INTERNSHIP: STUDENT DAILY REPORT

|  |  |
| --- | --- |
| Name of the Student | Vivek kumar Shriwas |
| Internship Project Topic | TCS iON RIO-125: Forecasting System - Project Demand of Products at a Retail Outlet Based on Historical Data |
| Name of the Organization | TCS iON |
| Name of the Industry Mentor | Sreekathiayini Ruthraiyah |
| Name of the Institute | Viswakarma University |

|  |  |  |
| --- | --- | --- |
| Date | Day | Hours Spent |
| 13/08/2023 | Day 27 | 3 hours and 30 minutes |
| Description:  **Self-learning Duration : 3 hours**  **Activity Report Duration : 30 minutes**  **Activities:**   1. **Model Evaluation and Fine-tuning (2 hours):**    * Conducted a comprehensive evaluation of the ARIMA-X model with integrated exogenous variables.    * Calculated evaluation metrics such as MAE, RMSE, and MAPE to assess the model's accuracy.    * Detected areas where the model performed well and identified potential areas of improvement.    * Initiated a brainstorming session to devise strategies for fine-tuning the model. 2. **Collaborative Discussion (1 hour and 15 minutes):**    * Participated in a virtual meeting with the project mentor and fellow interns.    * Shared the progress made on the ARIMA-X model and the challenges encountered.    * Engaged in a productive discussion about strategies for enhancing the model's performance.    * Received valuable feedback and suggestions for refining the model further. 3. **Documentation Update (15 minutes):**    * Added a new section to the project documentation covering the model evaluation results.    * Incorporated visualizations of forecasted values compared to actual values to provide a clear understanding of the model's performance.   **Challenges:** The main challenge today was interpreting the evaluation metrics in a meaningful way. While the model showed promising results, there's a need to strike a balance between different metrics to ensure the model's practical utility in real-world scenarios. | | |