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History of X-ray

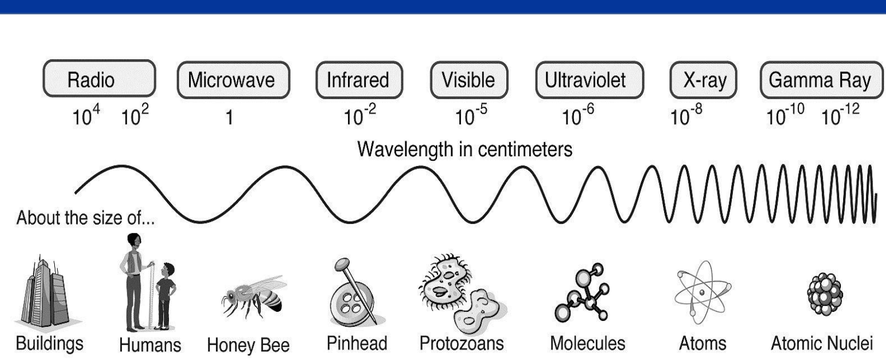
History

X-rays were discovered by German scientist Wilhelm Conrad Roentgen in 1895. Roentgen referred to the radiation as "X", to indicate that it was an unknown type of radiation. The name stuck, although many of his colleagues suggested calling them Roentgen rays. Roentgen received the first Nobel Prize in Physics for his discovery in 1901.

The first known human to be killed by X-rays was Clarence Dally, who had spent a number of years working on Thomas Edison's X-ray light bulb. After years of work, his hair fell out and his skin erupted in lesions that wouldn't heal. Burns on his hands became cancerous, and he had both of his arms amputated. He died at the age of 39.

Shoe-fitting fluoroscopes were X-ray machines installed in shoe stores from the 1920s. Their aim was to check the if the shape of the shoe fit the toes properly.

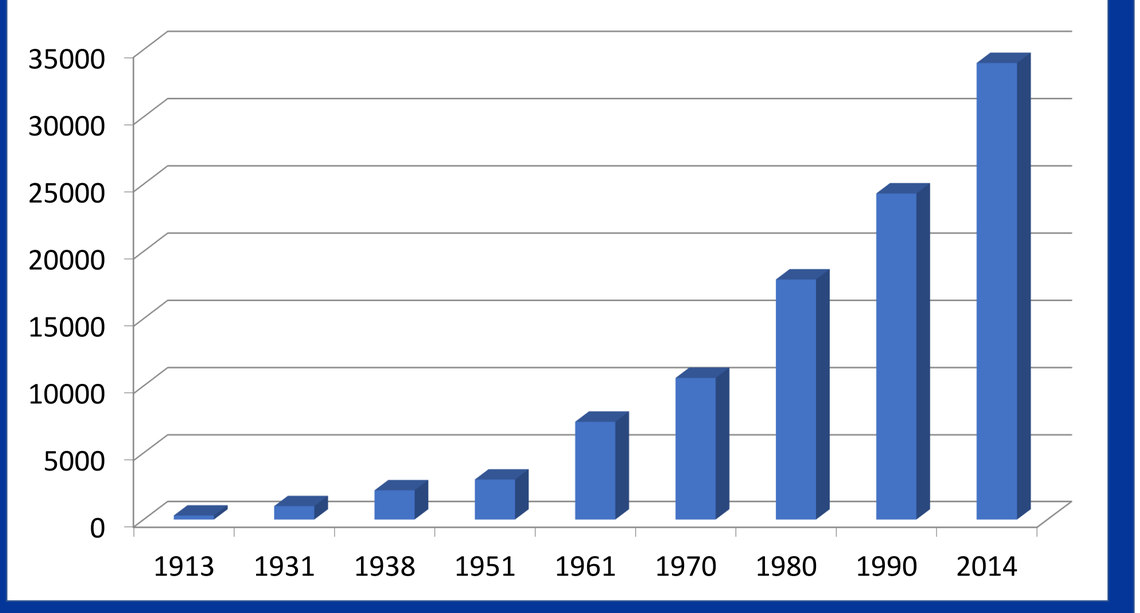
Did you know?



X-rays are a form of electromagnetic radiation. Most X-rays have a wavelength ranging from 0.01 to 10 nanometres.

Radiation is part of our daily life. Common examples where we use radiation are electricity generation, medical and industrial applications.

Number of radiologists in the US.



Over the years radiology has become evermore routine. The frequency of x-ray examinations in about one per year per capita in , developed' countries.

X-rays are produced by an X-ray generator. In interactions with matter, x-rays are ionizing radiation and produce physiological effects such as the risk of mutations or cancer in tissue.

Diagnostics

The first use of an X-ray for clinical purposes was by John Hall-Edwards in Birmingham, England in 1896, when he X-rayed a needle stuck in the hand of his associate. He was also the first to use X-rays in a surgical operation.

Antoine Béclére was a pioneer in radiology. In 1897 he created the first laboratory of radiology in Paris. He set up the first X-ray machine in which patient was strapped and moved around for complete X-rays of the chest. For those taking pictures he introduced safety equipment, lead aprons and lead rubber gloves.

In 1914 Marie Curie developed radiological cars to support soldiers injured in World War I. The cars would allow for rapid X-ray imaging of wounded soldiers so battlefield surgeons could quickly and more accurately operate.

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Acknowledgements & references

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