9 Week AI Workshop Description (Taken from website)

9-week Online Deep-dive AI workshop UTD CS is thrilled to offer Artificial Intelligence Online Workshop for 9 weeks (June 8 to August 6, 2021) for College Students & Advanced Level High School Students. This camp actually runs Monday to Friday for all 9 weeks (10 am-5 pm) with a lunch break for an hour. Lead Instructor: Professor Kamran Khan, CS faculty, UT Dallas Registration fee: \$1000. We will send a camp certificate and t-shirt to each camper. We will also send a write-up/ recommendation letter based on the student's performance. Pre-requisites: Familiarity with Python programming, and high school level math. Willing to invest time & energy to learn advanced coding, data analysis skills and apply them to a real-life project.

LIST OF TOPICS:

- Introduction to Python programming, tools for data analysis such as NumPy, pandas, graphics
- 2. Getting started with data processing various file formats, loading into data frames, and performing basic statistical operations.
- 3. Introduction to machine learning, with examples and real-life scenarios.
- 4. AI/ML model building decision trees, neural networks, etc.
- 5. Deep Neural Nets using TensorFlow
- 6. Convolution Neural Nets(CNN) and Recursive Neural Nets (RNN)
- 7. Model Evaluation accuracy, error, ROC curve
- 8. Project Activities