## Radhasoami Dayal Ki Daya Radhasoami Sahai

## AIR QUALITY MONITORING @ 40 FEET HEIGHT – Report Date: 25.7.2022 (BASED ON US-EPA AQI STANDARDS AND THE DAYALBAGH AQI COLOUR CODE)

Permissible Limits (24 Hour Mean):  $PM_{10} = 150$ ;  $PM_{2.5} = 35$ , all units are in  $\mu g/m^3$  Sampling Duration = 24 hrs (9:00 AM to 9:00 AM)

	Date DAYALBAGH							Date SANJAY PLACE												
	Today: July 25– 24 Yesterday July 24 – 23	(TIME WEIGHTED AVERAGE DATA)								Today:	(ARITHMETIC MEAN DATA)									
		Air Quality Index		Meteorological Parameters						Touay.	А	QI	Meteorological Parameters							
						WD	, , , , , , , , , , , , , , , , , , ,	T G		RF	July 25– 24 Yesterday	PM <sub>2.5</sub>	PM10	RH %	WS m/s	WD	T °C		SR W/m <sup>2</sup>	RF
			<b>PM</b> <sub>10</sub>	RH %	WS m/s		°C		SR											
							Max	Min	W/m <sup>2</sup>	mm	July 24 – 23					L	Max	Min		mm
4 / 97	Today	63	25	83	5.6	SSE	33.3	27.4	148	05										
4/9/	Yesterday	57	22	85	5.0	S	32.9	26.2	147	05		89*	36	74	2.7	N	35.6	28.4	174	09
3/34	Today	78	31	84	5.6	SSE	32.2	27.2	148	05										
5734	Yesterday	68	26	86	5.0	S	32.9	26.6	147	05										
Science	Today	72	29	84	5.6	SSE	33.1	27.3	148	05		76	33	75	3.1	NNE	35.5	28.2	174	06
Faculty	Yesterday	72	26	86	5.0	S	33.6	26.6	147	05										

Good 0 - 50	Moderate 51 - 100	Unhealthy for Sensitive Groups 101 - 150	Unhealthy for All 151 - 200	Very Unhealthy for All 201 - 300	Hazardous for All 301 - 400	Hazardous for All 401 - 500
						101 500

**Views of AQI Research Group**: In comparison to yesterday, there is a marginal increase in the concentrations of both PM<sub>2.5</sub> and PM<sub>10</sub> at all locations of Dayalbagh. The Air Quality Index remains in the *Moderate* category w.r.t. PM<sub>2.5</sub> while w.r.t. PM<sub>10</sub> it remains in the *Good* category at all the three locations of Dayalbagh.

\*At Sanjay Place the values for PM<sub>2.5</sub> were available only till 8:00 pm yesterday (24.7.2022). The AQI has been calculated from the mean PM<sub>2.5</sub> concentration from the available data.

At Sanjay Place also, the concentrations of both PM<sub>2.5</sub> and PM<sub>10</sub> have marginally increased. However, the Air Quality Index still remains in the *Moderate* category w.r.t. PM<sub>2.5</sub> and in the *Good* category w.r.t PM<sub>10</sub>.

Perused <u>By Way of Information Only</u>, <u>Subject To</u> Legalise/Legalese/"Laws of the Land".

Monday, 25-07-2022, 06:20 PM Received, Monday, 25-07-2022, 02:52 PM

NOTE: 1 A continuing 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<sub>2.5</sub> 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<sub>2.5</sub>);  $C_{low}$  = Concentration Breakpoint  $\leq$ C;  $C_{high}$  = Concentration Breakpoint  $\geq$ C;  $I_{low}$  = Index Break point corresponding to  $C_{low}$ ;  $I_{high}$  = Index Breakpoint corresponding to  $C_{high}$ ; \*Multiplication Sign