National Cancer Institute

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Cancer Prevention Fellowship Program Application Catalog

U.S. DEPARTMENT OF HEALTH AND HUMAN SERVICES National Institutes of Health

Cancer Prevention Fellowship Program

APPLICATION DEADLINE: AUGUST 25

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Website:

http://cancer.gov/prevention/pob

IMPORTANT DATES:

Application deadline: August 25 All application materials must be submitted by this date.

One-day interview: October

Notification: Mid November

Appointment starts: June

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Cancer Prevention Fellowship Program 2010



Row One: David Nelson, David Portnoy, Brandy Heckman-Stoddard, Jada Hamilton, Nadine Bewry, Wenny Lin, Shahinaz Gadalla, Gabriel Lai

Row Two: Jessica Faupel-Badger, Deanna Kepka, Yvonne Hunt, Annette Kaufman, Dana van Bemmel, Elizabeth Hill Ruder, Tram Kim Lam, Sanjeeve Balasubramaniam

Row Three: Roberto Flores, Petra (Peko) Tsuji, Kelly Filipski, Erin Kent, Paula Hyland, Cher Dallal

Row Four: Todd Gibson, Erin Hennessy, Tricia Luhn, David Wheeler, Corinne Leach, James McClain, Stephan Woditschka

Not Pictured: Laura Pence Forsythe, Jennifer Drahos, Hisani Horne, Amber Koblitz, Paige Miller, Leticia Nogueira, M. Khair ElZarrad, Kristen Leigh Greathouse, A. Susana Ramirez, Tiffany Bates, Nicole Hollis, Ellen Jaffe, Studly Auguste

DIRECTOR'S MESSAGE

Preventing cancer is one of the most important scientific and public health goals of the 21st Century. To achieve that goal, the Nation needs leaders: scientists and health professionals trained in the principles and practice of cancer prevention and control. At the National Cancer Institute (NCI) the Cancer Prevention Fellowship Program (CPFP) provides state-of-the-art training in cancer prevention and control.

The centerpiece of the CPFP is mentored research at the NCI. With input from senior scientific mentors and from program scientific staff, each fellow develops original scientific projects and reports findings at scientific meetings and in leading journals. The primary goal is for each fellow to develop an independent research program in cancer prevention.

Research opportunities for Cancer Prevention Fellows reflect the broad origins and applications of many biomedical sciences relevant to public health and clinical medicine. Opportunities exist for basic science laboratory studies, clinical studies, epidemiologic studies, intervention trials, and studies of the biological and social aspects of health behavior. Examples of specific research opportunities and individual mentors at the NCI are found in this catalog and on our website. Further, an initiative of the NCI and the Food and Drug Administration (FDA) affords fellows the prospect of applying research in drugs, biologics, medical devices, or other areas to the field of cancer prevention.

The CPFP also offers an opportunity for fellows to receive a Master of Public Health (M.P.H.) degree at any 12-month accredited program in the United States. Other educational activities include the NCI Summer Curriculum



in Cancer Prevention, weekly seminars, and professional development workshops.

Our program is regularly evaluated and growing. Our alumni can be found across the country taking the lead at cancer centers, universities, government agencies, research firms, policy organizations, and in clinical practice. Many former fellows now act as mentors, assisting those who are following in their footsteps.

As Director of the CPFP, I am committed to providing a comprehensive postdoctoral program that is flexible enough to permit individual creativity and resourceful enough to provide opportunities for meaningful discoveries. Structured to promote a collaborative spirit of fellowship, the program recruits diverse applicants. We work hard to provide an equitable and competitive application process. We believe that the CPFP provides a solid foundation upon which fellows can build knowledge and experience and become leaders.

On behalf of all of us who are committed to eliminating death and suffering from cancer patients, physicians and nurses, researchers, other scientists, and the general public—I urge you to join us in this endeavor. Please read the eligibility requirements and submit your application. We look forward to hearing from you.

David E. Nelson, M.D., M.P.H.

Director, Cancer Prevention Fellowship Program National Cancer Institute

Program Description

Overview

The overarching goal of the CPFP is to provide a strong foundation for scientists and clinicians to train in the field of cancer prevention and control. As part of the program, we offer training toward an M.P.H. degree (if necessary) at an accredited university during the first year, followed by mentored research with investigators at the NCI. Outstanding opportunities for cutting-edge research in the basic, guantitative, social and behavioral sciences, in clinical cancer prevention, and in other areas have been the hallmarks of the CPFP since its inception in 1987. Furthermore, a partnership between the NCI and FDA provides opportunities for prevention research in drugs, biologics, and medical devices. Other educational opportunities are provided throughout the fellowship to complement the research training, including the NCI Summer Curriculum in Cancer Prevention; the Molecular Prevention Laboratory; the NCI Cancer Prevention and Control Colloquia Series; and the weekly Fellows' Research Meeting. Additional leadership and professional development training opportunities are available within the NCI and elsewhere. These aspects of the program, as well as eligibility requirements, application procedures, selected bibliography of current and former fellows' recent publications, and a glimpse at life in the Washington, D.C. area are described in this catalog. Additional information about the CPFP can be found on our website at http://cancer.gov/prevention/pob.

Master of Public Health

One of the unique features of the CPFP is the opportunity to receive formal, academic training in public health. By pursuing an M.P.H. degree, fellows learn about the current role of cancer prevention in public health and understand cancer prevention in the historical context of public health. The M.P.H. provides individuals with a strong foundation in the quantitative sciences of epidemiology and biostatistics. Fellows who already possess an M.P.H. degree, a Dr.P.H. degree, or a Ph.D. degree in biostatistics or epidemiology typically come directly to the NCI to begin their research.

Once accepted into the CPFP, each fellow is responsible for arranging admission to a university offering an M.P.H. program that can be completed in 12 months or less. The NCI will pay the tuition, fees, book allowance, and fellow's stipend during this year. It is expected that all M.P.H. requirements will be completed by the start of the NCI Summer Curriculum in Cancer Prevention.

Fellows pursuing an M.P.H. degree are required to remain in the CPFP for a period twice the length of time of the M.P.H. training or to reimburse the Government the cost of the training and expenses. For example, attending a 12-month M.P.H. program requires a 24-month payback. It is the fellow's responsibility to check with the university about admission, courses, and GRE requirements, as well as to ensure that the M.P.H. can be completed within the one-year time frame. Typically, universities require mathematics, biology, and chemistry courses at the undergraduate level; a current (usually within 5 years) GRE score; and completion of the TOEFL (for foreign education) before acceptance into an M.P.H. program. The MCAT is the equivalent GRE requirement for physicians. To obtain information about the GRE, call (609) 771-7670; write to the Graduate Record Examination at P.O. Box 6000, Princeton, NJ 08541-6000; or visit the website

http://www.gre.org.

Listed below are examples of one-year accredited M.P.H. programs (as of November 2010) with their application due dates. Cancer Prevention Fellows have graduated from the universities marked **. For additional and updated information on M.P.H. programs, refer to the Association of Schools of Public Health website http://www.asph.org.

- Harvard University** (December 15)
- Johns Hopkins University** (December 1)
- Tulane University** (Rolling Admissions)
- Uniformed Services University of the Health Sciences (January 15)
- University of Kansas Medical Center** (March 1)
- University of Minnesota** (Priority December 1; Final April 15)
- University of Southern Mississippi (April 15)
- Virginia Commonwealth University (January 1)
- Yale School of Public Health (January 15)

Mentored Research

Under the shared guidance of an individual NCI preceptor and the CPFP scientific staff, fellows will develop original research projects in cancer prevention and control. An overview of the preceptorships is provided in this catalog (refer to *Preceptorships* section), and a more complete listing is provided on our and other NCI websites.

http://cancer.gov/prevention/pob http://ccr.cancer.gov/ http://cancercontrol.cancer.gov/index.html http://dceg.cancer.gov/



"The CPFP is an outstanding program—recognized throughout the U.S. and further afield as a standard of excellence. As Fellows we are afforded extraordinary freedom to explore opportunities across disciplines and fields within the NCI, all with the unwavering support of the CPFP staff. I know of no program like it for quality of training and mentoring offered as well as camaraderie between Fellows."

Gwen Murphy, Ph.D., M.P.H., Fellow Alumna, Division of Cancer Epidemiology and Genetics, NCI Collaboration with investigators throughout the NCI is encouraged. Research opportunities include, but are not limited to:

- Biomarker development
- Chemoprevention
 studies
- Clinical cancer
 prevention
 research
- Communication
- Effectiveness and outcomes research
- Epidemiology (clinical,



"The opportunities for scientific training and professional growth provided by the Cancer Prevention Fellowship Program are limitless."

Amanda Black, Ph.D., M.P.H., Fellow Alumna, Division of Cancer Epidemiology and Genetics, NCI

environmental, genetic, molecular, nutritional)

- Ethics and evidence-based decision making (theoretical and practical studies)
- Health disparities and special populations
- Laboratory-based research (chemoprevention, molecular biology and genetics, nutritional science)
- Screening and early detection
- Social and behavioral research
- Statistical methodology (biometry and bioinformatics)
- Survivorship

Additional Research Opportunities

IRELAND-NORTHERN IRELAND-NCI CANCER CONSORTIUM

The NCI has formed a multilateral partnership with Ireland and Northern Ireland to promote cooperation in all aspects of cancer research, treatment, and prevention. As part of this Ireland-Northern Ireland-NCI Cancer Consortium, the CPFP is open to applicants from Ireland and Northern Ireland. It is intended that individuals applying through the Consortium will pursue careers in cancer prevention in Ireland or Northern Ireland upon completion of the fellowship.

The program provides M.P.H. training in Ireland or Northern Ireland (year 1), the Summer Curriculum in Cancer Prevention, and mentored research at the NCI (years 2–4). If the applicant already possesses an M.P.H. degree and a primary degree in a health-related discipline or a Ph.D. in epidemiology or biostatistics, the fellowship will typically begin directly at the NCI (years 1–3). To be eligible to apply through the Consortium, the applicant must:

- Possess a doctoral degree (M.D., Ph.D., J.D., or equivalent) or expect to complete the degree requirements by the start date of the fellowship. Assurance that all requirements will be completed must be supplied in writing by the chair of the dissertation committee (e.g., Ph.D. candidates) or dean of the school (e.g., M.D. candidates).
- Be an Irish citizen of the Republic of Ireland, UK citizen of Northern Ireland, or a citizen of the European Union (EU) currently employed on the island of Ireland. Proof of citizenship (birth certificate or passport) and proof of employment in Ireland or Northern Ireland is required.
- For Northern Ireland applicants: Be employed by the Health and Social Care (HSC) Research and Development Office of Northern Ireland); by voluntary, not-for-profit organizations in Northern Ireland involved in health or social care provision; by Queens University, Belfast or by University of Ulster.

Applicants must be eligible to acquire a J-1 visa from the relevant U.S. Embassy or Consulate. It is the responsibility of the applicant to ensure that he/she will, in principle, satisfy the visa requirements before submitting an application.

The Consortium will provide funds to attend an interview at NCI, if invited; M.P.H. training in Ireland/Northern Ireland; stipend; move to the U.S. and return; health insurance; and one scientific meeting per year while at the NCI.

Applicants should allow sufficient time to obtain approval through the Consortium prior to the August 25 application deadline. For more information, please call the Cancer Prevention Fellowship Program Office at 301-496-8640 or email us at cpfpcoordinator@mail.nih.gov.

NCI-FDA JOINT TRAINING IN CANCER PREVENTION

Cancer Prevention Fellows are eligible to participate in the NCI-FDA joint training in cancer prevention initiative, under the auspices of the Interagency Oncology Task Force (IOTF) Track 4. This component of the CPFP provides training in cancer prevention and in the development and approval processes of drugs, biologic agents, devices, or nutritional products. The program's interdisciplinary training will enable scientists to more rapidly move novel chemopreventive agents and early detection methods from the laboratory to the community.

Background and Rationale. In 2003, the NCI Director and the FDA Commissioner joined forces to more rapidly identify effective cancer preventive agents and cancer treatments, thereby accelerating the process of introducing new agents



"The CPFP is a fantastic program, offering unparalleled research and training opportunities in a genuinely supportive environment. This fellowship has encouraged me to collaborate with experts across NCI and NIH, allowing me to refine my research interests and develop my skills as an independent scientist."

Jada Hamilton, Ph.D., M.P.H., Current Fellow, Cancer Prevention Fellowship Program into the clinic. Arising from this joint commitment was an initiative to train postdoctoral scientists and clinicians in research in cancer prevention, drug development, and regulatory review. Research training opportunities exist in several centers at the FDA in the areas of biologics (Center for Biologics Evaluation and Research (CBER)), drugs (Center for Drug Evaluation and Research (CDER)), medical devices and imaging (Center for Devices and Radiologic Health (CDRH)), and nutrition science and policy (Center for Food Safety and Nutrition (CFSAN)).

The NCI-FDA joint training in cancer prevention initiative will provide the opportunity for fellows to participate in all the activities of the CPFP at the NCI and in research and product development and regulatory review at the FDA. Combining training in public health, cancer prevention, and product development and regulatory research will allow individuals to develop expertise across three disciplines. This offers the possibility of developing novel agents and products, designing and implementing clinical trials in chemoprevention and early detection, and advancing the nutritional sciences.

Research Opportunities. General categories of research topics include:

- Cancer risk of drug, device, and gene therapy products
- Cellular substrates in vaccine development
- Clinical trial design and analytic methodology
- Development and selection of biomarkers and clinical endpoints in clinical trials
- Development of chemopreventive agents
- Genetic toxicology and cancer prevention
- Genomic and proteomic approaches
 to early detection of cancer
- Molecular and genetic approaches in product development
- Nutrition science and policy
- Screening and early detection
- Vaccination and cancer prevention

Further information is available at **http://iotftraining.nci.nih.gov.**

Program Description

CLINICAL CANCER PREVENTION RESEARCH

Clinicians have the opportunity to participate in multidisciplinary research, the hallmark of the CPFP, in order to help bridge the gap between clinical and pre-clinical cancer prevention science.

Background and Rationale. Clinical research is fundamental to the practice of cancer prevention. Over the past decades, with advances in the basic sciences, innovations in bioengineering, and findings from epidemiologic studies, the multidisciplinary field of cancer prevention has flourished. Through clinical research, the application of these discoveries has led to the identification of effective chemopreventive agents, novel early detection technologies, and recognition of individuals at high risk of developing cancer. Additionally, clinical intervention trials, as exemplified in the nutritional and behavioral sciences, have yielded successful cancer prevention strategies.

The design, implementation, analysis, and interpretation of clinical prevention studies is a research area for which few clinicians are adequately trained. The opportunity now exists within the CPFP for postdoctoral clinicians, including physicians, nurses, psychologists, and pharmacists, to combine formal training in clinical research methodology with their clinical acumen and interest in cancer prevention.

Research Opportunities.

General categories of research topics include:

- Behavioral intervention
 research
- Biomarker
 development
- Clinical studies in high-risk populations
- Clinical trials of chemopreventive agents
- Design and analysis of prevention trials
- Epidemiology (clinical, molecular, genetic, nutritional, environmental)
- Ethical issues in clinical prevention
- Ethics and evidencebased clinical decision making (theoretical and practic
 - (theoretical and practical studies) Evaluation and outcomes research of clinical prevention practices
- Health disparities and special populations research
- Laboratory-based research (chemoprevention studies, molecular biology and genetics, molecular carcinogenesis, nutritional science)
- · Nutritional intervention studies
- Screening and early detection trials
- Studies of genetic susceptibility and cancer



"The CPFP is a superb training program. It has given me the opportunity to work with leading researchers across various disciplines and to capitalize on the immense data resources at the NCI. Most importantly, the program has offered me the support and freedom to pursue my own research interests."

Paul Han, M.D., M.A., M.P.H., Fellow Alumnus, Maine Medical Center Research Institute

Master in Clinical Investigation

Fellows pursuing clinical cancer prevention research or participating in the NCI-FDA joint training in cancer prevention may elect to obtain a master's degree in clinical investigation or its equivalent.

