Vibration-isolated workstations for sensitive instruments. Vibration-isolated workstations provide the highest level of performance for enhanced resolution and repeatability in critical electrophysiology, microinjection, and cell manipulation procedures. The isolation performance of these workstations increases the quality of microscopic images, enables more precise micromanipulation of cells, and provides a stable platform for long-term experimentation. In addition to excellent isolation from vertical motion, VW Series workstations also provide isolation from horizontal floor motion, an especially important consideration for labs in multistory buildings. The workstations come in six compact work surface sizes from 30” x 36” to 36” x 60” and vary based on different work surfaces including stainless-steel surfaces, with or without mounting holes, and plastic laminates. The selection also includes a sealed stainless-steel table top with mounting holes, which has a leak-proof barrier to protect the table structure from accidental solution spills. A lower, 30” work surface height allows users to operate instruments and other equipment with greater comfort. Newport Bio-Instruments, 18235 Mt. Baldy Circle, Fountain Valley, CA 92708, USA. Telephone 714-965-4631. Circle 48 on Reader Service Card.

Micro flow-through pH electrode. A micro flow-through pH electrode with an internal dead volume of less than 50 microliters, designated the FTPH-1 Micro Flow-Through pH Electrode, is ideal for measuring pH changes in LC and HPLC, micro process monitoring, biotechnology, and other applications areas where a precise micro flow pH system is required. The microflow pH system uses 1/4-28 standard fittings and 1/8-inch Teflon tubing and can easily be hooked up to any LC or HPLC system. The pH electrode plugs into any standard laboratory pH meter. The pH meter can be hooked up to a strip chart recorded for continuous pH monitoring.

A micro flow system for oxidation-reduction potential is also available as is a pH recorder module, which eliminates the need of a pH meter for pH recording. Lazar Research, 920 N. Formosa Ave., Los Angeles, CA 90046, USA. Telephone 800-824-2066. Circle 59 on Reader Service Card.

Desalting columns for fast separations. Presto™ Disposable Plastic Desalting Columns offers a faster, more efficient method of desalting. Available sizes now include: 5 x 5 ml; 25 x 5 ml; 100 x 5 ml; 5 x 10 ml; 20 x 10 ml; and 100 x 10 ml. The columns contain a cross-linked dextran support that can be used to exchange an antibody from an ammonium sulfate preparation to an acetate buffer system. It takes only 15 min to desalt a 0.5 ml sample on a 5 ml Presto™ Desalting Column. The desalting columns eliminate time-consuming column packing, allowing researchers to match the right size volume with their sample volume. In addition, Presto™ Desalting Columns can be used to save time in many applications including buffer system exchange, removal of reducing or oxidizing agents, elimination of ammonium sulfate, stopping cross-linking reactions, separation of excess biotinylating reagent, and removal of 125I from iodination reagent. Pierce, P.O. Box 117, Rockford, IL 61105, USA. Telephone 800-8-PIERCE. Circle 46 on Reader Service Card.

Time-resolved fluorescence. Of the new non-radioisotopic labeling methods, time-resolved fluorometry is especially promising. Commercially available since 1984, immunoassay kits based on time-resolved fluoroimmunoassay are fast gaining recognition as the leading alternative to products based on RIA. Time-resolved fluorometry is based on the unique fluorescence properties of lanthanide metal chelates, yielding benefits such as large stokes shift and long decay time. Any non-specific background will disappear before measurement of the light. Delfia is an immunoassay system using micro- titer plates and europium chelate as tracer and offers high sensitivity and wide measuring range. Measurement is carried out in a time-resolved fluorometer. The measuring cycle is repeated 1000 times per second, and the whole plate is processed in 3 minutes. The system can be automated with pipetting stations for dilution of patient samples or pipetting of tracer. The system features a wide range of analytes in the areas of thyroid, obstetrics, gynecology, tumor markers, and neonatal screening. Because Delfia is an open system with protocols and reagents labeling biological compounds, it offers research laboratories the opportunity to develop immunoassays specific for their needs. Pharmacia ENI Diagnostics, 350 Pasaic Ave., P.O. Box 2803, Fairfield, NJ 07007-2803, USA. Telephone 800-346-4364 or 201-227-6700; fax 201-227-5432. Circle 68 on Reader Service Card.

This section is published as a service to our readers; it is not intended as an endorsement or approval of any product mentioned.
**Mutagenesis.** The Altered Sites™ mutagenesis system combines a unique vector with a procedure for positive antibiotic selection of site-directed mutations. Mutations are introduced by annealing a mismatched oligonucleotide to the single-stranded target DNA. A second mutagenic oligonucleotide is annealed simultaneously to confer antibiotic resistance to the mutant DNA strand. The procedure is rapid and simple to perform, yields 70–90% mutants and can be used to generate multiple mutations simultaneously. Promega, 2800 Woods Hollow Rd., Madison, WI 53711-5399, USA. Telephone 800-356-9526 or 608-274-4330. Circle 60 on Reader Service Card.

**Pistons, check valve replacements.** Able Technologies manufactures quality replacement parts that meet or exceed the manufacturer's original specification. Able Technologies stocks replacement pistons and check valves for the following manufacturers' pumps: Waters; Beckman; LDC; Kratos/ABI; Gilson; Shimadzu; and seals for Waters, Beckman, and LDC pumps.

Ruby/Sapphire pistons for HPLC pumps offer increased hardness (approximately 10–15%) over conventional sapphire pistons. This technology has been extended from check valve ball/seats to pistons.

A new inert replacement check valve cartridge system is also available. These valves will keep corrosion to a minimum at critical liquid head-to-check valve interface. All wetted parts are metal free. There is also a new inert liquid head retrofit kit for Waters M6000A for increased corrosion resistance, especially for biological applications. Replacement pistons and check valves for other manufacturers' pumps available. Able Technologies, P.O. Box 701, Chester, NY 10918, USA. Telephone 800-637-3609 or 914-469-5553; fax 914-469-5554. Circle 55 on Reader Service Card.

**Interactive volume-rendering software system.** VoxelView is an interactive volume-rendering software system that allows engineers, scientists, and clinicians to visualize and manipulate 3-dimensional data sets in real time. Users can visualize anything from a cell to a region of the galaxy, from a molecular model to a seismic survey. VoxelView contains options to rotate, color, and section 3-D data, as well as options to adjust the transparency, lighting, and other rendering features. Objects or phenomena that are extremely delicate, short-lived, or complex can be preserved as 3-D computer images, and retrieved and studied at any time.

