

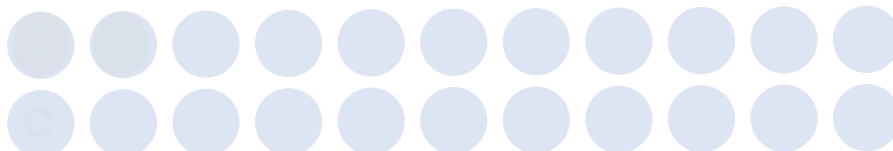


Welcome to The Amazing Bio-Hunt! In this month long virtual hunt, daily clues and tasks will lead you to fun discoveries and meetings, and make you eligible to win many, many biotechnology education prizes!

To validate your answer and collect the ticket pieces, use your answer as an URL on our site. This week corresponds with Day 5- Day 9 of the Cambridge Science Festival.

Find more info on <https://amino.bio/pages/the-amazing-bio-hunt>

Grand Finale Code:



Bacteria can read the DNA we give them, and this team of 2008 Nobel prize-winning scientists found the code that would allow bacteria to be Green Fluorescent thanks to a protein. One of the three scientists took the glow further and his lab turned it into all the colors of the rainbow! Thanks to his lab's work, scientist can light up microorganisms and neurons for their research.. and even make art on agar.

What scene did this bacteria painting show?

Ticket:

Question:

Thanks to a crucial black and white image made by one of our well-loved women pioneers in science, an important discovery was made. From the announcement at 52.204°N 0.1182°E, you simply have to walk down the street to get to the old laboratory where this discovery changed the course of biology. Many other influential discoveries were made in this lab - but most were not in biology! Scientific disciplines often overlap and this was not actually a biology lab.

What scientific discipline is this lab better known for?

CLUE 4

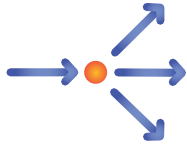


LABS

Answer:

Ticket:

CLUE 5



ACTION & REACTION

Question:

We can now use biology like we do electronics - with switches and outcomes, actions, and reactions. Just like electronic circuits, these genetic circuits allow researchers to control when an event happens -in this case, a genetic event. Why not have a genetic switch turn on pigment production only in the presence of mercury to give you a biological mercury sensor? Create a smell only in the presence of sunlight? Or even detect the presence of a virus like COVID? Exciting stuff! See if you can find the first genetic circuit ever discovered by scientists.

What is the 'action' (or presence) that activates this circuit?

Answer:

Ticket:

Question:

There are so many discoveries that made biotechnology possible. But, in order to really leverage the amazing power of biology, we also had to discover organisms that were able to read that new language for us and make biological products from it! These organisms become miniature factories and a handful are classically used in research. Called model organisms, one of these has 'micro-organisms siblings' with the same name that are sometimes in the news for causing illnesses like food poisoning.

Which model organism is this?

CLUE 6



DISCOVERY

Answer:

Ticket:

CLUE 7



FLIGHT

Question:

These water bears went on a long flight that ended with a bang. Now scientists wonder if they have colonized one more unwelcoming terrain.

In what state were these water bears for the duration of their voyage?

Answer:

Ticket: