleased to state:

(a) whether Government is aware that quality of air in Delhi city has deteriorated during the last few years;

(b) whether it is a fact that during the winter period the air quality at Delhi further deteriorates and it is a serious health hazard; and

(c) what steps Government proposes to take to reduce air pollution and improve the air quality for better health standards?

THE MINISTER OF STATE IN THE MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE (DR. MAHESH SHARMA): (a) Central Pollution Control Board (CPCB) is regularly monitoring ambient air quality at several locations in Delhi under National Air Quality Monitoring Programme (NAMP). Ambient air quality monitoring data for last five years is given in the Statement (*See below*), which indicates that levels of PM₁₀ and PM_{2.5} are major concerns. The levels of NO₂ are slightly higher than the standard while the concentration of SO₂ is within the standard limit at all the locations during the last five years. Various reasons for high air pollution include vehicular pollution, emissions from industries, biomass burning, construction activities and road dust etc. Further, there has been an improvement in the overall air quality this year compared to last year. The number of severe, poor and very poor AQI days were less compared to last year (214 vs. 181). Similarly, the number of good, satisfactory and moderate days were greater than last year (151 against 109).

(b) Ambient air quality of Delhi gets impacted adversely during the winter season during unfavourable meteorological conditions such as low wind speed and low mixing height. Poor air quality has an adverse health impact specially for young children and the elderly.

(c) The Government has taken several steps to address air pollution which *inter alia*, include notification of National Ambient Air Quality Standards; setting up of monitoring network for assessment of ambient air quality; introduction of cleaner/alternate fuels like gaseous fuel (CNG, LPG etc.), ethanol blending, launching of National Air Quality index; universalization of BS-IV by 2017; leapfrogging from BS-IV to BS-VI fuel standards by 1st April, 2020; notification of Construction and Demolition Waste Management Rules; banning of burning of biomass; promotion of public transport network; streamlining the issuance of Pollution Under Control Certificate; issuance of directions under Section 18(1)(b) of Air (Prevention and Control of Pollution) Act, 1981 and under Section 5 of Environment (Protection) Act, 1986; installation of on-line continuous (24x7) monitoring devices by major industries; collection of Environmental Protection Charge on more than 2000 CC diesel vehicles; notification of Graded Response

Action Plan for Delhi and NCR etc. CPCB has also deployed 40 field inspection teams for pollution hot spots in Delhi NCR and is also co-ordinating with various agencies for reducing air pollution.

Statement

Ambient Air Quality Monitoring Data of Delhi

Location	Pitampura					Sirifort					NAAQS (Annual)
Year	2012	2013	2014	2015	2016	2012	2013	2014	2015	2016	
SO ₂	5	4	4	5	6	5	4	4	4	5	50
NO ₂	44	45	40	37	40	48	43	39	49	52	40
PM ₁₀	206	206	195	241	262	291	181	209	189	320	60
PM _{2.5}	67	63	89	119	145	51	78	84	94	102	40

Concentration in $\mu\text{g}/\text{m}^3$

Location	Janakpuri					Nizamuddin					NAAQS (Annual)
Year	2012	2013	2014	2015	2016	2012	2013	2014	2015	2016	
SO ₂	4	4	4	4	6	4	4	4	4	5	50
NO ₂	44	46	43	50	52	42	42	40	44	46	40
PM ₁₀	246	202	197	199	296	187	165	188	225	253	60
PM _{2.5}	49	57	79	94	118	44	66	74	83	109	40

Concentration in $\mu\text{g}/\text{m}^3$

Location	Shahzada Bagli					Shahdara					NAAQS (Annual)
Year	2012	2013	2014	2015	2016	2012	2013	2014	2015	2016	
SO ₂	5	4	4	4	6	5	4	4	4	7	50
NO ₂	53	61	59	56	56	56	62	57	54	53	40
PM ₁₀	243	265	234	261	348	253	246	272	252	327	60
PM _{2.5}	62	88	69	99	120	106	86	85	113	119	40

Concentration in $\mu\text{g}/\text{m}^3$

Delhi (Data reported by NEERI)

Location	Delhi - N.Y. SCHOOL					Delh-Town Hall					NAAQS (Annual)
Year	2012	2013	2014	2015	2016	2012	2013	2014	2015	2016	
SO ₂	5	4	8	7	9	7	4	7	7	13	50
NO ₂	78	83	84	89	88	87	98	95	106	111	40
PM ₁₀	186	186	161	149	171	256	219	206	200	195	60

Concentration in $\mu\text{g}/\text{m}^3$

Location	Delhi - Mayapuri Industrial Area					NAAQS (Annual)
Year	2012	2013	2014	2015	2016	
SO ₂	10	5	6	9	9	50
NO ₂	80	88	94	99	84	40
PM ₁₀	268	292	287	265	309	60

Pollution in rivers flowing through urban areas

1500. SHRIMATI VIPLOVE THAKUR: Will the Minister of ENVIRONMENT, FOREST AND CLIMATE CHANGE be pleased to state:

- (a) whether Government is aware of pollution caused to rivers flowing through urban areas;
- (b) if so, the details thereof;
- (c) whether Government has any plans to conserve lakes and rivers in the country including Himachal Pradesh; and
- (d) if so, the details thereof along with the funds allocated to Himachal Pradesh under the plan?

THE MINISTER OF STATE IN THE MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE (DR. MAHESH SHARMA): (a) and (b) Central Pollution Control Board (CPCB) in association with the State Pollution Control Boards monitors the river water quality across the country through a network of monitoring stations on various rivers under the National Water Quality Monitoring Programme. As per the report published by CPCB in February 2015, total of 302 polluted river stretches have been identified on 275 rivers based on Bio-chemical Oxygen Demand (BOD) levels, a key indicator of organic pollution. The State-wise details of polluted river stretches is given in the Statement (*See* below).

(c) and (d) It is the responsibility of the State Governments/concerned local bodies to set up facilities for collection, transportation and treatment of sewage for abatement of pollution of rivers and lakes. This Ministry has been supplementing the efforts of the State Governments in abatement of pollution and conservation of rivers, lakes and wetlands under the programmes of National River Conservation Plan (NRCP) and National Plan for Conservation of Aquatic Eco-systems (NPCA), on a cost sharing basis between the Central and State Governments, including Himachal Pradesh.