Volume rendering is a new visualization technique that is unlike traditional geometric methods. It requires no previous assumptions regarding the intrinsic geometry of an object or a phenomenon of interest. Each point inside an object is rendered directly to the computer screen. As a result, volume-rendering techniques eliminate the misinterpretations associated with traditional rendering techniques. Users see the data as a 3-D image, just as it was gathered from the data source. Vital Images, Inc., P.O. Box 551, Fairfield, IA 52556, USA. Telephone 515-472-7726; fax 515-472-1661. Circle 50 on Reader Service Card.

**DNA analysis for use in flow cytometry.** A reagent kit for the isolation, storage, and DNA staining of cell nuclei for use in flow cytometry is available. The Cycletest kit consists of four, ready-to-use reagents: solution A (trypsin buffer solution) obtains clear and stabilized nuclei; solution B (trypsin-inhibitor and RNA-ase) neutralizes remaining trypsin and eliminates interfering RNA; solution C (Propidium iodide) specifically stains nuclear DNA; and a citrate buffer solution optimized for cellular/nuclear washings and freezing. The buffer allows the preparation of aliquots to be frozen at ~80°C and stored for retrieval analysis. The Cycletest reagents produce clear histograms with very narrow CVs. The Cycletest kit can be used with fine needle aspirates and mechanical disaggregation of cells from solid tumors. Both methods result in histograms with narrow CVs and highly reproducible fluorescence intensity values.

Cycletest is a 20-test reagent kit, which can be stored at 2–8°C for 1 month. Storage for a longer time can be done at ~18°C. The staining protocol is no-wash, no-centrifugation, three-step procedure and takes no longer than 30 minutes. Becton Dickinson Benelux S.A., Postbus 13, Deuderstraat 24-9440 Erembodegem, Belgium. Telephone 53-78.78.30. Circle 56 on Reader Service Card.

**Microcentrifuge.** The MC 200 NanoFuge, a microcentrifuge, is so small it fits in the palm of your hand. At just 12 cm in diameter, it holds up to six 2.0 or 1.5 ml microcentrifuge tubes. With an adapter, it will hold microcentrifuge tubes as small as 0.50, 0.40, and 0.25 ml. The NanoFuge is ideal for applications requiring spinning at low g-forces. For example, it can be used for spinning down droplets from the caps and walls of microcentrifuge tubes; for blood, urine, and tissue culture centrifugation; or for sedimentation of bacterial cells. The NanoFuge reaches a maximum speed of 5000 rpm, with a g-force of 200 × g. To operate, merely close the cover to start the spinning and open it to stop. Hoefer Scientific, P.O. Box 77387, San Francisco, CA 94107, USA. Telephone 415-282-2307. Circle 57 on Reader Service Card.

**Tracer for intracellular labeling of neurons.** NEUROBIOTIN™ tracer is a new intracellular label for neurons that is an amino derivative of biotin. NEUROBIOTIN™ tracer has an extremely high solubility, unlike biocytin has a net positive charge at neutral pH, is readily cross-linked by formalin or glutaraldehyde, is stable in the cell, has a low toxicity, and because of its very low molecular weight is rapidly transported. Catalog no. SP-1120, Vector, 30 Ingold Rd., Burlingame, CA 94010 USA. Telephone 415-697-3600; fax 415-697-0339. Circle 70 on Reader Service Card.
Rapid bead-based enzyme immunoassay. An assay system for quantitative determinations of β2 microglobulin levels in serum, plasma or urine samples is a rapid bead-based enzyme immunoassay that incorporates monoclonal antibody technology. The assay is referenced against World Health Organization International Standards for β2 microglobulin (1st International Standard Preparation).

Beta2 M-Trac™ EIA kit is for in vitro diagnostic use. Human β2 microglobulin (hβ2 M) is a hydrophilic, low molecular weight protein (MW 11,815) of 99 amino acids in a single polypeptide chain. Originally isolated from the urine of patients with chronic cadmium poisoning and Wilson's disease, hβ2 M has since been found on the surface of almost all nucleated cells and is present in a variety of biological fluids. Circulating hβ2 M is filtered through normal glomeruli, reabsorbed and degraded by the proximal tubular cells of the kidney, and excreted in the urine. For normal patients, only trace amounts of hβ2 M are found in urine and in the serum. Elevated levels of hβ2 M in urine and serum have been found in a variety of disease states.

Increased serum hβ2 M concentrations are indicative of enhanced disease activity. Among those disease states associated with elevated hβ2 M levels are immunological disorders (inflammatory disorders, e.g., systemic lupus erythematosus, viral disorders, rheumatoid arthritis, and sarcoidosis). Elevated hβ2 M levels can also indicate disease activity and tumor cell load in patients with lymphoproliferative disorders (multiple myeloma and lymphoma). In addition, serum hβ2 M can be used to monitor acute renal failure and renal transplant rejection. Both are associated with rising levels of hβ2 M.

The Beta2 M-Trac™ procedure is a rapid bead-based enzyme immunoassay. Polyclonal anti-β2 microglobulin antibody is bound to a polystyrene bead to capture samples of the free protein. Samples containing β2 microglobulin are incubated with the beads for 30 min and then washed with deionized water. This bead-bound β2 microglobulin is then incubated for 30 minutes with a specific monoclonal β2 microglobulin antibody that is conjugated to an enzymatic detector. The beads are then washed with deionized water and incubated with a chromogenic enzyme substrate for 30 minutes. The enzyme reaction is stopped with 0.1 N H2SO4. The samples are then analyzed spectrophotometrically at 450 nm. Optical density readings at 450 nm are directly proportional to the amount of β2 microglobulin present in each sample. Inctar, 1951 Northwestern Ave., Stillwater, MN 55082, USA. Telephone 612-439-9710. Circle 51 on Reader Service Card.

Ion-exchange cartridges. The Isonet™ line of ion-exchange cartridges is designed for rapid, simple purification of proteins. Two types of cartridges are available: cationic Isonet-S2 SP with sulfopropyl charge groups and anionic Isonet-D2 DEAE with diethylaminoethyl charge groups. Isonet cartridges can handle large volumes of starting mixture rapidly and the resultant concentration of purified protein in small volume of elution buffer. A large variety of purification applications can be performed with little effort and good recovery. Isonet cartridges can be easily adapted for the purification of monoclonal antibodies from ascites fluid or recombinant proteins from cell culture media. The radial flow geometry of the cartridges results in high flow rates with good capture efficiencies. A proprietary, hydrophilic base coating over the fiber matrix minimizes nonspecific adsorption to virtually undetectable levels. Isonet cartridges are ideal alternatives to shallow bed ion exchange columns due to the microporous structure and thin walls of the ion exchange support matrix within cartridge. Kinetek Systems, 11802 Borman Dr., St. Louis, MO 63146, USA. Telephone 314-432-0870; fax 314-432-0357. Circle 63 on Reader Service Card.

