

## Advancing Research through Partnerships

*Conducting research and partnering with university, government, and corporate scientists to speed the translation of laboratory research into new diagnostic tests and treatments for cancer and AIDS*

### Frederick National Laboratory

Frederick National Laboratory for Cancer Research partners with university, government, and corporate scientists to develop new technologies and accelerate the translation of laboratory research into new diagnostic tests and treatments for cancer and AIDS.

Frederick National Lab is one of 39 U.S. national laboratories – in league with Brookhaven, Oak Ridge, Los Alamos and others – that combine private business practices with government operations for quick action, flexibility, and accountability. These are all government-owned, contractor-operated facilities that serve long-term research and development missions. The prime contractor for Frederick National Laboratory is SAIC-Frederick, Inc., a wholly-owned subsidiary of Science Applications International Corporation.

With a wide range of scientific expertise and advanced technologies, Frederick National Laboratory is bridging the gap between discovery and health care delivery.

Academic and government researchers locally and across the nation rely on Frederick National Laboratory to:

- Deliver pure prototype drugs
- Help win regulatory approval for new drugs, vaccines, and other therapies
- Cut the cost of nanotechnology research and make it more widely available through a standards-based approach
- Produce large quantities of clinical-grade test vaccine with little lead time
- Speed technology development and reduce costs through collaborations and partnerships with industry and academia
- Improve access to the latest, evidence-based cancer care and research for people in their home communities

Frederick National Laboratory can quickly adapt its programs to maintain a strategic focus and keep pace with new discoveries, development opportunities, and health care priorities.

### At a Glance

#### Payroll (prime contractor): ~\$144 million

- \$70 million (employees living in Frederick County)
- \$54 million (employees living in other Maryland counties)
- \$20 million (non-Maryland residents)

#### Non-payroll-related Expenditures

- \$106K in tuition payments to colleges and universities
- Frederick County vendors: \$10 million
- State of Maryland vendors: \$49 million

#### Personnel

- 1,900 SAIC-Frederick
- 200 Data Management Services, Charles River Laboratories, and Wilson Information Services
- 800 Government employees
- 2,900 Frederick National Lab total

#### Workforce Education (prime contractor)

- Baccalaureate or higher ..... 61 percent
- Associate ..... 5 percent
- No degree ..... 34 percent

#### Location

- Located 50 miles north of Washington D.C., Frederick National Lab's main campus is situated on 68 acres of land deeded to the U.S. Department of Health and Human Services and within the perimeter of Fort Detrick in Frederick, Md. – expanding into the Advanced Technology Research Facility at Riverside Research Park.

## Research and Development Partnerships

NCI's mission is to reduce the burden of cancer. To achieve this strategic goal, the "National Cancer Institute Response to Congressional Report Language on Strategic Plan Implementation (Response)" urges NCI to integrate all of its activities across a seamless research continuum.

This will require research and development partnerships and the ability to move new research discoveries out of the laboratory and into the clinic to benefit patients. This goal has been echoed in the Department of Health and Human Services' (HHS) Priorities for America's Health Care, as well as the National Institutes of Health's (NIH) Roadmap for Medical Research.

NCI has a wide range of initiatives that foster research and development partnerships, including:

- Small Business Partnerships
- Small Business Innovation Research and Small Business Technology Transfer programs, SBIR/STTR
- Basic Research and Technology Development
- Center for Strategic Scientific Initiatives
- Office of Cancer Nanotechnology Research
- Office of Clinical Proteomic Research
- Frederick National Laboratory Partnership Development Office
- Innovative Molecular Analysis Technologies Program
- NCI Experimental Therapeutics Program
- NCI Technology Transfer Center
- Partnerships with NCI Intramural Research Programs
- Office of Science & Technology Partnerships
- Clinical Opportunities for Technology Development
- NCI Cancer Therapy Evaluation Program

## Advanced Technology Research Facility

The ATRF is a 330,000-square-foot research and development facility at Riverside Research Park in Frederick, Md. The building, owned by Matan Companies, is being leased by SAIC-Frederick, Inc., which operates the Frederick National Laboratory for Cancer Research for the National Cancer Institute. The new building opened in the summer of 2012.

The facility houses research laboratories and a wide range of advanced technologies – genetics and genomics, proteomics, nanotechnology, advanced biomedical imaging, bioinformatics, and others. It is also home to a drug development and cGMP manufacturing operation that produces candidate drugs for human clinical trials.

About 40,000 square feet of interior space is reserved for government and contractor scientists to work side-by-side with research partners and collaborators. This arrangement supports NCI's wide range of partnership initiatives, including the Frederick National Lab's Partnership Development Office, which brings together researchers from the government, industry, academia, and the nonprofit sector to accelerate the translation of basic laboratory findings into clinical technologies and treatments for patients with cancer and AIDS.

NCI's focus on partnerships has intensified following a series of reports from NCI, the Food and Drug Administration, and the General Accountability Office calling for improved public-private partnerships and the use of advanced technologies to overcome translational research barriers and to benefit patients.

The move to the new facility consolidates staff and operations that were scattered among more than 30 separate buildings on the main campus of the Frederick National Lab, located within the perimeter of Fort Detrick. The Frederick National Lab continues to maintain laboratories on this campus.

About 250 employees have moved into the new facility. As many as 200 additional hires are anticipated over the next five years. Since partnership projects may stimulate business start-ups, business incubation facilities are also being considered at the research park.

NCI's partnership initiatives and the Riverside construction project together will enable the institute to accelerate progress, stimulate research collaboration, and create opportunities for business and economic development. This is what it will take to realize a new vision for maximizing the impact of scientific discovery on human health.