

# **Summer Training TR-103 Prompt Engineering**

## **Day 13 Report**

### **What is a Function?**

A function is a reusable block of code created to perform a specific task. Functions make code modular, avoid repetition, and separate logic for better readability and testing.

### **What is Function Calling?**

Function calling is the process of invoking a function in code. It is important for executing specific tasks, managing multiple features in a program, and integrating AI or API-based interactions in real-time applications.

### **Simple Function Implementation: name()**

We implemented a basic function `name()` that required no input and returned a hardcoded output such as “Hello, I am Josh”. This activity helped us understand function definition, invocation, and return values in Python.

### **Multiple Function Calling – Interactive System**

We created multiple functions to simulate a basic personal assistant:

- `name()`: Returns the name of the assistant or user.
- `quotes()`: Provides a random motivational quote.
- `health_tips()`: Suggests hydration reminders, breathing exercises, and nutrition tips.
- `weather()`: Integrated with a Weather API to fetch real-time data including temperature, weather description, humidity, and wind speed. This demonstrated API requests, JSON parsing, and live data handling.

## Function Calling for Cricket Live Scores

We implemented a live cricket score tracker using criAPI with the following features:

- `live_score()`: Displayed current match details such as teams, runs, overs, wickets, and status.
- `match_summary()`: Provided an overall game overview.
- `player_stats()`: Showed top performer information.

This task involved handling API keys securely, fetching live data through Python's requests module, parsing JSON, and structuring the results into user-friendly outputs.