

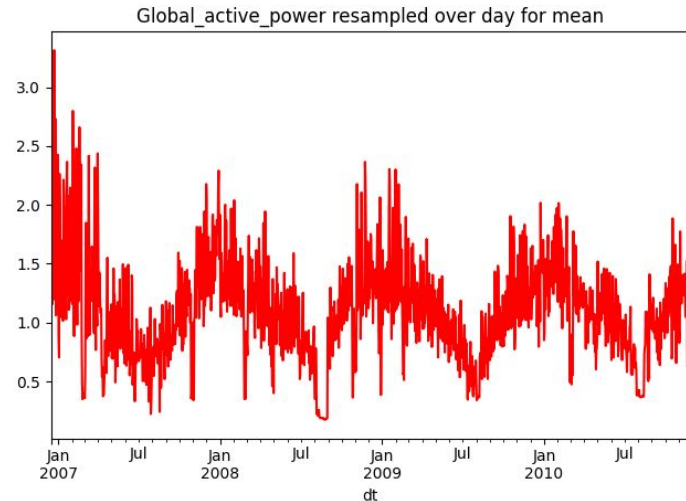
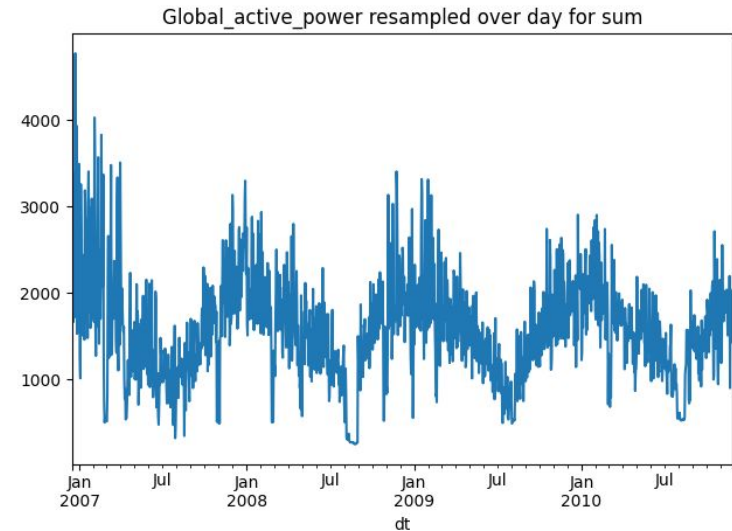


Household Power Consumption

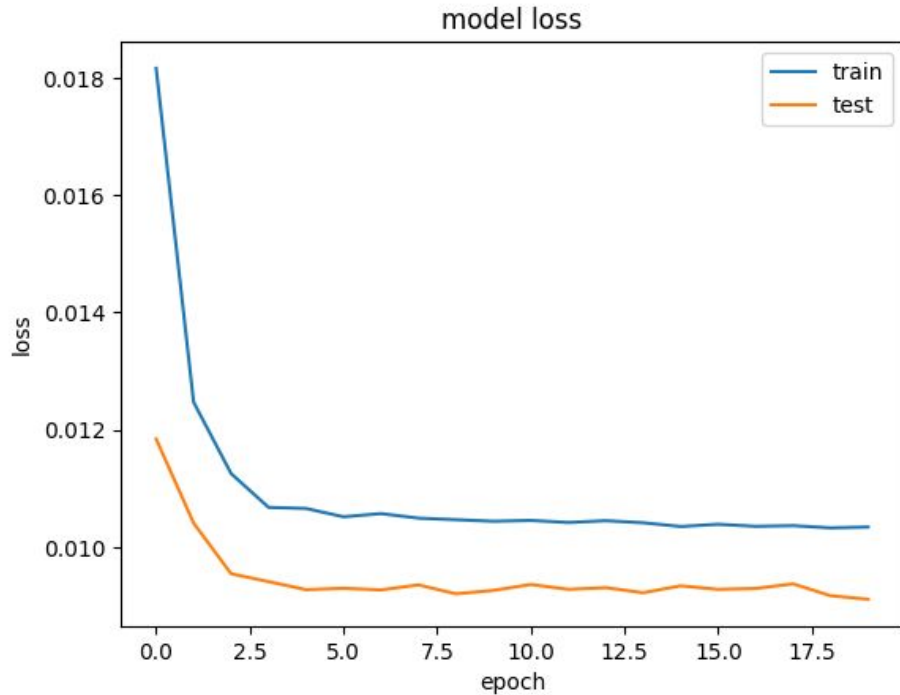
A data science modeling study by Terry Thompson

Active Power Usage

- Sampling of over 2 million households
- Trends are from 2006 - 2011

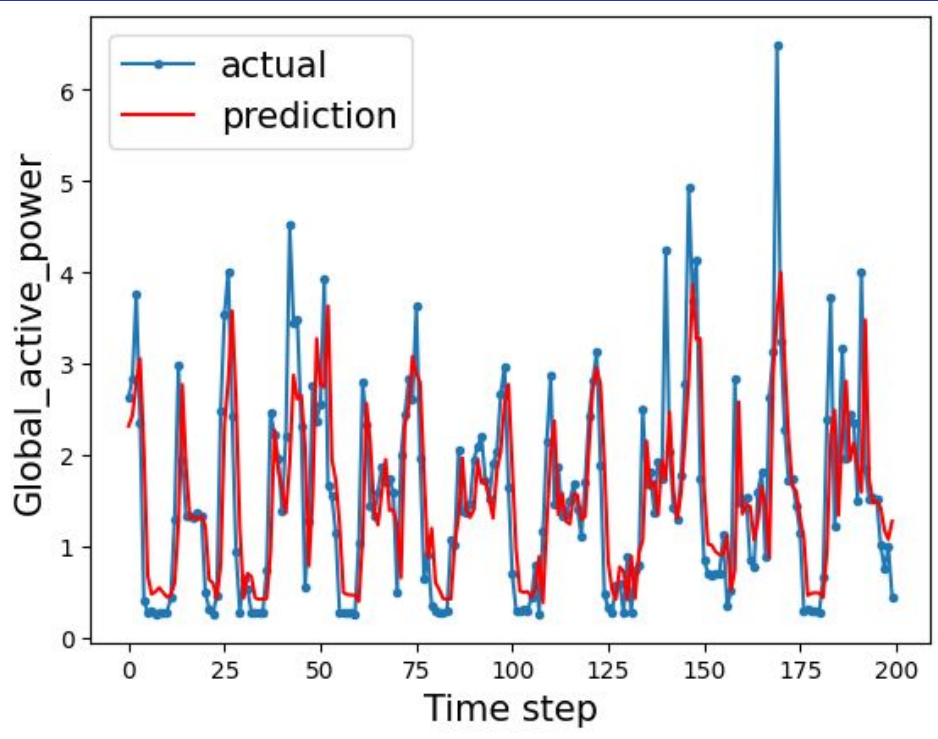


Modeling Loss



- LSTM Neural Network employed in predictions
- Network has 100 neuron layers
- Testing shows .61 RMSE

Model Prediction



- Model works well for overall trend
- Model could be used by utility companies

Conclusion

The model shows good overall trending

Further study could be done to:

- calculate costs in the future
- prepare utility companies for future usage

