



DISTRICT WISE CLIMATE CHANGE INFORMATION FOR THE STATE OF TAMIL NADU TEMPERATURE PROJECTIONS FOR THIRUVARUR



21.1 About Thiruvarur

The district of Thiruvarur was carved out as a separate district by detaching Valangaiman Taluk from Thanjavur district and Thiruvarur, Nannilam, Kudavasal, Needamangalam, Mannargudi, Thirutturaippondi Taluks from Nagapattinam district on 01.01.1997. It lies between 10°16' and 11°50' North latitude and 79°27' and 79°50' East longitude. The total area of the district is 2377 sq. km. ^{1,2,3,4}

21.2 Climate of Thiruvarur

The district has a hot tropical climate the summer season, which is very oppressive, is from March to about the end of May. The average maximum temperature is about 35.19°C and the average minimum temperature is about 26.39°C. Dust storms, whirl winds and dusty winds blow from various quarters towards the end of May. ^{3,4}

21.3 Temperature Projections for Thiruvarur

The annual maximum and minimum temperature normal (1970-2000) of the district are 33.3 °C and 23.6°C respectively. ⁴ Projections of maximum temperature over Thiruvarur for the periods 2010-2040 (2020s), 2040-2070 (2050s) and 2070-2100 (2080s) with reference to the baseline (1970-2000) indicate an increase of 1.0°C, 1.9°C and 2.9°C respectively. Similarly, the projections of minimum temperature for the same periods indicate an increase of 1.1°C, 2.2°C and 3.3°C respectively.

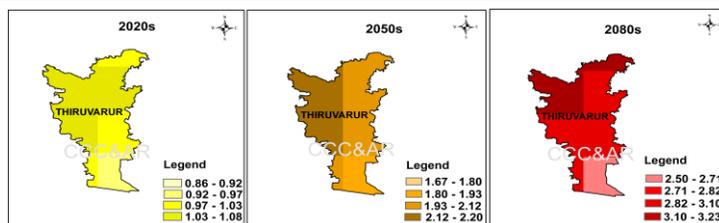


Fig 21.1 Changes in Max. Temperature for 2020s, 2050s & 2080s

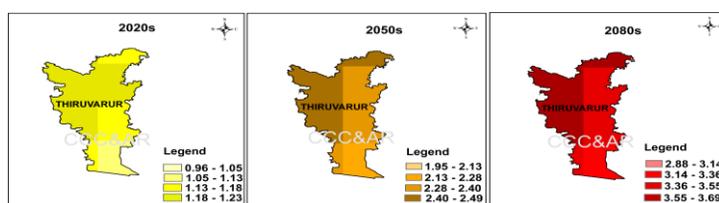


Fig 21.2 Changes in Min. Temperature for 2020s, 2050s & 2080s

Table 21.1 Changes in Temperature

Parameter	2020s	2050s	2080s
Maximum Temperature	+1.0°C	+1.9°C	+2.9°C
Minimum Temperature	+1.1°C	+2.2°C	+3.3°C

21.4 Key Findings

The average change of maximum and minimum temperature for Thiruvarur district are expected to increase by 2.9 °C and 3.3 °C respectively by the end of the century.

21.5 References

1. <http://www.tiruvarur.tn.nic.in/>
2. <http://www.mapsofindia.com/maps/tamilnadu/districts/thiruvarur.htm>
3. ENVIS 2015. Thiruvarur District. ENVIS Centre Tamilnadu, Available at tnenvis.nic.in/files/THIRUVARUR%20.pdf
4. Central Ground Water Board 2009. District ground water brochure Thiruvarur district, Tamil nadu. Central Ground Water Board South Eastern Coastal Region, Chennai. Available at cgwb.gov.in/District_Profile/TamilNadu/Thiruvaru.pdf
5. IMD, 2013. Temperature of Thiruvarur District. Regional Meteorological Centre. Chennai.