

Python Programming (Senior Group- Classes IX To XII)

Suggested theme: Python Programming

Stock Price Analysis: Build a tool that analyzes historical stock prices and visualizes trends or calculates basic financial metrics.

To-Do List Application: Develop a to-do list that allows users to add, edit, and delete tasks, with features like deadlines and priority levels.

Note : The above themes are only suggestive. On the day of the competition, the theme will be disclosed.

1. Competition Overview

- **Objective:** To encourage students to demonstrate their Python programming skills through creative and functional projects.
- **Eligibility:** Open to students in classes 9 to 12. Participants can compete in teams of 2 members.

2. Registration

- **Registration Process:** Participants must register online by the specified deadline.

3. Project Guidelines

- **Programming Language:** All projects must be developed using Python. Participants can use any standard libraries, but the use of non-standard or external libraries requires prior approval from the competition organizers.
- **Theme:** The competition may have a specific theme or allow open-ended projects. Participants should follow the theme if one is provided.
- **Originality:** Projects must be original and developed during the competition period. Previously submitted projects or plagiarized work will result in disqualification.
- **Content:** Projects must be appropriate for all audiences. Offensive, violent, or inappropriate content is prohibited.
- **Complexity:** Projects should demonstrate a good understanding of Python programming concepts, including but not limited to data structures, algorithms, object-oriented programming, and libraries.

4. Submission Requirements

- **Source Code:** Participants must submit their project's source code, ensuring it is well-documented and organized.
- **Documentation:** A README file describing the project, its purpose, features, and instructions for running the program. This should also include any external libraries used and their licenses.
- **Presentation:** A presentation explaining the project's concept, design, functionality, and any challenges faced during development.
- **Submission Format:** All files should be submitted via the designated online platform by the specified deadline. Late submissions will not be accepted.

5. Judging Criteria

- **Creativity and Innovation:** Originality and uniqueness of the project idea.
- **Technical Skill:** The complexity and correctness of the code, use of Python features, and problem-solving approach.
- **Functionality:** How well the project works, including the user interface (if applicable) and user experience.
- **Relevance to Theme:** How closely the project aligns with the competition theme (if applicable).
- **Presentation:** Clarity and effectiveness of the video presentation.

6. Evaluation Process

- **Initial Review:** A panel of judges will review all submissions based on the judging criteria. They may request additional information or clarifications from participants.
- **Final Round:** Selected finalists may be invited to present their projects live via video conferencing and participate in a Q&A session with the judges.

7. General Rules

- **Code of Conduct:** Participants must adhere to a respectful and professional code of conduct. Any form of cheating, harassment, or inappropriate behaviour will result in disqualification.
- **Technical Requirements:** Participants are responsible for ensuring they have the necessary equipment and internet connection for the competition.
- **Disqualification:** Failure to comply with the competition rules and guidelines will result in disqualification. Web browsing during the competition is strictly prohibited.
- **Camera Position** - During the competition, the camera should be positioned so that both the computer screen and the participants (as shown in Figure 1) are visible to the host school.