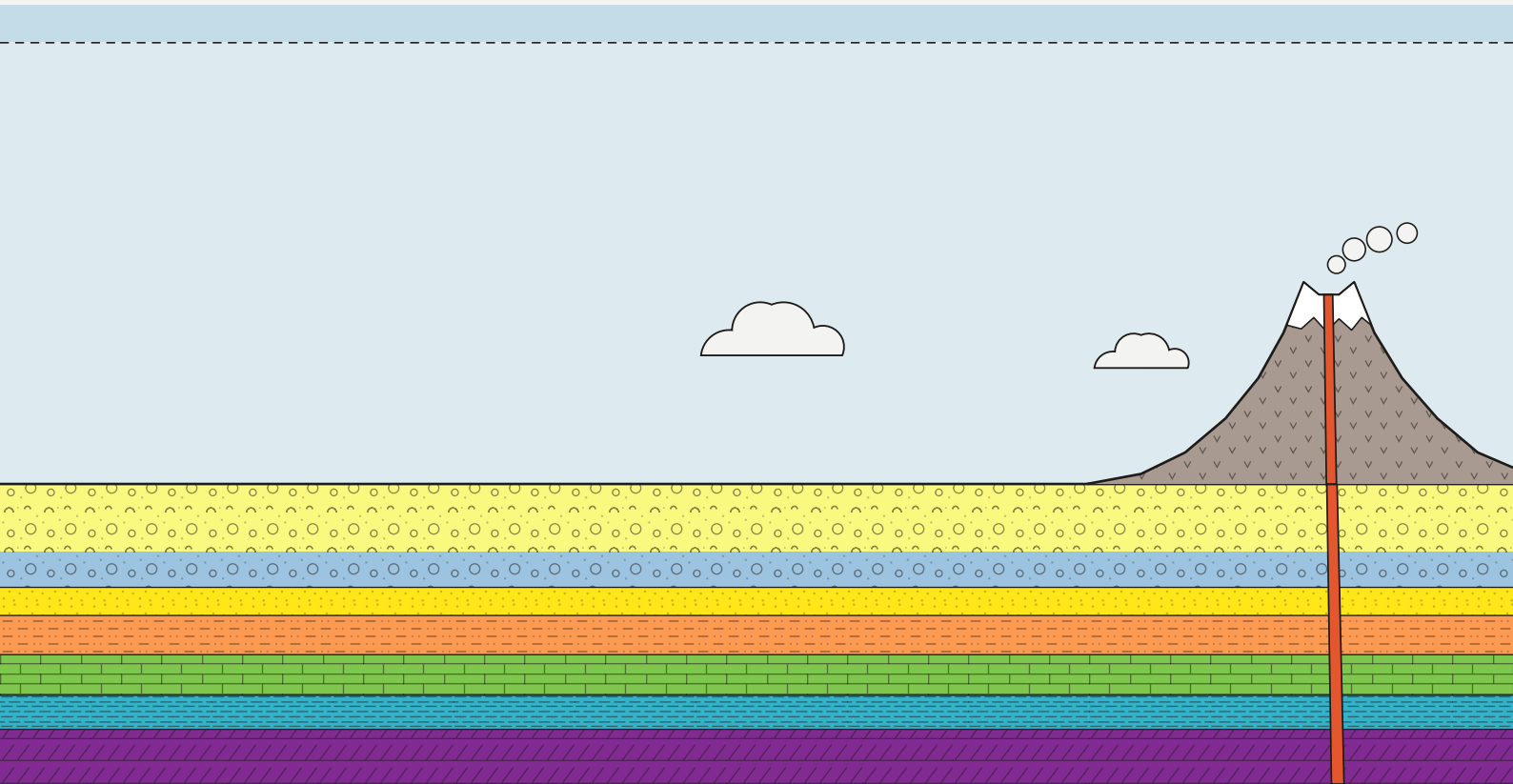
INTERNATIONAL EARTH SCIENCE COMPETITION

Vision & Mission

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Vision and Mission

Earth science is the study of the planet we live on: its air, water, life, soils and rocks, and the processes that connect them, from the weather in the atmosphere to the slow convection of the mantle. It explains why it rains, where groundwater comes from, why some volcanoes explode while others flow, how earthquakes start and how the climate has changed over Earth's history. Our society urgently needs talented earth scientists, researchers and innovators to address global challenges including climate change, water security, natural hazards, sustainable use of soils and raw materials, and the protection of ecosystems.

The International Earth Science Competition offers students a platform to challenge their analytical and problem-solving skills, explore diverse earth science concepts, and delve deeper into this fascinating discipline beyond the standard school curriculum. We believe that blending education with friendly competition can inspire students to develop a lasting passion for earth science, potentially leading to fulfilling careers in research, industry, education and scientific innovation.

The International Earth Science Competition aims to be accessible to all students from all countries, regardless of their background, school or institution: all you need is a pen, paper and an internet connection to join!

What makes IESC unique?

While competition is part of IESC, our core mission is to foster genuine engagement with earth science, sparking curiosity and encouraging further exploration in this and related scientific fields. IESC is a learning journey, enabled by diverse problem formats that enhance a student's understanding through practical application. Key aspects that distinguish IESC include:

- **Internationality**: From the very first round, IESC is a truly global event. All participants tackle the same challenges, ensuring fair assessment and fostering international connections.
- **Digital Accessibility**: We use the power of the internet to open participation to students everywhere, regardless of geographic location or school affiliation. While teacher guidance is beneficial, motivated individuals can participate independently from anywhere.
- **Exploration of Theory and Practice**: IESC embraces the full scope of earth science. The competition covers nine areas, from the air down to the mantle: atmosphere and weather, climate, biosphere and ecology, soils, water, oceans and ice, rocks, minerals and Earth history, earthquakes and Earth's interior, volcanoes, and plate tectonics. These topics are presented through diverse problem formats that combine theoretical understanding with practical application, requiring students to read maps and data, perform calculations and reason about real Earth systems.
- **Real-World Research**: Bridging the gap between academic learning and current research is vital, especially in a field where satellites, sensors and field campaigns produce new data every day. IESC problems typically incorporate concepts and data from recently published

research papers. This unique feature provides many participants with their first exposure to actual earth science research: a field where new discoveries are published daily, sometimes even by students like you!

- **Scaling Difficulty Levels**: Our problems are designed to engage both experienced earth science enthusiasts and those beginning to explore the subject beyond the classroom. The difficulty ranges from approachable exercises that reinforce foundational concepts to advanced challenges that introduce novel formats and require deeper analytical thinking. This ensures a rewarding and intellectually stimulating experience for all participants.
- **Online Tools for Educators**: We equip teachers and schools with resources and support. A dedicated teacher interface allows for streamlined management of student submissions, results tracking, certificate access, and supervision of the Final Round exam.
- **Local Communities & Ambassadors**: IESC encourages the formation of local student groups focused on earth science. Our Ambassador Program empowers motivated students to inspire peers, organise local events, and build vibrant communities centred around a shared interest in our planet.