Once accepted into the CPFP, each fellow is responsible for arranging admission to an accredited university offering a master's program that can be completed in 12 months or less. The NCI will pay the tuition, fees, book allowance, and fellow's stipend during this year. It is expected that all master's degree requirements will be completed by the start of the NCI Summer Curriculum in Cancer Prevention.

Fellows pursuing a master's degree are required to remain in the CPFP for a period twice the length of time of the master's training or to reimburse the government the cost of the training and expenses. For example, attending a 12-month M.S. program requires a 24-month payback.

Located to the right are some of the accredited institutions currently offering a one-year master's program in clinical investigation (as of November 2010), the degree offered, and the application due date. Individuals wishing to attend an institution not listed below should contact the CPFP staff prior to application to the master's degree program. It is the responsibility of each fellow to ensure that the master's degree training can be completed within the one-year time frame.

Boston University School of Medicine

M.A. in Clinical Investigation (March 31)

Columbia University School of Public Health M.S. in Biostatistics: Clinical Research Methods Track (December 1)

Duke University Medical Center M.H.S. in Clinical Research (May 15)

Harvard School of Public Health M.P.H. in Clinical Effectiveness (February 1)

NIH Warren G. Magnuson Clinical Center/ Duke University Medical Center M.H.S in Clinical Research (April 16)

Stanford University Clinical Research Training Program

M.S. in Clinical Epidemiology (January 15)

The Johns Hopkins Schools of Medicine and Public Health

M.H.S. in Clinical Investigation (March 1)

University of Alabama at Birmingham M.S.P.H. in Clinical Studies (April 1)

University of Minnesota School of Public Health

M.S. in Clinical Research (December 1)

University of Virginia

M.S. in Health Evaluation Sciences: Clinical Investigation Track (March 1)



2010 Annual Advances Keynote Speaker and CPFP Scientific Staff

 Row 1: Jessica Faupel-Badger, Ph.D., M.P.H., Dana van Bemmel, Ph.D., M.P.H.,
 Row 2: David E. Nelson, M.D., M.P.H., Andrea De Censi, M.D.

NCI Summer Curriculum in Cancer Prevention

Principles and Practice of Cancer Prevention

and Control Course. This four-week summer course provides specialized instruction in the principles and practice of cancer prevention and control. It focuses on concepts, methods, issues, and applications related to this field. Participants will gain a broad-based perspective in terms of available resources, scientific data, and quantitative and qualitative methods. The course is typically divided into the following modules:

- Introduction to the Cancer Problem
- Cancer Prevention: An International Perspective
- Application of Cancer Prevention Methods
- Diet and Cancer Prevention
- Behavioral Science and
 Community Interventions
- Ethics, Law, and Policy in Cancer Prevention and Control
- Epidemiology, Prevention, and Control of Site-Specific Tumors
- Annual Advances in Cancer Prevention
- Health Disparities and Cancer
 Prevention in Diverse Populations
- Environmental and Occupational Cancer
- Disseminating Scientific Knowledge

Molecular Prevention Course. This one-week course on molecular aspects of cancer prevention follows the *Principles and Practice of Cancer Prevention and Control* course. It provides a strong background in the molecular biology and genetics of cancer and an overview of basic laboratory approaches applied to cutting-edge research in the fields of molecular epidemiology, chemoprevention, biomarkers, and translational research. Typically the following topics are presented:

- An Overview of Carcinogenesis
- Oncogenes, Tumor Suppressor Genes, and Other Cancer-Related Genes
- Animal Models for Cancer Prevention Studies
- Methylation as a Target for Chemoprevention
- Xenobiotic Metabolism and Cancer Susceptibility
- Hormonal Carcinogenesis
- The Immune System as a Target for Vaccine and Prevention Approaches
- Cancer from a Biosystem Perspective
- The Role of Inflammation in Cancer
- New Approaches to Imaging Cancer Processes
- Application of Genomics and Proteomics to Cancer Prevention Research
- Microarray Approaches in Cancer Prevention
- Molecular Epidemiology: The Integration of Molecular Markers into Population Studies

Annual Advances in Cancer Prevention Lecture.

A special keynote lecture became part of the NCI Summer Curriculum in Cancer Prevention in 2000. The lecture is usually held the last week of July at Lister Hill Auditorium, National Library of Medicine, Bethesda, Maryland. The keynote speaker, date, and time will be announced on our website.



In 2010, Andrea De Censi, M.D., Director of the Division of Medical Oncology, E.O. Ospedali Galliera Genova, Italy presented "Cancer Prevention Therapy: Accomplishments And Challenges."



In 2009, Olufunmilayo F. Olopade M.D., F.A.C.P., Professor of Medicine and Human Genetics and Director of the Cancer Risk Clinic Department of Medicine BSD Section of Hematology/ Oncology University of Chicago

presented "Clinical Cancer Genetics and Prevention."



In 2008, Patricia Ganz, M.D., Professor of Health Services in the School of Public Health, Professor of Medicine in the David Geffen School of Medicine at UCLA and Vice Chair of the Department of Health Services, Los Angeles, CA,

presented, "Cancer Survivors: Charting an Agenda for Research, Treatment, and Quality of Care."



In 2007, Barnett S. Kramer, M.D., MPH, Associate Director for Disease Prevention and Director of the Office of Medical Applications of Research in the Office of Disease Prevention, Office of the Director, National

Institutes of Health, Bethesda, MD, presented "Cancer Prevention: Distinguishing Strength of Evidence from Strength of Opinion."



