Regression Hackathon

Statement

Datasets:
This hackathon will analyze a real dataset containing information about a wind generation power station. There are 10 sensors located at different places of the station measuring temperature, wind speed and direction.

- Attribute Information (31 variables):
    1. **TLXH80**: Temperature measured at position X.
    2. **WSLXH80**: Wind speed measured at location X.
    3. **WDLXH80**: Wind direction measured at location X.
- Output:
    4. **WG**: Wind power generation of the station.

Description:
The file **TRdataEEMhourly.csv** is available with several months of data. The objective is to identify the best possible model to predict WG.

The file **TVdataEEMhourlyInput.csv** is provided containing only the input variables.

You should provide forecasts of WG for the validation set. The best forecast will be the one with **lowest value of RMSE** in the validation set.

The forecast should be uploaded to https://datathon.shinyapps.io/hackathon_MBD_2021_ICAI_Regression/ a text file.
Use the following code for writing the file with the obtained forecast. Adapt the name of the file with the name of your team:

```
write.table(ValForecast ,"TeamName.csv", col.names = FALSE, row.names = FALSE)
```

Prepare a one-page document with a comparative analysis of the models trained and upload it to Moodle. **Don't forget to include the Team number used during the Hackathon! Potential side effects of not including the Team number in the report are a 0 in the grade and make the teacher despair due to the futility of warning people.**