

Rules for Junior Section

Rules:

1. You may work in groups of 2 or by yourself (Based on the number students)
2. On your submission, write (in that order):
 - (a) Team number
 - (b) Problem number
 - (c) Answer
3. If you write multiple answers, it will be assumed wrong.
4. Express your answer as exact numbers such as π rather than 3.14.
5. You may not use any computing devices other than your brain.
6. Infinity is a valid answer.
7. Facts you may find useful:
 - (a) $n! = (n)(n-1)(n-2)\dots(3)(2)(1)$
 - (b) $\lfloor x \rfloor$ is the greatest integer less than or equal to x

Sample Problems for Junior Section

Compute (1 minute)

$$1 + 3 - 2 + 5 - 4 + 7 - 6 + \dots + 99 - 98$$

Compute (2 minutes)

$$2^0 + 2^1 + 2^2 + 2^3 + \dots + 2^{10}$$

Compute (5 minutes)

$$1 + \frac{1}{1 + \frac{1}{1 + \dots}}$$