In 2006, Frank L. Meyskens, Jr., M.D., Professor of Medicine and Biological Chemistry; Director, Chao Family Comprehensive Cancer Center; Senior Associate Dean of Health Sciences, University of California, Irvine,

CA, presented "The Promises and Perils of Clinical Chemoprevention: 1980–2030."





In 2005, John Potter, M.B.B.S., Ph.D., Senior Vice President and Division Director, Fred Hutchinson Cancer Research Center, Seattle, WA, presented "What We Know and Don't Know About Colorectal Neoplasia."



of Molecular Targets for Cancer Prevention and Therapy."



In 2003, Elio Riboli, M.D., Sc.M., M.P.H., Chief, Unit of Nutrition and Cancer at the International Agency for Research on Cancer, Lyon, France, presented "Cancer Prevention: A European Perspective."



In 2002, Leslie Bernstein, Ph.D., AFLAC, Inc., Chair in Cancer Research; Professor, Preventive Medicine; and Senior Associate Dean, Faculty Affairs at Keck School of Medicine, University of Southern California,

Los Angeles, CA, presented "Cancer Prevention: Opportunities for Action."



In 2001, Frederick P. Li, M.D., Chief, Cancer Control Program, Division of Cancer Epidemiology and Control, Adult Oncology Department at Dana-Farber/Harvard Cancer Center, Boston, MA, presented

"The Identification and Care of Those at Highest Risk of Cancer."



In 2000, Bernard Levin, M.D., Professor of Medicine at the University of Texas M. D. Anderson Cancer Center, Houston, TX, presented "Cancer Prevention: What is the Future?" **The Faculty.** NCI Summer Curriculum in Cancer Prevention faculty consists of approximately 85 leading scientists at NCI, NIH, other government agencies, academia, cancer centers, and public and private organizations throughout the United States. The faculty is listed on our website **http://cancer.gov/prevention/pob**. The courses are designed to provide an interactive training experience to allow participants to develop a thorough knowledge of the activities in cancer prevention and control.

Eligibility. Both courses are open to physicians, scientists, and other health care professionals who have an interest in cancer prevention and control. Acceptance into the CPFP is not necessary for participation in either course. Individuals from cancer centers, universities, health departments, industry, U.S. Federal Government, and from across the United States and around the world have previously attended.

Recommended prerequisite courses are epidemiology, biostatistics, and cancer biology. Preference is given to individuals with a doctoral degree and/or relevant experience in cancer prevention and control. There is no cost to register or to participate in either course. Room, board, and transportation expenses are the responsibility of the participant. The NCI Office of International Affairs (OIA) has a limited amount of funding available for individuals from developing countries. International participants interested in financial support should contact the OIA by February 15.



Molecular Prevention Course Participants 2010

Dates/Times/Location. The *Principles and Practice of Cancer Prevention and Control* course is four weeks long and usually offered from July through early August. The *Molecular Prevention* course is a one week course usually offered in early August.

Both courses are held in Rockville, Maryland. Lectures are scheduled Monday through Friday, 8:30 am–2:30 pm (occasionally lecture times will vary). **Registration.** Registration is required due to space limitations. The registration period ends March 15. Preference is given to individuals with a doctoral degree or relevant experience in cancer



"Being a part of the CPFP has been a wonderful experience. Through the NCl, the program offers a variety of training and research opportunities. In attracting fellows from various disciplines, the program has also expanded my understanding and awareness of the broad spectrum of cancer prevention. Bonuses come in the form of new friendships and the understanding that the NCI is a family-friendly environment."

Gabriel Lai, Ph.D., M.H.S. Current Fellow, Cancer Prevention Fellowship Program prevention and control. To register, please apply at our website (http://cancer. gov/prevention/pob) by clicking on the Summer Curriculum tab. The following information is required:

- Curriculum vitae (include complete work address, telephone, fax, and e-mail)
- Letter of nomination from the director of your institute or department on official letterhead
- Course title (e.g., Principles and Practice of Cancer Prevention and Control course, Molecular Prevention course, or both courses) Registrants will be notified of their status after

notified of their status after all materials have been received and reviewed.

Additional Requirements for International Participants Applying for Funding. In addition to the documents listed previously, international applicants must provide the following:

- Copy of doctoral degree, and/or Dr.P.H. and M.P.H. degrees (in original language with English translation, if necessary)
- Letter stating your proficiency in written and spoken English

Limited funding for living expenses may be available for applicants from low, middle, and upper-middle income countries, or institutions in resource poor settings, who register for both courses (The *Principles and Practice of Cancer Prevention and Control* course and the *Molecular Prevention* course), or just the 4-week course (The *Principles and Practice of Cancer Prevention and Control* course). Funding will not be provided for the 1-week *Molecular Prevention* course alone.

Registration will close on February 15 for International participants. This is to allow ample time for visa processing and other logistical requirements. Applicants will be notified about their funding level by the Director, Office of International Affairs, NCI.

Contact Information:

Program Coordinator NCI Summer Curriculum in Cancer Prevention 6120 Executive Boulevard (EPS) Suite 150E, MSC 7105 Bethesda, MD 20892-7105 Telephone (301) 496-8640 Fax (301) 480-2669 E-mail cpfpcoordinator@mail.nih.gov

For further information, please visit our website **http://cancer.gov/prevention/pob** and click on the Summer Curriculum tab.

If you are a person with a disability and require any assistive device, services, or other reasonable accommodation to participate in these activities, please contact the CPFP Office at (301) 496-8640 at least one week in advance of the lecture date to discuss your needs.

