



### **Wind Pattern and Ventilation Index Forecast**

Air mass inflow forecast in Delhi along with predicted ventilation coefficient and weather forecast is as follows:

- 1. The air quality over Delhi-NCT is likely to remain in Moderate to Poor category on 23.06.2021 and Poor category on 24.06.2021. PM10 will be the predominant pollutant owing to strong surface winds favourable for raising dust concentration locally and transport of dust from arid regions. The air quality is likely to improve marginally but remain in Poor to Moderate category on 25.06.2021. The Outlook for subsequent 5 Days: The air quality is likely to remain largely in Satisfactory to Moderate category.
- 2. The predominant surface wind is likely to be coming from North directions of Delhi with wind speed 05-12 kmph and partly cloudy sky on 23.06.2021. The predominant surface wind is likely to be coming from Northwest directions of Delhi with wind speed 10-20 kmph, partly cloudy sky and strong surface winds (speed 20-30 kmph) during the day on 24.06.2021. The predominant surface wind is likely to be coming from West-Northwest directions of Delhi with wind speed 12-20 kmph and partly cloudy sky with very light rain/thundershowers on 25.06.2021.
- 3. Predicted maximum mixing depth is likely to be approx. 4400 m on 23.06.2021, 4600 m on 24.06.2021 and 3700 m on 25.06.2021 over Delhi. Maximum Ventilation index is likely to be approx 20000  $\text{m}^2/\text{s}$  on 23.06.2021, 37500  $\text{m}^2/\text{s}$  on 24.06.2021 and 31500  $\text{m}^2/\text{s}$  on 25.06.2021. The ventilation index lower than 6000  $\text{m}^2/\text{s}$  with average wind speed less than 10 kmph is unfavourable or dispersion of pollutants.
- 4. Detailed forecast analysis and verification can be seen at https://ews.tropmet.res.in.
- 5. Air mass inflow in Delhi along with ventilation index is attached.





# Delhi/NCR forecast for next 7 days Date: 23.06.2021

<u>Date: 23.06.2021</u>							
	TEMPE	RAT	DIRECTION/ WIND SPEED				
	URE (°C)		(KMPH)				
DATE			0530-	1130-	1730-	WEATHER FORECAST	
	MAX	MIN	1130	1730	2330		
			(IST)	(IST)	(IST)		
23.06.2021	40	28.0	NE/05	N/10	N/12	PARTLY CLOUDY SKY.	*
						PARTLY CLOUDY SKY. STRONG	
24.06.2021	40	28	NW/10	NW/18	NW/20	SURFACE WINDS (SPEED 20-30	
						KMPH) DURING THE DAY	
					_	PARTLY CLOUDY SKY WITH VERY	
25.06.2021	39	29	WNW/12	WNW/20	WNW/16	LIGHT RAIN/THUNDERSHOWERS	%
						PARTLY CLOUDY SKY WITH	
26.06.2021	38	28	W/10	W/16	NW/10	POSSIBILITY OF VERY LIGHT	
						RAIN/THUNDERSHOWERS.	7.7.
			_	_	_	PARTLY CLOUDY SKY.	
27.06.2021	39	28	W/08	W/10	W/12		
						PARTLY CLOUDY SKY. STRONG	
28.06.2021	40	29	WNW/20	W/20	W/24	SURFACE WINDS (SPEED 20-30	
						KMPH) DURING THE DAY	
						PARTLY CLOUDY SKY. STRONG	
29.06.2021	40	30	W/20	W/22	W/18	SURFACE WINDS (SPEED 20-30	
						KMPH) DURING THE DAY	

	TEMPERATURE NORMALS	
DATE	MAX	MIN
23 JUNE-24 JUNE	38.6	28.2
25 JUNE-29 JUNE	37.4	28.2

#### LEGEND:

### RAINFALL INTENSITY

Terminology	Rainfall Range in mm	Terminology	Rainfall Range in mm
Very Light Rainfall	Trace - 2.4	Heavy Rainfall	64.5 – 115.5
Light rainfall	2.5 – 15.5	Very Heavy Rainfall	115.6 – 204.4
Moderate Rainfall	15.6 – 64.4	Extremely Heavy Rainfall	>= 204.5

