

FEYNMAN'S FINAL PROBLEM

STUDY GUIDE



12·13·14 SEPTEMBER

Introduction:

Inspired by Richard Feynman's curiosity, love for puzzles, and interdisciplinary approach to science, Feynman's Final Problem is a high-stakes Physics challenge that tests applied scientific thinking. While grounded in physics, the problems may draw on related fields to test depth of reasoning and creativity. Across three immersive rounds, delegates will face a blend of analytical rigor, creative problem-solving, and competitive gameplay.

Round 1:

Delegate Count: 2–3 **Duration:** 2 hours

The opening round combines fast-paced buzzer MCQs with in-depth written problem solving. There are two sections (A & B).

Section A: Buzzer MCQs

20–30 MCQs will be displayed on a screen. The first team to buzz the correct answer gains a point. There is a penalty of half a point for incorrectly guessing the answer to the MCQ. The questions will be timed.

Section B: Written

The teams would be distributed 4-6 long form questions, worth 3-6 points each. They would have to carry out calculations, multi-step reasoning and clear scientific explanation to gain points in this section. Partial credit will be awarded for correct working.

Note: Scores carry forward to the final total. Calculators are allowed. This is an accumulation round.

Round 2:

Delegate Count: 2-3

Duration: 30 minutes per match

Three teams face off at a table in this strategic science card game. There are two decks: Numbers Deck (values 1–12) and Questions Deck (science questions). Each team starts with 4 Numbered Cards which are kept secret, and 4 Question Cards (face-down). Teams choose one

Number Card (visible) and one Question Card (hidden).

Highest number answers first; may skip or attempt.

 Correct: Earn points equal to Number Card value (with multipliers for later attempts).

• Incorrect: Lose half the Number Card value; turn passes with a multiplier boost (1.5×, 2×, 2.5×).

• Skip: No gain/loss; passes to next team with multiplier boost.

The person that correctly answers the question keeps their card. The remaining teams discard the card. After 4 cycles, the round concludes. Bonus points for most question cards kept.

Note: Wrong answers carry negative marking. Scores carry forward to the final total. 9 teams will be accommodated at a time (3 teams per table competing against each other). The rest of the teams will wait in the waiting room. This is an elimination round where the top team from each table advances to the final round.

Round 3:

Delegate Count: 3 Duration: 2 hours

The top 6 teams battle on a life-size science board game. A delegate will act as the pawn and the other two as the 'brains' answering questions and solving challenges. Teams will roll a dice to move across the following spaces;

Question Spaces: Science questions with varying difficulty & points.

• Challenge Spaces: Timed experiments, riddles, or problem-solving tasks.

Event Spaces: Random twists (e.g., swap places, skip turn).

Points will be awarded for correct answers and successful challenges.

Note: Final ranking is based on cumulative scores from all three rounds. This is the concluding round. Teams with the highest cumulative scores will be awarded Winners and Runners Up respectively.