Other Program Components

MOLECULAR PREVENTION LABORATORY COURSE

Along with participation in the Summer Curriculum in Cancer Prevention, all fellows at the NCI take part in the *Molecular Prevention Laboratory* course, a hands-on laboratory experience that is open only to Cancer Prevention Fellows. The course provides fellows, especially those with limited laboratory experience, tangible reference points for understanding laboratory applications commonly used in cancer prevention research. The course consists of brief explanatory lectures interwoven with laboratory demonstrations. Each exercise is designed to provide instruction in laboratory techniques that are frequently referenced in the Summer Curriculum in Cancer Prevention lectures.



Molecular Prevention Laboratory Course Left to Right: Gabriel Lai, Deanna Kepka, Tricia Luhn, and Annette Kaufman

ANNUAL CANCER PREVENTION FELLOWS' SCIENTIFIC SYMPOSIUM

In September 2002, the CPFP held its First Annual Cancer Prevention Fellows' Scientific Symposium. This inaugural event set the stage for the subsequent yearly symposia held each fall just prior to the start of the Cancer Prevention and Control Colloquia Series. The Symposium is an occasion to bring together the senior fellows, those fellows who have recently arrived at the NCI, and the CPFP staff for a day of scientific exchange in the area of cancer prevention. The event provides an opportunity for fellows to discuss their projects, ideas, and potential future collaborations. Fellows spearhead the planning of the Symposium, including the development of the program agenda and special workshops, and the selection of invited speakers.

FELLOWS' RESEARCH MEETINGS

Between September and June, Cancer Prevention Fellows and CPFP scientific staff meet weekly for a Fellow's Research Meeting. These meetings provide a forum for fellows to formally present their research to a multidisciplinary audience. This also is an opportunity for fellows and staff to learn about prevention research ongoing at the NCI in diverse scientific fields. Fellows' preceptors and invited guests are welcome to attend.

CANCER PREVENTION AND CONTROL COLLOQUIA SERIES

Following the Fellows' Research Meeting, fellows attend the Cancer Prevention and Control Colloquia Series. These seminars feature leading scientists in the field of cancer prevention and control. Each fellow has the opportunity to invite prominent investigators in his/her discipline to present at these NCI-sponsored lectures.

GRANTS AND GRANTSMANSHIP WORKSHOP

The CPFP provides formal training in grantsmanship through a Grants and Grantsmanship Workshop offered each year. In addition to providing didactic and practical experiences in the grants process, a major goal of the workshop is to facilitate successful applications



"I'm amazed with the research opportunities offered by the CPFP at NCI. The resources and support services are phenomenal and the experts are often just down the hall. It's even possible to apply for grants outside of NCI as a Principal Investigator, which is a truly unique perk of this training program."

Beth Dixon, Ph.D., M.P.H., Fellow Alumna, New York University for research funds for all interested fellows. This training is designed to prepare each fellow for a critical next step in his or her career in which demonstrated ability to develop and organize ideas into a well-written proposal will be a major determinant in hiring and promotion decisions. Since the Grants and Grantsmanship Workshop was first offered in January 2000, CPFP fellows have successfully competed for peerreviewed grants, including NCI Intramural Research Awards, Department of Defense Research Program grants, private foundation grants, and NCI K07, K22, and K99/ **R00** Career Development Awards.

PRESENTATION SKILLS COURSE

In order to improve communication and presentation skills of Cancer Prevention Fellows, we provide formal public speaking training. This four day workshop is offered twice yearly, in January and February. Didactic instruction addresses the parts and structure of a scientific presentation, systematic approaches to presentation preparation, critical techniques for clear delivery, and ways to respond to audience questions. The workshop includes individual skill assessment, coaching, and evaluation of fellows' progress through both peer and instructor feedback.



"The CPFP provides Fellows with the opportunity to work with some of the world's leading cancer experts at the NCI and is recognized as an outstanding program at both the national and international level. The CPFP has allowed me to pursue a career path towards molecular epidemiology and cancer prevention research while also building on my basic science expertise. The resources and support provided during the program by both preceptor and CPFP staff are amazing. There also is a true sense of collegiality and community among the Fellows as a group. This is an exciting time to be involved in the advancing frontier of cancer prevention research and I feel privileged to be part of this program."

Paula Hyland, Ph.D., M.P.H. Current Fellow, Cancer Prevention Fellowship Program

LEADERSHIP AND PROFESSIONAL DEVELOPMENT TRAINING

The foundation for success in the field of cancer prevention is based on leadership skills, professional excellence, and mastery of one's scientific discipline. Within the CPFP, our goal is to help fellows maximize their individual potential for leadership and scientific contribution to the field of cancer prevention through a series of professional development activities. These activities are designed to prepare individuals for the transition from postdoctoral fellows to successful, independent scientists and professionals in cancer prevention.

To meet the individual needs of fellows, professional development activities consist of structured workshops, seminars, and personal meetings, including:

- Mentoring Relationships
- Team Dynamics
- Interviewing and Negotiating
- Networking and Effective Communication
- Scientific Writing
- Setting Goals, Planning Priorities, and Managing Time

We have organized the professional development activities to address the needs of fellows at the beginning, middle, and end of the fellowship. In addition to those highlighted above, new activities are being developed to further expand the portfolio of professional development training.

ADDITIONAL TRAINING

Fellows may also participate in academic courses in subject areas relevant to cancer prevention and control. These courses are typically offered by schools of public health, departments of preventive medicine and epidemiology, the federal government, and other organizations. Such training will be considered in cases where regulations permit and where the learning experience is expected to significantly



"The CPFP provides the unique opportunity to do transdisciplinary research, grow professionally, and balance work and private life"

Gerd Bobe, Ph.D., M.P.H. Fellow Alumnus, Oregon State University, Linus Pauling Institute

enhance the trainee's research capabilities.

