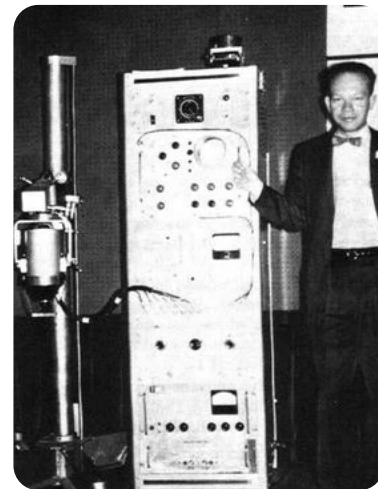


The One with Important Moments in the History of Nuclear Medicine

- 1896** – Henri Becquerel discovered mysterious “rays” from uranium.
- 1897** – Marie Curie named the mysterious rays “radioactivity.”
- 1913** – The first study on the intravenous injection of radium for therapy of various diseases was published.
- 1924** – Georg de Hevesy performed the first radiotracer studies in animals.
- 1936** – The first clinical therapeutic application of an artificial radionuclide, phosphorus-32, is used to treat leukemia.
- 1939** – Carbon-14, a radioactive tracer widely used in medical and drug research, is discovered.
- 1951** – The U.S. Food and Drug Administration (FDA) approved sodium iodide 1-131 for use with thyroid patients. It was the first FDA-approved radiopharmaceutical.
- 1952** – Hal Anger and his BER colleagues introduce a revolutionary new technique for radionuclide imaging. The gamma camera will become the “workhorse” of nuclear medicine for the next 50 years.
- 1962** – David Kuhl introduced emission reconstruction tomography. This method later became known as SPECT and PET. It was extended in radiology to transmission X-ray scanning, known as CT.
- 1971** – The American Medical Association officially recognized nuclear medicine as a medical specialty.
- 2000** – Time Magazine recognizes Siemens Biograph as the invention of the year.
- 2000s** – The integration of nuclear medicine techniques with other imaging modalities like MRI and CT has led to the development of hybrid imaging technologies and has greatly improved diagnostic accuracy and treatment planning.
- 2004** – The Society of Nuclear Medicine celebrates its 50th anniversary.
- 2008** – The first hybrid PET/MRI system for humans, created by Siemens, was installed.
- 2024** – Siemens Healthineers receives FDA clearance for the Biograph Trinion, a high-performance, energy-efficient PET/CT scanner with a wide range of clinical capabilities and a low lifetime operational cost.



Hal Anger and his first scintillation camera, which he displayed at the Fifth Annual Meeting of The Society of Nuclear Medicine in June 1958, in Los Angeles. (Credit: <https://pubmed.ncbi.nlm.nih.gov/395287/>)

About Nuclear Medicine Exams

Nuclear medicine imaging uses small amounts of radioactive materials called radiotracers that are typically injected into the bloodstream, inhaled or swallowed. The radiotracer travels through the area being examined and gives off energy in the form of gamma rays which are detected by a special camera and a computer to create images of the inside of a patient's body.

Nuclear medicine plays an essential role in many medical specialties, including cardiology, oncology and neurology, and allows physicians to cost-effectively obtain medical information that would otherwise be unavailable or would require more invasive procedures, such as surgery or biopsy.

'Nuclear Medicine' in Other Languages:



Spanish - medicina Nuclear

Japanese - 核医学 (Kaku igaku)

German - Nuklearmedizin

Russian - ядерная медицина (yadernaya meditsina)

Dutch - nucleair medicijn

Sources:

The Society of Nuclear Medicine and Molecular Imaging: <http://www.snm.org/AboutSNMMI/Content.aspx?ItemNumber=4175>
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