What's New

Each of the items on the following three pages was condensed from information supplied by its manufacturer. The items are published as a service to professionals working in the field of nuclear medicine. Their inclusion here does not in any way imply an endorsement by the Editorial Board of the JNMT *or by the Society of Nuclear Medicine.*

Cardiac Probe

A new portable bedside device, the Gamma/Cor RCG Cardiac Probe, permits quantitative measurements of left ventricular performance in a

semi-invasive manner, as indicated by the left ventricular ejection fraction (LVEF) performance index. Searle Radiographics states that all essential data, including LVEF and ECG, are recorded on a strip-chart for interpretation of cardiac dysfunction. *—Searle Radiographics, Box 1045, Skokie, IL 60076.*

Video Image Processor

A programmable data system operating under software control, the Video Image Processor (VIP), according to Ohio-Nuclear, establishes a higher standard of nuclear medicine image resolution and wider flexibility for acquisition and display of data. Designed primarily for cardiology studies, the VIP utilizes a gating technique for image acquisition and may be programmed to produce a rapid display similar to a motion picture. *—Ohio-Nuclear, Inc., 29100 Aurora Rd., Solon, OH 44139.*

System 77 Updated

Baird-Atomic announces new display characteristics and capabilities for their computerized Multicrystal Scanning Gamma Camera. A multimode display system features continuous-tone, halftone, and intensity halftone images. In addition, the interactive data display interface allows the system's CRTs to display any keyboard data in real time. *—Baird-Atomic, Inc., 125 Middlesex Tpke., Bedford, MA 01730.*

Radiation Badge

The Landauer Co. has introduced a new customized personnel monitoring badge that combines an identification photograph with an advanced dosimetry system for measuring x-ray, beta, gamma, and neutron radiations encountered at low levels or in large accidental exposures. Dosimetry systems incorporated in the Landauer T/otal™ badge service utilize film, thermoluminescent dosimetry, criticality measuring, and a neutron track-etch technique.

The company also provides computer reports for the wearer's exposure period. The reports comply with all NRC, OSHA, and state reporting requirements. *—R.S. Landauer, Jr. & Co., Glenwood Science-Park, Glenwood, IL 60425.*

AV Equipment Directory

The 1977-1978 Audio-Visual Equipment Directory is designed to help A-V equipment buyers make practical, cost-effective decisions on the purchase and use of A-V equipment and systems. The directory is a source of information for over 2000 items, including uniform specifications on price, model, weight, capacity, accessories, and technical details. *—National Audio-Visual Association, 3150 Spring St., Fairfax, VA 22030.*

Radioisotope Calibrator

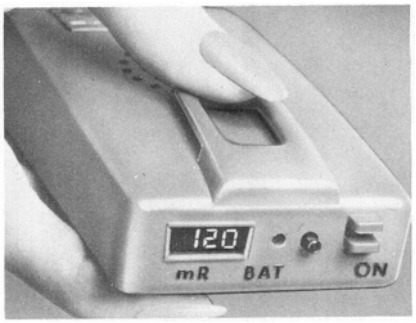
Capintec, Inc. has added an economy model radioisotope calibrator, the CRC-5, to its product line. Featuring push-button controls to select the eight most often used radio-

isotopes, the CRC-5 also provides over 90 radioisotope calibrators for manual selection. Available options include a remote calibration detector and a radiation exposure monitor.

Modular construction allows the CRC-5 to be upgraded to an automatic assay system with printout and computer capabilities. *—Capintec, Inc., Montvale, NJ 07645 (see ad, p. 13A).*

Pocket Dosimeter

The new, pocket-size personal digital dosimeter automatically integrates gamma and x-ray exposure and provides instantaneous visual and audible warnings over a broad



range of exposures. A push-button activates the 3-digit LED display (0–999 mR range). Chirps are emitted in direct proportion to the radiation intensity. Typically, it will chirp once or twice per min in a 1 mR/hr field. The accumulated exposure is cleared by turning the dosimeter off. *—Nuclear Associates, Inc., 100 Voice Rd., Carle Place, NY 11514.*

Automatic Quality Control

A fully automated radiochromatogram quality control system is the Qualitygraph Model QG-100. Intended to automate the quality control testing of cold kits, the device can also test many forms of radioisotope compounds.

By utilizing a quality control test kit, processed chromatogram strips can be automatically scanned by the strip scanner and the chemical structure of the radiopharmaceutical analyzed. A permanent record/hard copy printout is then produced.