FIELD EXPERIENCES

Fellows may choose to pursue field experiences at institutions outside the NIH that are currently engaged in cancer prevention research, cancer surveillance, cancer control applications, or other related activities. These experiences, usually at local institutions, are typically brief and require prior approval by the CPFP.

Program Information

Eligibility

To be considered for the CPFP, you must meet the following eligibility requirements:



"The fellowship offers a unique opportunity to integrate social and lab-based sciences with population-based approaches. The public health training provided by CPFP has allowed me to enhance and broaden my research in psycho-oncology and physical activity. The opportunities for collaboration have also been phenomenal. I have seen no other post-doctoral program that equals the CPFP in terms of training, access to outstanding mentorship and research opportunities, as well as important levels of independence and autonomy."

Ashley Wilder Smith, Ph.D., M.P.H., Fellow Alumna, Division of Cancer Control and Population Studies, NCI

DOCTORAL DEGREE

You must possess an M.D., Ph.D., J.D., or other doctoral degree in a related discipline (e.g., epidemiology, biostatistics, ethics, philosophy, or the biomedical, nutritional, public health, social, or behavioral sciences). Foreign education must be comparable to that received in the United States.

Applicants currently enrolled in accredited doctoral degree programs that have not yet fulfilled all degree requirements will be considered for entry into the program, with the understanding that all requirements will be completed before the start of the CPFP. Assurance to this effect must be supplied in writing by the chair of the dissertation committee (e.g., Ph.D. candidates) or the dean of the school (e.g., M.D. candidates).

Applicants must have less than five years of relevant postdoctoral training at the time of appointment.

CITIZENSHIP

You must be a citizen or permanent resident of the United States at the time of application (September 1). The I-551 stamp in a passport is acceptable; "Employment Authorization" documents are not acceptable.

Applicants applying through the Ireland-Northern Ireland-NCI Cancer Consortium should refer to the *Ireland-Northern Ireland-NCI Cancer Consortium* section for guidelines.

Stipends and Benefits

Stipends. Each stipend will be determined by the individual's degree and years of relevant postdoctoral experience. Fellows entering the program with no prior postdoctoral experience will start at approximately \$49,400. Stipend levels increase with the number of years of postdoctoral experience. Annual increases may be given. Specialty competitive allowances are given for degrees in epidemiology or biostatistics, for J.D.s or M.D./Ph.D.s, and for board-certified M.D.s engaged in patient care. Stipends are subject to change depending on federal guidelines.

Health Insurance and Leave. Fellows will receive individual or family health insurance and paid federal holidays, annual leave, sick leave, and family leave.

Travel and Relocation. The NCI may cover the cost of relocation expenses up to a maximum of \$3,000 (i.e., travel, shipment of household goods, and temporary storage, if necessary) for the fellow and his/her dependents for one move to the area where M.P.H. training will be pursued *or* to the Rockville, Maryland area. Reimbursement will be in accordance with prevailing government regulations. No return travel is authorized.

Expenses may be provided for travel to meetings and training each year for each fellow, excluding the M.P.H. year.

Selection and Interview

All complete applications submitted by eligible candidates by the application deadline will be reviewed by members of the CPFP Scientific Education Committee. This Committee is comprised of scientists from different divisions within the NCI, the FDA, and an *ad hoc* member from outside the NCI with expertise in the field of cancer prevention and control. Those applicants judged to be highly qualified will be notified in late September and invited for a one-day interview. The interviews will be held in October in Rockville, Maryland. Applicants will be notified of their status shortly thereafter.

Start and Duration of Appointment

Start of Appointment. Individuals entering the CPFP directly (e.g., not pursuing M.P.H. training) will start in June. For individuals obtaining an M.P.H. or equivalent degree during the first year, the appointment begins with the start of the master's program. All fellows entering the program are expected to attend the CPFP Orientation in Rockville, Maryland, which is held in June.

Duration of Appointment. The initial appointment will be for 1 year and may be renewed on a yearly basis. The typical duration is 4 years (year 1: master's degree; years 2 through 4: NCI Summer Curriculum in Cancer Prevention and mentored research). If a master's degree is obtained during the first year of the program, the fellow is required to remain in the CPFP for a period twice the duration of the master's training period. All renewals are contingent upon total duration of stay at the NIH, which cannot exceed 5 years for a non-tenured appointment nor exceed 8 years for any type of doctoral-level position.

Guidelines for Application

Application Materials

The following application materials are required, as described below:

Personal Statement of Research Goals. In

narrative form, describe your research interests and goals and how these relate to the field of cancer prevention and control. Please also provide insight into your short- and long-term career goals, and explain how the CPFP will help you in achieving those goals. Limit your personal statement to two typed, single-spaced pages and use 12-point font and 1 inch margins (approximately 1,000 words).

Curriculum Vitae. Please refer to *Information to Include in Curriculum Vitae* in this section.

Letters of Reference. Four current and original letters of reference must be sent directly to the director of the CPFP by individuals in the scientific/ academic community who have knowledge of your scientific accomplishments, motivation, and skills. Please visit our website for instructions.

Academic Transcripts. Copies of all graduate and undergraduate transcripts (and translations, if applicable) must be uploaded directly to the CPFP website.