#### CLOUD AMOUNT

#### PROBABILISTIC FORECAST

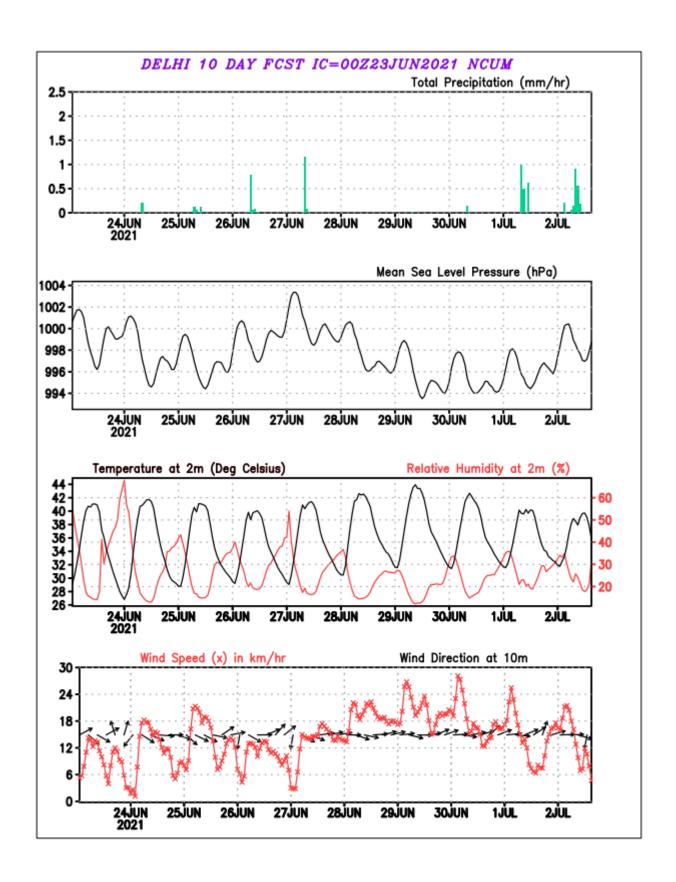
Terminology	Amount of Cloud in Octa	
Clear Sky	0	
Mainly clear sky	1 – 2	
Partly cloudy sky	3 – 4	
Generally cloudy sky	5 – 7	
Overcast	8	

Terms	Probability of Occurrence (%)
Unlikely	<25
Likely	25 - 50
Very Likely	50 – 75
Most Likely	>75





## Meteogram/EPSgram (10 days)

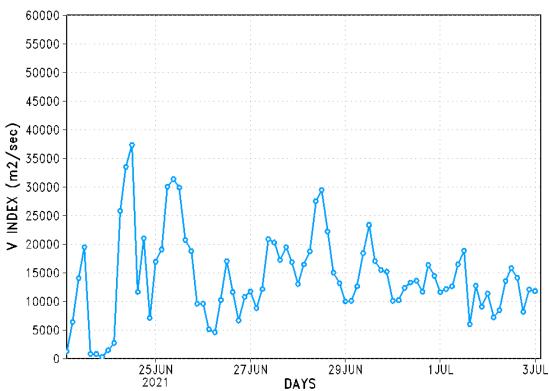




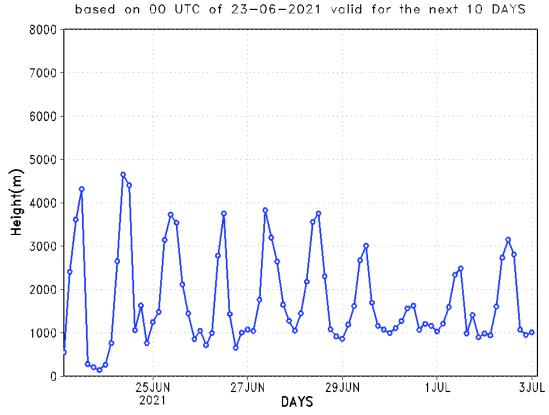


# Forecast of Ventilation Index and Mixing Height

IMD GFS(T1534) Ventilation Index (m2/sec) Forecast based on 00 UTC of 23-06-2021 valid for the next 10 DAYS



IMD GFS(T1534) Mixing Height (m) Forecast

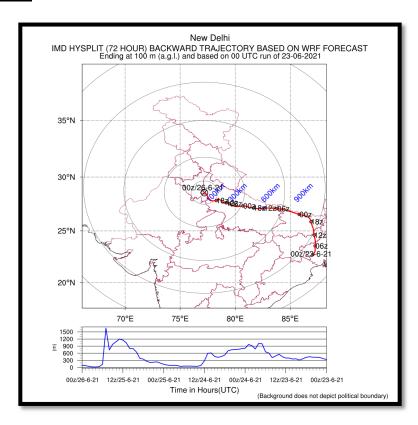






# **Wind Pattern Forecast**

### At 100m Height



### At 500m Height

