

# 2019 Northern Indiana High School Coding Competition Contest Rules

Teams violating any of the rules shall be disqualified and eliminated from the competition and their submitted solutions shall be voided.

## General Rules

- Programming language reference books and manuals are allowed. Searching for solutions related to competition problems online is not allowed. Teams are allowed to use other apps on their computer, such as calculator and calendar.
- Searching through code stored locally on your competition computer is not allowed, including past homework assignments. However, teams are allowed to print any helping material, including code, and bring it to use in the competition in a 2-inch maximum binder.
- Each team is only allowed to use one computer. All members should share the computer. Additional computers must be stowed away.
- Team member phones should be off or left in the charge of the coach. No texting, messaging, browsing, etc. are allowed during the competition. If needed, members can step out of the competition room to make calls/text in case of emergencies.
- The team coaches are not allowed to help the team solve the competition problems. Coaches can help with hardware setup issues. For all other help, coaches must get approval from one of the judges.

## Coding

- Team's program must follow the instructions to accept input and display output in certain format. Details will be discussed during the morning reception.
- Judges will only use valid inputs to test your program. So input error checking is not needed.
- For each problem, save your program as a single file and name it as *TeamName\_Problem1.cpp* (java, py, cs, jvs), *TeamName\_Problem2.cpp*(java, py, cs, jvs), etc.

## Compilation

- Only programs that compile will be accepted as valid submissions.
- In case where a submitted program does not compile in the judges' computer, the team will be notified of the error message so that they shall fix it within the total duration of the competition round.
- For libraries and other compiler compatibility issues, the team coach can act as an intermediate between the judges and the team. Teams using libraries that are not part of standard installation must notify the judges during or before their submission. Only publicly available libraries shall be used. During grading, judges must be able to download and use these.

- If the submitted program can be compiled on the team's computer but not the judges', the judges will use team's computer to test it during the break period.

## Program Submission

- Teams need to have a Google (or Gmail) account to make the submission.
- Submission website: <https://goo.gl/forms/lfBVUiMAgtora9533>
- A submitted solution to a problem will only be accepted if it compiles and returns the correct answer to at least one of the test input sets.
- If the solution does not give the correct answer to all the test input sets, it is considered incomplete. An incomplete solution can be resubmitted until all the answers are correct.
- Only complete solutions receive a time bonus – see details later.
- If a problem solution is resubmitted, the highest score of all the submissions is kept. The score is non-cumulative, meaning that each submission is scored on its own merits.

## Grading Rule

- Each submission will be tested with 10 inputs. A correct output is worth of 1 point for Round 1 programs and 2 points for Round 2 programs. Therefore, the base score of each Round 1 program is in the range  $[0, 10]$ , and the base score of each Round 2 program is in the range  $[0, 20]$ .
- A program is considered non-workable if it does not compile at all or if it compiles successfully without warnings but still does not produce correct results to any of the test cases used by the judges. No partial credit is given to non-workable programs.
- A complete solution may receive a time-based bonus that starts at 6 if it is submitted within the first half hour of the contest, and then decreases by 1 every 15 minutes.
- The adjusted score of each Round 1 program and each Round 2 program that a team might receive is in the range  $[0, 16]$  and  $[0, 26]$ , respectively.

## Advancement Score and Final Score

- A team with at least one partially working submission will advance to Round 2.
- If a team does not advance to Round 2, they can still work on the Round 2 problems, but their programs will not be graded.
- The final competition score will be the cumulative score of Round 1 and Round 2.