Training videos. Three tapes have been produced as part of a cell culture training video series. The first, "Mycoplasma, the Hidden Enemy: What It Is and How To Test for It," uses slides and a short demonstration to discuss the sources and types of mycoplasma and reviews the different tests available for its detection. The other two tapes, "Cell Culture, the New Research Tool" and "Sterility and Quality Control" are demonstration videos covering subculturing and quality control techniques as well as suggestions for good cell culture laboratory management. All the tapes are directed at the novice or to those unfamiliar with potential problems caused by contamination. L.A.O., 19212 Orbit Dr., Gaithersburg, MD 20879, USA. Telephone 301-948-4988. Circle 54 on Reader Service Card.
Multi-image module allows simultaneous analysis of multiple microscope images. Investigators using high-performance video microscopy, ratio fluorescence, dual wavelength photometry, spatial/temporal data collection, or image contrast enhancement will be able to see and record two images simultaneously with the new multi-image module. The module is designed to be used with the Nikon Diaphot inverted microscope, which has two image ports. Among the specific applications for the new module are DNA/RNA ratio imaging with acridine orange and a 580-nm dichroic mirror; dual emission ratio imaging studies of bound and unbound calcium, using Indo 1 with low light-level cameras and a special Indo 1 dichroic splitter cube; and simultaneous-transmitted phase or DIC contrast with epifluorescence.

Many of the physical barriers in electronic imaging have been removed to allow users of advanced imaging techniques to make use of the new system. For instance, in intra-cellular ratio fluorescence, concentrations of ions such as Ca²⁺, Na⁺ and H⁺ can be quantified with fluorochromes emitting at different wavelengths. Until now, true simultaneous image capture has been hindered because of the necessity for light-chopping devices, which prohibit actual real-time ratioing. With the multi-image module, real-time ratioing is a reality because the new system eliminates the need for light-chopping devices, allowing levels of both fluorochromes to be measured at exactly the same instant. In another example, many investigators routinely switch between video-based detectors for spatial data and photometric detectors for high-speed temporal data collection. The new system allows researchers to switch between these detectors with minimal manipulation of the microscope. Nikon, 623 Stewart Ave, Garden City, NY 11530, USA. Telephone 516-222-0200. Circle 53 on Reader Service Card.

Pulsed electrochemical detector combines conductivity and amperometry. The Pulsed Electrochemical Detector (PED) is the first detector to combine conductivity and amperometry capability in one unit. By combining these capabilities, PED offers the most powerful detection scheme available for nonchromophoric compounds. Compounds detected by PED with high sensitivity and specificity include inorganic anions and cations, organic acids, amines (including quaternaries), carbohydrates, oligosaccharides from glycoproteins, glycosidic drugs, alcohols, aldehydes, thiols, and sulfides. For methods development on any IC or HPLC, PED is the perfect complement to UV to form a nearly universal detection scheme. Electronic pulsing in both the conductivity and amperometry modes virtually eliminates the noise, drift, and electrode fouling problems common to previous electrochemical detectors. In addition to pulsed conductivity and amperometry modes, PED measurement capabilities include cyclic voltammetry, d.c. amperometry, pH and temperature. Dionex, P.O. Box 3603, Sunnyvale, CA 94088-3603, USA. Telephone 408-737-0700, ext. 1474. Circle 67 on Reader Service Card.

Bacterial strains. The American Type Culture Collection (ATCC) has the following bacterial strains available for research and industry applications:

- Campylobacter laridis, ATCC No. 43675 — a human pathogen associated with enteritis.
- Legionella gormanii, ATCC No. 43769 — from pneumonia patient.
- Legionella quinlivanii, ATCC No. 43830 — from water.
- Neisseria gonorrhoeae, ATCC No. 43785 — CDC QC organism from male urethra, susceptibility testing of enoxacin.
- Eubacterium timidum, ATCC No. 33093 — type strain from subgingiva in periodontitis.
- Spiroplasma sp., ATCC Nos. 43207 thru 43211 — possible biological control for insects.
- Corynebacterium sp., ATCC No. 43752 — possible pollution control organism, dehalogenates haloalkanes.
- Rhizobium galegae, ATCC No. 43677 — nitrogen fixer on Gagea orientalis.

Feeder cells for promoting growth of fastidious cell lines. The Swiss albino 3T3 mouse embryo cell line, ATCC# CCL 92, has been added to the ATCC feeder cell product line. The irradiated feeder cells, catalogue no. X-48, are used to support the growth of fastidious cell culture systems. The cells have been irradiated so that division has been halted but metabolism retained. The Swiss 3T3 feeder cells are supplied as frozen 1 ml aliquots in quantity sufficient to seed up to 150 cm² of surface area.

The ATCC also offers irradiated MRC-5, a human diploid lung fibroblast cell line (catalogue no. X-55) and STO, a mouse embryonic fibroblast cell line (catalogue no. X-56) for use as feeder cells. American Type Culture Collection, 12301 Parklawn Dr., Rockville, MD 20852-1776, USA. Telephone 301-881-2600; fax 301-231-5826. Circle 65 on Reader Service Card for bacterial strains and 66 for feeder cells.

Diagnostic substrate for horseradish peroxydase-linked assays. A newly formulated, stabilized tetramethylbenzidine (TMB) for use in horseradish peroxydase-linked (HRP) immunodiagnstics and assay systems, TMBlue™ can serve as a substrate in nonradioactive labeling of DNA. The product is available for precipitating applications as well as for use as a single reagent for soluble ELISAs. TMBlue™ provides the high sensitivity, low background, and safety required by researchers and clinicians. A precipitating reagent, it does not fade from immunoblots, RNA and DNA filter hybridizations or antibody-coated beads. In addition, TMBlue™ offers the convenience of a one-bottle system for either soluble or precipitating-based diagnostic systems, and it is compatible with automated pipetting systems. Transgenic Sciences, 365 Plantation St., Worcester, MA 01605, USA. Telephone 508-752-4442; fax 508-754-3519. Circle 64 on Reader Service Card.

Programmable gradient former for electrophoresis. NuGrade gradient former adds zooming power to electrophoresis—simultaneously giving a panoramic view of the complete sample contents and a high-resolution picture of the regions of interest. It unifies the versatility of the gradient gel and the selectivity of the uniform gel for proteins or nucleotides separation on 1-dimensional electrophoresis by making continuous linear and non-linear gradients with the aid of an IBM PC. BIOPUTA, PO. Box 638, Palisades, NY 10964, USA. Circle 62 on Reader Service Card.
Small sample end tidal CO₂ and N₂O computer. A new end tidal CO₂ computer combines fast response with very low air sampling rates to create a system capable of accurately measuring CO₂ and N₂O percentages, as well as respiration rate, in applications designed to study small animals such as rats, guinea pigs, and rabbits. The micro-Capnometer features animal respiratory sampling rates as low as 5 mL/min and is capable of giving accurate readings with respiration rates, in this sampling range, of up to 150 breaths/min. If the respiratory sampling volume is increased to 20 mL/min, the system can provide accurate measurements of as many as 300 breaths/min.

The micro-Capnometer measures CO₂%, N₂O%, and respiration rate, and documents results, including waveforms, using its own Epson-compatible printer. With an external IBM-PC/AT-compatible computer, it displays data and waveforms on the computer monitor and can print and store data in user-defined intervals.

The micro-Capnometer has its own LCD display for showing CO₂% and N₂O% waveforms and also features two linearized outputs, which allows the recording of the waveforms using a chart recorder. Multiple programmable alarms alert the user when CO₂ and N₂O percentages fall out of a user-defined range. Columbus Instruments, PO. Box 44049, Columbus, OH 43204, USA. Telephone 800–669–5011 or 614–488–6176; fax 614–276–0529. Circle 47 on Reader Service Card.

Variolum—illumination attachment. An ideal microscope accessory is available for the photomicrographer/video microscopist that allows for efficient light management of the microscope illumination though continuous control of light intensity without changing lamp voltage, thereby ensuring constant color temperature; continuous increase of color temperature at constant lamp voltage setting, up to 74 mireds; continuous color contrasting between specimen and surrounding area by means of a trichromatic filter (optional), and uniform illumination regardless of the type or centration of the light source. This illumination attachment is specific for and fits on all Leitz microscopes. Wild Leitz USA, 24 Link Dr., Rockleigh, NJ 07647, USA. Telephone 201–767–1100. Circle 58 on Reader Service Card.

Literature

Biological cultures (algae, bacteria, cell lines, fungi, recombinant genetic materials, protozoa, viruses, and yeasts) are listed in a newsletter from American Type Culture Collection, 12301 Parklawn Dr., Rockville, MD 20852–1776, USA. Also from ATCC is a catalog of human chromosome-specific genomic libraries; human and mouse genetic probes and cloned genes; probes and clones for oncogenes and transforming proteins; and bacterial hosts for transformation or plating libraries.

Analytical and preparative TLC plates and accessories are described in 1990 catalog from Analtech, PO. Box 7558, Newark, DE 19714, USA.

Separation and purification techniques of the Model 230A high performance preparative electrophoresis system are described in a series of five application notes from Applied Biosystems, 777 Lincoln Centre Dr., Foster City, CA 94404, USA.

Biotechnology products are listed in a 64-page color catalog on life sciences products from Kontes Biotechnology, PO. Box 729, Vineland, NJ 08360–2899, USA.

Products for electron microscopy, light microscopy, biological sciences, materials science, cryo, and photography are covered in a catalog from Electron Microscopy Sciences, PO. Box 251, Fort Washington, PA 19043, USA.

Wide-Pore Reversed-Phase Columns for High-Resolution Biopolymer Separations, a brochure that includes examples of applications for analytical columns, from Rainin, 568 Bergen Blvd., Ridgefield, NJ 07657–2097, USA.

Laboratory environmental glassware, including extractors for continuous extraction of solids and Liquid-Liquid extractions; volumetric and separatory flasks; and gas collection tubes with TEFLO™ stopcocks and sampling ports are displayed in a catalog from Chemglass, 3861 N. Mill Rd., Vineland, NJ 08360, USA.

Balances 1989/1990, a brochure introduces precision analytical and top loaders, economy top loaders, and mechanical beam balances from Fisher Scientific, 711 Forbes Ave., Pittsburgh, PA 15219, USA.

Inner Space 33, a 16-page booklet describes environmental chambers and information on controls, functions, door configurations, shelving, and accessories from Heinicke Scientific, 10940 Dutton Rd., Philadelphia, PA 19154, USA.

Transdisciplinary research guide, first in a series, Focus on: Global Change, covering current research on physical, chemical, biological processes affecting the earth, and on public policy, for scientists, research administrators, and product planners; also available on diskette from Institute for Scientific Information, 3501 Market St., Philadelphia, PA 19104, USA.

Polymeric columns for HPLC are described in a catalog featuring reversed-phase, ion, protein, organic acids, carbohydrates, amino acid, and guard columns, from Interaction Chemicals, 1615 Plymouth St., Mountain View, CA 94043, USA.

Incubators and related products are described in a 28-page color catalog from Lab-Line Instruments, 15th and Bloomingdale Aves., Melrose Park, IL 60160–1491, USA.

Advanced electrophoresis gels in two user manuals that describe unique gel preparation and application techniques for DNA separation and sequencing from AT Biochem, 74 Great Valley Pkwy., Malvern, PA 19355, USA.
POSITIONS AVAILABLE — Classified advertisement: $25.00 per line (70 characters), $200.00 (8 line) minimum. Display advertisement: $600.00 for ¼ page, ¾ inches x 4 inches; $900.00 for ¼ page, ¾ inches x 9 inches; $1200.00 for full page, ¾ inches x 9 inches (horizontal); $1400.00 for full page, ¾ inches x 9 inches (vertical); $1700.00 for full page, ¾ inches x 9 inches. (For display ads, add 5% if mechanical not submitted.) Advertisements will be published in next available issue unless otherwise specified. Deadline for receipt of copy is 5th day of month before publication. Payment or purchase order is required with insertion copy. Advertisements are noncommissionable to agents; no cash discounts are allowed. Blind advertisements are not accepted.

POSITIONS DESIRED — Candidates registered with FASEB Placement Service are allowed one advertisement of five lines, each containing 70 characters including spaces. The issue in which advertisement appears will be based on date of receipt of copy. Fee for publication in additional issues: $10.00 per issue.

Primary employers desiring identification and additional details concerning Positions Desired advertisers should write to address below, indicating hyphenated number appearing as last element of advertisement; a one-page application from advertiser(s) will be provided immediately. Advance telephonic determination of availability of advertisers from earlier-than-current issues is recommended. Employers not currently registered with Placement Service for annual meeting participation are charged a minimum fee of $30.00 for identification of up to 10 advertisers, plus $3.00 for each above 10, payable in advance to FASEB Placement Service.

Some registered candidates do not prepare Positions Desired advertisements; some advertisements are published at times not coinciding with employer recruitment activities. Primary employers not finding advertisements that appear to match current or projected needs are invited to request a search of all active candidate files. Telephone a description of the desired qualifications; results of search will be discussed telephonically with requesting official, and applications from candidates declared suitable will be forwarded. Employers not currently registered with Placement Service for annual meeting participation are charged a minimum fee of $30.00 for up to 10 applications, plus $3.00 for each above 10.

In publishing these advertisements FASEB assumes no obligations as to qualifications of prospective employees or responsibility of employers, nor shall FASEB obtain further information concerning positions advertised or those seeking employment. Accuracy and completeness of all listings are the responsibility of the submitting party.

Various U.S. national and state laws against discrimination, including the Federal Civil Rights Act of 1964, prohibit discrimination in employment in the United States because of race, color, religion, national origin, age, sex, or any reason not based on a bona fide occupational qualification. The Federation of American Societies for Experimental Biology endorses these principles and reserves the right to edit all copy and to refuse advertisements not in consonance therewith.

Employment in countries other than the United States may be restricted by government visa and other policies. Moreover, it is suggested that the generally accepted employment practices, the cultural conditions, and the exact provisions of the specific positions being considered be investigated thoroughly. The U.S. Embassies in countries of interest to potential employees should be able to provide up-to-date data concerning internal conditions.

For a description of operation at annual meetings, please refer to the January or February issue or contact the Placement Service.

Address all correspondence to FASEB Placement Service, 9650 Rockville Pike, Bethesda, MD 20814. (301) 530-7020

***

POSITIONS AVAILABLE

RESEARCH FACULTY/TRANSPLANT IMMUNOLOGY. A faculty position at the instructor level is immediately available in the Department of Surgery, University of Miami School of Medicine. Candidates should have a Ph.D. and a minimum of two years postdoctoral experience in transplant immunology, immunobiology and immunogenetics. In addition, hands-on experience is required in the following areas: serological and cellular immunology, methodological approaches in molecular biology, monoclonal antibody and T cell cloning technology, molecular genetics as related to histocompatibility antigens and immunochemistry. Send CV with references to Violet Easqueni, Ph.D., University of Miami School of Medicine, Department of Surgery, P.O. Box 016310, Miami, FL 33101. The University of Miami is an equal opportunity/affirmative action employer.

FACULTY/MOLECULAR BIOLOGY. Applications are sought for a molecular biologist at the assistant or associate professor level (tenure track) to initiate competitive molecular biological research in one of the following areas: acute inflammation; gene expression and protein function in lung cells and leukocytes; cellular receptors; and stimulus-transduction mechanisms. Interested candidates should send a CV and suggested references to Charles E. McCall, M.D., Department of Medicine, Bowman Gray School of Medicine of Wake Forest University, Winston-Salem, NC 27103. AA/EOE.

POSTDOCTORAL/RESEARCH ASSOCIATE. Position is available immediately in the research area of mesendymal cell cytodifferentiation. Research topics include regulatory mechanism of growth factors and hormones, receptor interactions and production of marker proteins. Applicants are expected to have a strong background in protein purification, antibody purification, mRNA isolation, tissue culture and hormone receptors. Salary range $20,000 to $22,000. Reply with CV and names of three references to Dr. Moon-H. Cho, State University of New York at Buffalo, Department of Oral Biology, 3435 Main Street, Foster Hall, Buffalo, NY 14214. Equal opportunity/affirmative action employer.

POSTDOCTORAL. Division of Urology, University of Pennsylvania School of Medicine. The successful candidate will study the molecular properties and pharmacology of potassium and calcium channel modulators in vascular and nonvascular smooth muscles. Experience with tracer flux measurement techniques is required. Although this is an academic position within the University of Pennsylvania, the research will be conducted in the laboratory of a nearby pharmaceutical company. The salary range for this unique academic-pharmaceutical postdoctoral position is $25,000-$34,000. Funds are available for relocation. All interested individuals should send resume and names and addresses of three references to Dr. Robert M. Levin, Director of Basic Research, Division of Urology, University of Pennsylvania Hospital, 3006 Radvin Courtyard, 3400 Spruce Street, Philadelphia, PA 19104.
ASSISTANT/ASSOCIATE PROFESSOR, MOLECULAR PHARMACOLOGY/BIOLOGY. Tenure-track, Department of Pharmacology, Southern Illinois University School of Medicine in Springfield, IL. Ph.D. or M.D./Ph.D., training in pharmacology and postdoctoral experience are required. Assistant Professor applicants have strong potential for fundable research programs and for effective participation in pharmacology graduate and medical courses. In addition, Associate Professor candidates should have a record of funded research, publications and teaching. A preference will be given to applicants with expertise in eukaryotic cell biology, genetics or cell biology to research in pharmacology. Anticipated hire date of July 1, 1990. Send CV, representative publications, statement of research plans and names and addresses of three references by February 28, 1990 to Dr. Ezio Giacobini, Professor and Chairman, Department of Pharmacology, SIU School of Medicine, P.O. Box 19230, Springfield, IL 62794-9230. Equal opportunity/affirmative action employer.

CHAIRMAN. The Texas College of Osteopathic Medicine is now accepting applications for Chairman of the Department of Anatomy and Cell Biology. The department currently has 12 faculty members whose research cover a wide variety of areas. Viable candidates should have an established research program, teaching experience (preferably medical) and demonstrated managerial skills. Applications must be received by June 1, 1990, and accompanied by a CV and a list of three individuals who may be contacted as references. Applications should be sent to Dr. Paul F. Cook, Chairman, Anatomy Search Committee, Department of Microbiology and Immunology, Texas College of Osteopathic Medicine, 3500 Camp Bowie Boulevard, Fort Worth, TX 76107-2690. Texas College of Osteopathic Medicine is an equal opportunity/affirmative action employer.

MAMMALIAN CELL MOLECULAR GENETICS. The newly reorganized Department of Microbiology and Molecular Genetics at the University of Vermont is expanding to enhance research in molecular biology. Tenure-track positions at the assistant and/or associate professor level are available in areas of molecular genetics related to mammalian cells and viruses. Areas of interest include, but are not limited to, molecular virology; fundamental mechanisms of RNA replication, recombination, gene expression, or protein synthesis; and mechanisms of cell transformation. The successful applicant will be trained in genetics and molecular biology and utilize modern approaches to problems of eukaryotic cell biology at the molecular level. A Ph.D. and postdoctoral experience are required. The expanded Department will occupy three floors in a new Microbiology Center. Start-up funds and interim renovated space are available. Faculty members hold appointments in both the College of Agriculture and Life Sciences and the College of Medicine. The Department's primary emphasis is on research; teaching responsibilities are to undergraduate, graduate and medical students. Research interests of the Department center on basic problems in molecular genetics with several groups focusing on cell and molecular biology of mammalian cells. Send nominations and applications with CV, present and future research plans and at least three letters of reference to Search Committee, Department of Microbiology and Molecular Genetics, Given Building, University of Vermont, Burlington, VT 05405. Review of applications will begin immediately and continue until the positions are filled. Women and minorities are encouraged to apply. The University of Vermont is an equal opportunity/affirmative action employer.

CELLULAR IMMUNOLOGIST/ANIMAL VIROLOGIST. Ph.D. or equivalent for administrative/research position. Postdoctoral training and experience in management and research critical. Women and minorities are encouraged to apply. Please forward CV to John E. Craighead, University of Vermont, Burlington, VT 05405. Applications will be accepted until position is filled. Affirmative action/equal opportunity employer.

FACULTY, FOOD SCIENCE/ NUTRITION. Assistant Professor and Extension Nutritionist, Department of Food Science and Nutrition, University of Minnesota, St. Paul. Tenure track. Start on or after July 1, 1990. Provide statewide leadership and instruction in extension educational programs in risk/benefit associated with food intake through the life cycle. Develop ongoing research program. Must have Ph.D. in nutrition or related field, demonstrated research skills and strong oral and written communication abilities; teaching and microcomputer skills preferred. Apply by April 1, 1990 to V. S. Packard, Department of Food Science and Nutrition, University of Minnesota, 1334 Eckles Avenue, St. Paul, MN 55108. Include detailed resume with publications list and at least three references. The University of Minnesota is an equal opportunity/education and employer and specifically invites and encourages applications from women and minorities.

ASSISTANT/ASSOCIATE PROFESSOR, MOLECULAR CANCER PHARMACOLOGY. The Department of Pharmacology and the Cancer Center, Northwestern University Medical School, invite applications for a tenure-track faculty position at the assistant or associate professor level. Prospective candidates should have a Ph.D., M.D. or equivalent degree, have had postdoctoral training and have demonstrated excellence in research and commitment to teaching. Preference will be given to those who have had experience in the application of molecular biology, genetics, cell biology or immunology to pharmacological problems related to cancer. The successful candidate is expected to develop own research program as supported by external funds and to participate in the teaching program. The position will become available effective September 1, 1990. Applicants should have CV, a brief statement of future research plans and three letters of recommendation sent to Dr. Toshihiko Narahashi, Professor and Chairman, Department of Pharmacology, Northwestern University Medical School, 303 E Chicago Avenue, Chicago, IL 60611 (312) 908-8284. Application must be received by March 1, 1990. Women and minority candidates are particularly encouraged to apply. We pay special attention to the qualified candidates in these groups. An equal opportunity/affirmative action employer.

CARDIOVASCULAR TRAINING PROGRAM. The Cardiovascular Center of the Albert Einstein College of Medicine is seeking qualified postdoctoral candidates to pursue fundamental research in cardiovascular diseases, including the role of vascular smooth muscle cells in the contractile biophysics of the cardiac sarcomere and cell; cellular cardiac electrophysiology; intracellular calcium and cardiac function; the molecular biology of normal and abnormal myocardium; correlations of cardiac function, metabolism, and biochemistry; cardiac structure and myocardial function; physiology, flow dynamics, and pathophysiology of the coronary circulation; left ventricular diastolic function; and platelet function in ischemia and reperfusion. The program is supported by the NHLBI National Research Service Award Program which requires that applicants must be United States citizens or noncitizen nationals with a permanent visa. Candidates must have completed doctoral training (M.D., Ph.D. or equivalent). For information and application forms write Ronald S. Aronson, M.D., Division of Cardiology, Forchheimer Building, Room 442, Albert Einstein College of Medicine, 1300 Morris Park Avenue, Bronx, NY 10461. The Albert Einstein College of Medicine is an equal opportunity/affirmative action employer. Women and minority groups are encouraged to apply.

NUTRITIONIST. Hershey Foods Corporation has an immediate need for a nutritionist. Strong background in the field of nutrition required along with the ability to design and manage diet studies and dietary survey work aimed at defining food and nutrient intake patterns of specific population groups of interest to the corporation. Additional responsibilities will include providing technical support to various corporate groups. (Consumer Relations, Government Relations, New Product Planning, and Product Development) to assist in the development and positioning of products with regard to nutritional/health benefits. Other assignments will include representing the corporation on selected technical committees of various trade associations and professional societies, identifying key health issues related to the nutrient content of our products, and determining the necessary scientific information required to address any concerns. Ph.D. in nutrition science, human nutrition or nutritional biochemistry required along with excellent writing, presentation and interpersonal skills. Submit letter of application with CV to S. P. Desjardins, Hershey Foods Corporation, 14 E Chocolate Avenue, Hershey, PA 17033.

FACULTY. Applications and nominations are invited for a 12-month, tenure-track faculty position at the rank of Assistant Professor in the Department of Pharmacological Sciences, Auburn University School of Pharmacy. Applicants are expected to possess a Ph.D. in pharmacology, toxicology, biochemistry or related discipline. The successful candidate will be expected to participate in the instructional programs of the Department and to develop an active research program in an area related to their disciplinary expertise and interests. Salary and startup funds for the successful applicant will be competitive. Minorities and women are encouraged to apply for this position. Applications and nominations should be sent to the Chair of the Search Committee. Applications should include a CV/resume, names and addresses of three references and a statement of research interests. The position is available immediately and the search will remain open until the position is filled. Materials should be sent to J. Thomas N. Riley, Ph.D., Department of Pharmacological Sciences, School of Pharmacy, Auburn University, Auburn, Alabama, AL 36849. Auburn University is an affirmative action/equal opportunity employer.
POSTDOCTORAL, ATHEROSCLEROSIS RESEARCH. Available immediately. This is a comprehensive interdisciplinary program with possibilities for diverse projects in cell biology, protein chemistry, and molecular biology. A Ph.D. in biomedical areas or an M.D. with laboratory experience may apply. Applicants with significant experience in cell biology and/or protein chemistry and/or molecular biology preferred. Salary according to NIH guidelines. Interested applicants should submit a CV, a detailed outline of his/her research background and goals, addresses and telephone numbers of three references to Joe G. N. Garcia, M.D., Indiana University School of Medicine, Wishard Memorial Hospital Room OPW 425, 1001 W 10th Street, Indianapolis, IN 46202-2879.

CHAIR, PHARMACOLOGY. The University of Michigan Medical School is seeking an academic leader to direct the research, teaching and service programs of its Department of Pharmacology. Qualifications include a Ph.D. (or M.D. or both) in pharmacology or related field, national stature as a researcher in an area of pharmacology, commitment to teaching and administrative ability. The position includes an instructional (tenure) track faculty appointment. Please respond by March 1, 1990 to Anne B. Young, M.D., Ph.D., Chair, Pharmacology Search Committee, c/o Ms. Susan E. Blackwell, Medical Administration Staff Assistant, The University of Michigan, M7325A Medical Science I Building, Ann Arbor, MI 48109-0624. The University of Michigan is a nondiscriminatory affirmative action employer.

POSITIONS DESIRED

M.D., 1981; Ph.D., 1990 (expected); Physiology, pharmacology; Hemodynamic and morphologic studies of pulmonary circulation, pulmonary vascular activity, EDRF in pulmonary circulation; Avail. July 1990; Postdoc. in academia or industry; Salary negot. 1-0005

Ph.D., 1979; Biophysics, biochemistry, cell biology, molecular biology, toxicology; Hepatocarcinogenesis, signal transduction mechanisms, cell proliferation, differentiation and neoplasia, HPLC, electrophoresis, protein purification, Western/Northern/Southern analysis, phospholipases, tissue culture, hepatocyte isolation; Academia/industry. 2-0006

Ph.D., 1990 (expected); Biochemistry, nutrition; Adipose cell studies, column, thin-layer and gas chromatography, electrophoresis, radio tracer techniques, enzyme assays, DNA isolation, light microscopy, mouse breeding and care; Avail. September 1990; Postdoc. academia/industry; Salary negot. 5-0007

Ph.D., 1985; Immunology, molecular biology, cell biology, microbiology; Tissue culture, in vitro bioassays, DNA/RNA sequencing, genomic library construction/screening, Southern/Northern blotting, subcloning, fluorescence microscopy, vector construction; Avail. July 1990; Research scientist in industry; East Coast only. 6-0008

Ph.D., 1987; Microbiology; Tissue culture, cellular immunology techniques, CTL, NK-cytotoxic assays, Western blotting, TLC, HPLC, PAGE, anti-HIV drug uptake, anti-HIV & bone marrow toxocology assays, animal care, pharmacokinetics, computer graphics, taught microbiology; Teaching/research; Avail. August 1990. 6-0009

Ph.D., 1973; Toxicology, drug metabolism, chemical carcinogenesis, mamalian genetics; 32P-postlabeling, HPLC, animal models, metabolic polymorphisms, carcinogenicity tests, DNA damage, enzymology, protein purification, teaching experience, excellent communication skills; Avail. June 1990; Research/teaching, industry/academia. 3-0010

Ph.D., 1990 (expected); Biochemical pharmacology, platelet physiology and biochemistry, eicosanoid and lipid biochemistry; Experience with receptor binding methods, HPLC-methods development, TLC, RIA, biostatistics and computer literacy; Avail. August 1990; Postdoc. in academia/industry; Salary negot. 3-0012

Ph.D., 1989; Bioengineering; Myocardial perfusion measurements, dog cardiothoracic surgery, radioactive microspheres, mathematical modeling of transport of tracers, imaging using nonradioactive tracers with fluorescence, endothelial cell culturing for in vitro investigation of transport; Avail. September 1990; Postdoc. or academia/industry. 1-0013

Ph.D., 1985; Biochemistry, microbiology, molecular biology; Chromatography, electrophoresis, electroimmunoassay, cell culture, histochemistry, cardiovascular research, microcomputer (Lotus 1-2-3, Wordperfect 5.0, SigmaPlot, Harvard Graphic); Avail. September 1990; Research/teaching; Salary negot. 2-0014

Ph.D., 1990 (expected); Biochemistry; Cellular detoxification mechanisms, GSH metabolism, mechanisms of carcinogenesis, drug resistance; MAb production, IEF, chromatofocusing, Western/Southern blotting, cDNA library screening, DNA/protein sequencing, tissue culture, TLC, HPLC; Avail. September 1990; Postdoc. in academia/industry. 2-0015

M.A., 1985; Immunology, cell biology, Cell/tissue culture, flow cytometry (dual laser), electron microscopy, HPLC, small animal handling, MAb production, in vitro bioassays, biophotography, immunofluorescence microscopy; Avail. January 1990; Research/industry, Salary negot. 8-0016

Ph.D., 1985; Cell biology, physiology, biochemistry; Tissue culture, column chromatography, HPLC, gradient centrifugation, radioisotopes, electrophoresis, electron microscopy, image analysis, animal surgery, computers, cardiovascular research; Avail. July 1990; Staff position in academia or industry; Salary negot. 1-0017

Ph.D., 1972; Cardiovascular physiology, cerebral microcirculation; Local regulation of blood flow, cerebral ischemia/reperfusion, brain injury, hypertension, cranial window, microsphere, free radicals, EDRF, prostaglandins, Avail. July 1990; Industry or government preferred; Salary negot. 1-0018

Ph.D., 1986; Protein chemistry, molecular biology, enzymology; Chromatography, electrophoresis, biophysical techniques, spectroscopy, enzyme assays, cloning, DNA sequencing, blots, library screening, SI & RT mapping, in vitro transcription-translation; Research in industry; Avail. May 1990. 2-0020

M.D., 1977; Pharmacology, cell biology, physiology; Regulation of B lymphocyte antibody formation by neurotransmitter, airway cellular interaction, role of epithelial cell on airway tone, cell & tissue culture, tissue bath, ELISA, RIA, animal surgery & immunology methods; Avail. June 1990; Research in academia/industry. 3-0021

M.D., 1966; Ph.D., 1987; Molecular biology, immunology, internal medicine; cDNA synthesis/cloning/PCR, recombinant DNA construction, electrophoresis, Southern/Northern blotting, gene expression, tissue culture, MAB, RIA/ELISA, protein purification/labeling, immunofluorescence microscopy; Avail. June 1990; Research/teaching. 6-0022

Ph.D., 1990 (expected); Biochemistry, molecular biology, Protein purification, HPLC, cDNA cloning, Western/Southern/Northern blotting, colony hybridization, cDNA library construction & screening, DNA sequencing (dideoxy method), antibody production; Avail. June 1990; Postdoc. in academia/industry; Salary negot. 2-0023

Ph.D., 1990 (expected); Physiology; In vitro studies of isometric longitudinal contractions of ileal smooth muscle from rachitic and normal chicks; Avail. June 1990; Postdoc. in academia/industry; Salary negot.; New York City. 1-0025

