

OBSERVER

The weather forecasting application is a popular tool used by people all over the world to stay informed about the weather conditions in their location. The application is designed to display the current weather conditions, as well as provide alerts for any severe weather that may be coming.

One day, a user opens the application to check the weather for their location. They see that it is currently sunny with a high of 30 degrees Celsius. The user is pleased to see that the weather is nice, and they decide to plan their day accordingly.

As the day goes on, the weather data for the user's location begins to change. There is a possibility of a storm bringing with it heavy rain.. The weather forecasting application notices the change and sends this new information to all of its users. The user's device should receive the information and show that it is now raining and the temperature is 20 degrees Celsius . The application also sends an alert to the user, warning them of the severe weather condition.

The weather forecasting application sends information like this:

- Weather condition (sunny/rainy/snowy)
- Current Temperature (Any real value)

You can consider two cases as severe weather

- Possibility of Storm
- Possibility of heavy Snow

You must have an interface where you can manipulate the current weather condition. And based on the provided weather condition you should inform the users.

Your task is to implement the weather forecasting application using an appropriate design pattern.