Sufficient digital data are obtained at the completion of the study to compute percentage of breakdown of the compound under test. Once the chemical state has been determined, a prediction may be made on proper or improper biological behavior of the material, prior to use in patient. *—Atomic Development Corp., 7 Fairchild Court, Plainview, NY 11803.*

Radioimmunoassay Products

RIA Instrumentation

Beckman's Modular Phase I Sample-Handling System is designed to improve radioimmunoassays by simplifying procedures for rapid, accurate, inexpensive analyses. Stand-alone instruments, accessories, and packaged RIA kits make up the system, which is available as a whole or in parts.

Phase I instruments include the new Gamma 4000 spectrometer, which is capable of processing up to 400 samples automatically; an on-line DP-5000 Microprocessor Data Reduction System, which stores up

to ten RIA programs; the model J-6 centrifuge; and a pipettor/diluter/dispenser.

Sample handling accessories include racks and trays that speed decanting and centrifuging. Double-antibody, solid-phase RIA kits are available from Beckman for a variety of constituents. *—Beckman Instruments, Inc., RIA Center, Scientific Instruments Div., PO Box C-19600, Irvine, CA 92713.*

Premixed T_4

A "Premix" T_4 RIA kit, which may be customized to suit the individual laboratory, includes a protocol that enables the technologist to choose among three possible assay methodologies. One method combines three reagents for a single dispensation step. The second method makes use of automatic or semiautomatic diluter/dispenser equipment and makes it possible for the user to vary the sample-to-reagent mixture from 1:10 to 1:20. The third method adds each reagent separately. All reagents are provided in lyophilized form and the test has a 30-min incubation time. *—Diagnostic Products Corp. 12306 Exposition Blvd., Los Angeles, CA 90064.*

Cortisol

Diagnostic Products Corp. has developed a new ^{125}I Cortisol kit which eliminates the boiling step. The kit is completely lyophilized and reagents may be premixed to allow for one pipetting and one dispensation step. All reagents are color coded to help eliminate technologist error. The sensitivity of the kit extends to 1 μg/dl and the range is 1–50 μg/dl. *—Diagnostic Products Corp., same address as above.*

Ferritin RIA

The GammaDab™ RIA kit is intended for in vitro determination of serum ferritin concentration as a direct index of iron stores.

The method features sensitivity in the subclinical range. Sensitivity is calculated to be 1.3 ng/ml. Separation of bound from free antigen fractions is accomplished with a second antibody. Assay results are available

within 4–5 hr.*—Clinical Assays, 620 Memorial Dr., Cambridge, MA 02139.*

Phenytoin

Amersham's Phenytoin RIA kit is designed for use in the management of epilepsy. The kit employs a 1-hr incubation and a double-antibody separation technique, which may be used on serum or plasma. —*Amersham Corp., 2636 S. Clearbrook Dr., Arlington Heights, IL 60005.*

T_4 (PEG) Kit

A new method for quantitating total serum thyroxine has been introduced by Amersham. The T_4 RIA (PEG) kit combines separation using polyethylene glycol and a 45-min room temperature incubation. The primary and secondary blocking reagents in the kit are thiomersalate and barbitone. —*Amersham Corp., 2636 S. Clearbrook Dr., Arlington Heights, IL 60005.*

SPAC T_3

The new SPAC® T_3 Uptake kit, developed by Mallinckrodt, utilizes a sectionally processed, antibody-coated tube designed to improve uniformity. No centrifugation, second incubation, or rotation is required. The assay can be automated. —*Mallinckrodt/Nuclear, PO Box 5840, St. Louis, MO 63134.*

^3H Counting Method

Optisol, recently introduced by Isolab, is a scintillation counting medium specially formulated for assaying samples at the highest available efficiencies, over a broad-range sample capacity. According to the manufacturer, this cocktail yields higher counting efficiencies for tritium than any other product. —*Isolab, Inc. Drawer 4350, Akron, OH 44321.*

HPL

A test for the quantitative determination of HPL (human placental lactogen) has been developed by Ames. RIALYZE™ HPL (RIA) uses an immunoradiometric technique to determine the concentration of HPL in serum or plasma. A single determination is required in the test procedure, which may be completed in less than 2 hr. —*Ames Co., Elkhart, IN 46514.*

GammaCoat T_3

Clinical Assays announces the availability of its GammaCoat (^{125}I) T_3 Uptake kit. GammaCoat solid-phase, coated-tube separation technology is featured and no centrifugation or rotation is required. The assay can be automated. —*Clinical Assays, 620 Memorial Dr., Cambridge, MA 02139.*