Ph.D., 1988; Immunology, microbiology; Postdoc. experience in vivo murine tumor immunotherapy, flow cytometry, cell culture, cytotoxicity assays, isolation of NK cells, T cells, B cells-murine and human systems; Research/teaching in academia/industry; Avail. December 1990; Salary negot. 6-0026

Ph.D., 1986; Immunology, vaccines, aging; Tissue culture, PFC, bioassays for lymphokines, lymphocyte cloning, gel electrophoresis, protein purification, ELISA, FACs, MAB production, Southern/Northern blotting, gene cloning, surgery; Avail. June 1990; Industry/academia; Salary negot. 6-0027

Ph.D., 1990 (expected); Physiology and biophysics, cardiovascular physiology and pharmacology; Signal transduction mechanisms of alpha-adrenoceptors, neuroscience instructor, small animal surgery, organ blood flow, arteriole microcirculation and build oxygen electrodes. Avail. June 1990; Postdoc. in academia/industry; Salary negot. 1-0028
PLACEMENT SERVICE

The Federation operates a Placement Service, year-round and at annual meetings. It matches candidates seeking postdoctoral training and permanent positions with recruiting employers from academia, government, industry and elsewhere. Most candidates are at the doctoral level and in disciplines represented by member societies; individuals holding degrees below the doctorate are not excluded. When corporate member society(ies) conduct(s) annual meeting(s) separately from the FASEB Annual Meeting, the Placement Service also operates at the separate meeting(s). Candidates and employers participating in Placement Service activities at any annual meeting must register for attendance at that meeting. Features of the Placement Service:

CANDIDATES

Registration is in effect for one year from receipt of completed registration materials and $10 registration fee. During that year, the candidate is entitled to:

- Inclusion of application, if received by mid-January, in annual Candidates, published in February and distributed to several hundred registered employers
- Publication of Position Desired advertisement in one issue of The FASEB Journal (resulting in referral of about 2000 applications each year)
- Use of interviewing facilities at annual meeting, including interview scheduling services (about 5000 interviews scheduled per year), review of position vacancy descriptions (about 850 per year) and distribution of application to each participating employer.
- Availability of application for review by employers visiting the FASEB campus and by FASEB staff members conducting searches on behalf of employers (resulting in referral of about 1800 applications per year)

EMPLOYERS

Registration is on a calendar year basis. Fee for 1990 is $500 for commercial organizations, $250 for academic and other nonprofit institutions, with a minimal additional fee for more than two interviewers at annual meetings to the limit of five per employer registration. During the year of registration, the employer is entitled to:

- Receipt of one copy of annual Candidates, published in February (includes about 400 applications)
- *Posting of position vacancy descriptions in Placement Service area at annual meeting
- *Receipt of copy of application of each candidate attending annual meeting
- *Use of interviewing facilities at annual meeting, including interview scheduling services (about 5000 interviews scheduled per year)
  *when member society(ies) conduct(s) separate annual meeting(s) during a calendar year, a surcharge of $100 for commercial organizations, $50 for academic and other nonprofit institutions, is levied to receive these services at such meeting(s)

Following services, of principal use to employers not registered and who are charged a modest fee are also provided at no charge to registered employers:

- Receipt, upon request, of applications from candidates who insert Position Desired advertisements in The FASEB Journal
- Receipt of applications from candidates identified by search of active files, conducted by Placement Service staff based on description of desired qualifications as provided by employers

GENERAL

Advance registration until 16 days before the Sunday on which the annual meeting is encouraged; at-meeting registration is available.

For application forms and instructions and other details, please write or call: FASEB Placement Service, 9650 Rockville Pike, Bethesda, MD 20814 (301) 530-7020

PLACEMENT SERVICE SCHEDULE – 1990

FASEB
Hall D, Washington, DC Convention Center

ASBMB/AAI
Hall C, New Orleans Convention Center

REGISTRATION
Sun, April 1 2:00 pm-8:00 pm
Mon, April 2 7:30 am-4:30 pm
Tues, April 3 8:00 am-4:30 pm
Wed, April 4 8:00 am-1:00 pm

INTERVIEW SCHEDULING
Mon-Wed, April 2-4 8:30 am-4:30 pm

INTERVIEWS
Mon, Apr 2 1:00 pm-4:30 pm
Tues-Wed, April 3-4 9:00 am-4:30 pm
Thurs, April 5 9:00 am-1:00 pm

REGISTRATION
Sun, June 3 1:00 pm-8:00 pm
Mon, June 4 7:30 am-4:30 pm
Tues, June 5 8:00 am-4:30 pm
Wed, June 6 8:30 am-1:00 pm

INTERVIEW SCHEDULING
Mon-Wed, June 4-6 8:30 am-4:30 pm

INTERVIEWS
Mon, June 4 1:00 pm-4:30 pm
Tues-Wed, June 5-6 9:00 am-4:30 pm
Thurs, June 7 9:00 am-1:00 pm
YOUR WINDOW ON THE WORLD OF SCIENCE

One publication can give you a clear view of the ongoing research in your field. It's the view that thousands of your colleagues already get every single week.

Current Contents® contains the tables of contents from the leading journals in all areas of science and technology. Which translates into fast, convenient access to articles having impact on your own research.

It's timely. It's cost-effective. And it's an indispensable tool for the serious researcher like you.

To improve your view on the world of science, call toll-free 800-336-4474, operator 341, or write to the address below. If you act now you'll get a FREE four-week trial of the edition of your choice!

Current Contents is available for:
Life Sciences • Physical, Chemical & Earth Sciences • Agriculture, Biology & Environmental Sciences • Engineering, Technology & Applied Sciences • Clinical Medicine • Social & Behavioral Sciences • Arts & Humanities

Institute for Scientific Information®
"TODAY'S INFORMATION FOR TOMORROW'S DISCOVERY"
3501 Market Street, Philadelphia, PA 19104 U.S.A.

Circle 7 on Reader Service Card
"But Jones, with the new E-C Geluter® II, DNA and other materials are easily recovered."

DNA extraction has been difficult. Small quantities in large buffer volumes. Potential contamination. Complex procedures and equipment.

Now there's a better way. In the EC341 DNA Elution Device, DNA results can be as high as 70 to 80% of the sample volume. No contamination because columns are disposable.

Still need proof? Concentrate on our $295 Geluter® II.

Call 1-800-EC RANGE for more details. In Florida, 1-813-344-1644 collect.

E-C Apparatus Corp.
3831 Tyrone Blvd. N.
St. Petersburg, FL 33709
Telex: 51-4736 HALA
FAX: 1-813-343-5730

Lambda DNA-Hind III Digest. Original sample and fractions eluted with Geluter II.

EC341 Geluter® II with fixed disposable columns in place; connects to any power supply.