

CardiArc, Ltd. Receives New Patent Allowances FOVea™ “Edge Effect” Technology Expands Scanners’ View

LUBBOCK, Texas – May 31, 2006 – CardiArc, Inc. today announced it has received additional Notices of Allowance from the U.S. Patent and Trademark Office bringing to 30 the number of patents issued or pending surrounding the company’s ultra-compact CardiArc® heart imaging system.

The CardiArc imaging system, approved for marketing by the U.S. Food and Drug Administration in January, provides images of heart blood flow with up to 3 times the clarity of other SPECT systems and up to 20 times more quickly. It is as small as an executive chair. The device has no visible moving parts. To maximize comfort, patients sit upright, without rotating or holding arms over their heads. Scan times are very fast, ranging from the currently typical 15-20 minutes down to as little as 2 minutes or less, at physician discretion. The device will be displayed June 3-6 at the Society of Nuclear Medicine annual meeting and conference in San Diego.

Several of the most recent patent allowances are for a new technology called FOVea™, which can be used with virtually any planar or SPECT nuclear medicine system to dramatically expand its field-of-view with only minimal modifications. CardiArc, Inc. is currently in discussions with several manufacturers regarding application of the FOVea technology beyond the CardiArc heart system.

“By modifying the scintillation crystals used by gamma camera systems to create images, the area imaged can be expanded 15-35 percent, allowing larger patients to be imaged in fewer passes and enabling imaging of larger regions, closer to the body than with existing cameras,” explained Jack Juni, M.D., the inventor and CTO of CardiArc. “This results in more rapid patient imaging procedures and permits smaller, less expensive equipment to do procedures presently requiring larger, more expensive equipment.” In some instances, such as nuclear breast imaging, the new technology may permit construction of cameras seeing portions of the breast frequently missed with standard gamma cameras.

Nuclear medicine systems (gamma cameras) are used routinely for detection of heart disease and for location of cancer metastases. These cameras take advantage of the ability of certain crystals to give a small flash of light or “scintillation” when struck by a radioactive particle. These scintillations are collected by gamma cameras and used to create two- and three-dimensional images of the patterns of radiation briefly emitted from patients injected with a diagnostic “tracer” or “radiopharmaceutical.”