

AIR QUALITY MONITORING @ 40 FEET HEIGHT – Report Date: 3.10.2021

(BASED ON US-EPA AQI STANDARDS)

Permissible Limits (24h Mean) :PM₁₀ = 150; PM_{2.5} = 35 (US EPA), all units are in µg/m³

Site Location	Sampling Time (24 hrs)	DAYALBAGH (TIME WEIGHTED AVERAGE DATA)										SANJAY PLACE (ARITHMETIC MEAN DATA)									
		AQI				Meteorological Parameters @ Dayalbagh						AQI				Meteorological Parameters @ Sanjay Place					
		PM _{2.5}		PM ₁₀								PM _{2.5}		PM ₁₀							
		Today Oct 3- Oct 2	Yesterday Oct 2- Oct 1	Today Oct 3- Oct 2	Yesterday Oct 2- Oct 1	RH %	WS m/s	WD	T °C	SR W/ m ²	RF mm	Today Oct 3- Oct 2	Yesterday Oct 2- Oct 1	Today Oct 3- Oct 2	Yesterday Oct 2- Oct 1	RH %	WS m/s	WD	T °C	SR W/m ²	RF mm
4 / 97	12:00 noon – 12:00 noon	50 G	55 M	23 G	29 G	14	68	WSW	32	142	0	68 M	76 M	27 G	38 G	63	2.6	ENE	NA	125	0
3 / 34	12:00 noon – 12:00 noon	68 M	72 M	23 G	26 G	22	70	WSW	31	130	0										
Science Faculty	12:00 noon – 12:00 noon	66 M	74 M	24 G	31 G	23	72	SW	31	114	0										

Good- G

Moderate- M

Unhealthy for Sensitive Groups -US

Unhealthy- UH

Very Unhealthy - VUH

Hazardous - H

NOTE: 1 A continuous study conducted as part of Dayalbagh Sigma Six Qualities and Values Model implementation.

2 DEI is using United States Environmental Protection Agency (USEPA) methodology and online calculators to calculate AQI. For fair comparison with UPPCB Sanjay Place Weather Station readings, their PM_{2.5} concentration readings are fed in USEPA online calculator for AQI calculation.

3 Formula for AQI calculation for a Pollutant -

$$I = \frac{I_{high} - I_{low}}{C_{high} - C_{low}} * (C - C_{low}) + I_{low}$$

where, I = Air Quality Index, C=Pollutant Concentration (PM_{2.5}), C_{low}=Concentration Breakpoint ≤C, C_{high}=Concentration Breakpoint ≥C, I_{low}=Index Break point corresponding to C_{low}, I_{high}=Index Breakpoint corresponding to C_{high}