

# THE SCOOP

The October Newsletter is OUT!!

## Scientist of the Month

### Otto Robert Frisch

"When anybody contradicted Einstein he thought it over, and if he was found wrong he was delighted, because he felt that he had escaped from an error, and that now he knew better than before."

### Scientist Birthday:

1st October' 1904

### Trivia about the scientist

Austrian-British nuclear physicist, born in Vienna, who, with his aunt Lise Meitner, described the division of neutron-bombarded uranium into lighter elements. He named the process fission, borrowing a term from biology (1939). At the time, Meitner was working in Stockholm and Frisch (1934-39) at Copenhagen under Niels Bohr, who brought their observation to the attention of Albert Einstein and others in the

## *Discovery in the month October, 2019:*

### Surprising Discovery about First Four Legged Creatures:

A surprising discovery about the first creatures to venture onto land, known as tetrapods, has been made.

Superbly preserved fossils from Russia, cast new and surprising light on one of the earliest tetrapods - the group of animals that made the evolutionary transition from water to land and ultimately became the ancestors not just of amphibians, reptiles, birds and mammals, but of ourselves. The fossils were excavated with support of a grant from the National Geographic Society and described by an international team in the leading scientific journal Nature. Tetrapods evolved from a group of animals known as the Tetrapodomorpha which, in turn, evolved from ancient Sarcopterygii (lobe-finned fishes) around 390 million years ago in the middle Devonian period; their forms were transitional between lobe-finned fishes and the four-limbed tetrapods. The first tetrapods (from a traditional, apomorphy-based perspective) appeared by the late Devonian, 367.5 million years ago, according to wikipedia, the first tetrapods evolved from fishes during the Devonian period, which ended about 360 million years ago.

## *Discovery/Invention in the month of October previously:*

October 2, 1852 - William Ramsay was a British chemist who discovered neon gas.

United States. He did research with James Chadwick 1940-43, and was head of the Critical Assembly Group on the Los Alamos project 1943-46. After World War II, Frisch became a science writer on atomic physics for the layman.



Neon was discovered when Ramsay chilled a sample of air until it became a liquid, then warmed the liquid and captured the gases as they boiled off. The gases nitrogen, oxygen, and argon had been identified, but the remaining gases were isolated in roughly their order of abundance, in a six-week period beginning at the end of May 1898. First to be identified was krypton. The next, after krypton had been removed, was a gas which gave a brilliant red light under spectroscopic discharge. This gas, identified in June, was named "neon", the Greek analogue of the Latin *novum* ('new') suggested by Ramsay's son. The characteristic brilliant red-orange color emitted by gaseous neon when excited electrically was noted immediately. Travers later wrote: "the blaze of crimson light from the tube told its own story and was a sight to dwell upon and never forget."

### *Company of the Month-*

#### **Aurobindo Pharma**

Aurobindo Pharma Limited is a Hyderabad-based pharmaceutical manufacturing company in India. The firm's strong point includes six therapeutic areas including antibiotics, central nervous system products, gastroenterological, antiretroviral, cardiovascular products, and anti-allergic.

### *Joke of the Month-*

Question: What is the pick-up line for chemists?

Answer: You must be copper and tellurium because you sure are CuTe!

