

FIRST CASSEN PRIZE AWARDED TO INVENTOR OF GAMMA CAMERA

Anger Recognized for Seminal Role in Nuclear Medicine's Technological Revolution

THIS JUNE'S PLENARY SESSION, AT the Annual Meeting in Orlando, will honor Dr. Hal O. Anger by awarding him the first Cassen Prize, for his invention of the gamma,

or scintillation camera, in 1956, and for related achievements in nuclear medicine. This new prize recognizes significant achievement in nuclear medicine science, awarding \$25,000 to a living scientist whose work has made a major advance in clinical or nuclear medicine science.

Public recognition, however, was not at first easy to come by for Dr. Anger. When he first presented his invention to his research sponsors, the Atomic Energy Commission (AEC) and University of California, Berkeley, they showed no interest in

owning the patent—and later regretted their loss.

Dr. Anger went on to reap healthy profits as patent owner. The marketplace reflected the camera's significance in nuclear medicine.

The gamma camera "brought nuclear medicine into serious resolution," said Dennis D. Patton, MD, president of the SNM Education and Research Committee, referring to how the Anger camera finally allowed imaging in any direction, at any angle—at more than just the horizontal. In fact, there is an historical parallel of sorts between Anger's invention and that of the man in whose honor the prize was created: Benedict Cassen's rectilinear scanner brought imaging to nuclear

medicine for the first time, while Anger's camera brought larger scope to imaging, so that one saw a larger part of the body. It also allowed dynamic scanning, so that a physician may watch images change over time. Anger's camera design was so elegant that, although he "developed this over 30 years ago, the basic design remained the same until two years ago," said Dr. Patton. In the realm of modern high technology—where basic computer designs seem to change monthly—that alone is a remarkable achievement.

Dr. Anger's AEC grant at Berkeley was given for basic science, and not specifically for nuclear medicine. Dr. Patton said that when Dr. Anger devised the camera, his sponsors could not envision what use there would be in taking pictures of gamma rays emerging from a patient, so they waived their right to patents on the design—only to try to retrieve those rights later, when it was too late.

Holder of 15 U.S. patents, Dr. Anger also invented or designed other instruments that affected nuclear medicine, such as the well-counter, which allows sample-insertion within a crystal for maximum sensitivity; the positron camera; the whole-body scanner, a series of detectors that can image activity in the whole body; and the multiplane tomographic scanner. "In fact, his contributions to our field have undoubtedly saved thousands of lives and affected favorably the health of our fellow men throughout the world for over 30 years," wrote Robert A. Kraft, MD.

These contributions have not gone unnoticed: Dr. Anger has received at least seven major honors, including the John Scott Award in 1964 for the invention of the positron scintillation camera; the Modern Medicine Award in 1975 for distinguished achievement; the SNM First Western Regional Award in 1976 for distinguished contribution to nuclear medicine; the Société Française de Biophysique medal in 1988; and the George von Hevesy Memorial Medal in Vienna, 1991.

The funds for the Cassen Prize were donated by the estate of Mary Wylie Cassen. The seven-member Cassen Prize Committee, assisted by an advisory panel of experts, selected Dr. Anger for this year's prize. Mrs. Mitsi Bland will present the prize, in recognition of her role in making the award a reality.

Dr. Patton stated that the prize may be awarded on average every three years. ■



Hal O. Anger, ScD