## Using ECMWF's Forecasts (UEF2022)



Contribution ID: 17

Type: Oral presentation

## **Dynamic data Visualization for Climate Data**

Thursday, 9 June 2022 09:30 (20 minutes)

I am the Founder & CTO at Blue Sky Analytics, a climate-tech startup empowering the world's decisionmakers with accurate, real-time, and standardized climate data. Using AI models, we crunch terabytes of raw satellite data to deliver environmental and climate intelligence like forest fire risk, drought risk, GHG emissions from power plants, air-quality monitoring, and more.

To holistically understand and leverage these terabytes of data we need a visualization platform that allows users to get insights at their fingertips and is compatible with all types of devices. That's where SpaceTime comes into the picture - a multi-data set mapper which visualizes datasets in a spatial and temporal context. The main purpose of SpaceTime is to host all kinds of datasets like temporal & spatial.

It is powered by two types of data sources I.e. vector and raster files. And comes with different data layers ranging from point, circle, symbols, cluster, polygons etc. The biggest advantage is that we can visualise the data using different colour scales like - min-max, quantize, quantize-nice & quantile and with the capability to customize colour palettes of your choice. In addition to that, it is easily compatible with mobile, desktop, and tablets on mobile networks and also accessible to colour blind people. Any dataset which has latitude, longitude (or a shape boundary) & timestamp can be visualised easily with a simple config JSON file.

SpaceTime allows us to pass different components like - boundary level, parameters, duration, data type, data selection type, data mode, etc.

Using all the amazing features we have already visualised many of our in-house datasets ranging from GHG emissions (dynamic point), water quality (raster), lake detection (polygon), air quality parameters like PM 2.5 (point & raster-based) etc.

Primary author: PURWAR, Kshitij (Blue Sky Analytics)

Presenter: PURWAR, Kshitij (Blue Sky Analytics)

Session Classification: Theme: Climate data visualisation and communication

Track Classification: UEF2022