

## MCWC Hectoc Challenge

Please read the rules carefully prior to the event, as there will be no time to answer any questions during the event itself.

40 questions will be presented to the participants with a 20 minute time limit.

### Rules:

1. Six digits from 1 to 9 are given. The target is always 100. All six digits must be used in the order given, along with operators for

- Addition “+”
- Subtraction “-”
- Multiplication “\*” or “x” or “.”
- Division “/” or “:”
- Brackets “(“ and “)”
- Power “^” (for example  $2^3$ ) or you write it this way:  $2^3$

Single digits can be combined into larger numbers.

For example:

123456

Solution:

$$1+(2+3+4)*(5+6) = 100$$

987654

Solution:

$$98+7-6+5-4 = 100$$

271127

Solution:

$$2^7-(1+1+2)*7 = 100 \text{ (“^” means power, the first number is the base and the second number is the exponent).}$$

2. Each correct answer will be rewarded with one point; each wrong answer will get a penalty of half a point.
3. Should two or more participants reach the same number of points, the one with the faster time will be ranked higher.
4. Should a participant decide to finish early, he or she should raise a hand and remain silent and seated. In case of an early finish, each unanswered question will result in a penalty of half a point.
5. Once a participant has decided to finish early and afterwards wishes to continue, the participant will not be able to finish early again.
6. Any disturbances by a participant during the competition will result in a disqualification.