Other Documentation. Permanent residents of the United States must submit proof of eligibility for citizenship. The I-551 stamp in a passport is acceptable; "Employment Authorization" documents are *not* acceptable.

Individuals applying through the Ireland-Northern Ireland-NCI Cancer Consortium must submit proof of citizenship (birth certificate or passport) and proof of employment (refer to *Ireland-Northern Ireland-NCI Cancer Consortium* section).

Information to Include in Curriculum Vitae

- Applicants are encouraged to use their current curriculum vitae and to add any necessary information.
- Please include your name and a page number on each page of the curriculum vitae.
- Some of the information requested below will not be applicable to all individuals.

Date Prepared

Personal Information

- Name (First middle last)
- Gender (*optional*)
- Race (optional)
- Date of birth
- Place of birth (city, state, country)
- Home address

Citizenship

- Country of citizenship
- U.S. permanent resident number, if applicable
- Individuals applying through the Ireland-Northern Ireland-NCI Cancer Consortium: Please indicate citizenship, country where currently employed, and application tracking number (refer to website for details)

Education Please list all colleges and universities attended and any other relevant training. Include the following information for each institution:

- School, department, city and state, country
- Dates attended, academic major, degree, year degree awarded/expected

Work Experience *Please list current and past employment. Include the following information for each position:*

- •Title, employer's name, address, and telephone
- Dates of employment, hours per week
- Brief description of duties and accomplishments

Other Information Please note that the items requested below may not be relevant to all applicants.

- Board certification
- Committee memberships
- Grants awarded
- Honors and awards
- Patents

- Peer-review service
- Professional licenses
- Professional society memberships
- Scientific presentations
- Teaching

Research Interests Please provide a few key words that describe your research interests.

Bibliography Please list all publications and indicate whether they are "published," "in press," "submitted," or "in preparation." Please list full-length manuscripts and abstracts separately.

- Work/school address
- •Telephone (if more than one telephone number is provided, please indicate preferred contact)
- Fax
- E-mail (if more than one e-mail address is provided, please indicate preferred contact)

How to Submit Application Materials

If you are interested in applying to the CPFP and meet the eligibility requirements (refer to *Eligibility* section), you must submit your application online through our website.

APPLYING ONLINE

Personal Statement of Research Goals and *Curriculum Vitae.* Please access the CPFP application on our website and link to the *Application* page. You will be asked to create a personal account that only you can access through a unique user name and password. You will then be requested to provide some general information and to upload your personal statement of research goals and *curriculum vitae.* Information entered online can be saved as the application is completed and edited up until you submit the application. The application must be submitted on or before August 25.

Letters of Reference, Academic Transcripts, and Other Documentation. Four letters of reference should be uploaded to the website by the referees. Academic transcripts and other documentation materials should be uploaded to the CPFP website by the applicant. Please see website for instructions. All application materials must be submitted on or before August 25.

Direct further inquiries to:

Program Coordinator Telephone (301) 496-8640 Fax (301) 480-2669 E-mail cpfpcoordinator@mail.nih.gov http://cancer.gov/prevention/pob

Selection for these positions will be based solely on merit, with no discrimination for non-merit reasons, such as race, color, gender, national origin, age, religion, sexual orientation, or physical or mental disability. NIH provides reasonable accommodations to applicants with disabilities. If you need reasonable accommodation during any part of the application and hiring process, please notify us. The decision on granting reasonable accommodation will be handled on a case-by-case basis.

THE NIH/NCI IS AN EQUAL OPPORTUNITY EMPLOYER

Application Deadline August 25

Preceptorships



"Being a part of the CPFP has given me unique research and career development opportunities not readily available at other teaching or research institutions. I have found the CPFP to be an outstanding and well-structured program that has fully equipped me with the skills needed to successfully conduct cutting-edge research to help reduce the burden of cancer through prevention. I will continue to serve as a strong advocate for this program of excellence!"

Roycelynn Mentor-Marcel,

Ph.D., M.P.H., Fellow Alumna, SAIC/ Congressionally Directed Medical Research Programs The major activity for Cancer Prevention Fellows is mentored research, traditionally involving one or more of the following areas: laboratory-based cancer prevention research, epidemiologic research (including molecular epidemiologic studies and prevention trials), behavioral science research, clinical prevention research, preventionrelated policy research, ethics of prevention and public health research, and quantitative or qualitative methodologies in cancer prevention and control research. All fellows are expected to develop original scientific projects and to report their findings at scientific meetings and in leading journals. Preceptors who serve to guide and enrich each fellow's experience are selected from skilled investigators across all NCI divisions, participating FDA centers, or local academic institutions. To date, over one hundred NCI staff members have served as preceptors.

AN EXPANDED LISTING OF PRECEPTORS and their areas of expertise are published on our website **http://cancer.gov/prevention/pob**.

Preceptorships are selected through a matching process. During their first summer onsite at NCI, fellows spend time meeting with potential preceptors. A mutual agreement is reached between the preceptor and the fellow on the research that will be completed during the fellowship. A research proposal for the initial project is then prepared for approval by the preceptor and the CPFP scientific staff. Whereas the CPFP has all administrative responsibility for each fellow, the preceptor provides scientific supervision. Preceptors are responsible for arranging for office space, supplies, and equipment; encouraging presentations and publications at local and national meetings; and providing supplemental travel funds for researchrelated activities.

Listed below are some of the NCI divisions, programs, laboratories, branches, and offices from which Cancer Prevention Fellows may select their preceptors. A listing of preceptors from the FDA is available on the website, **http://iotftraining.nci. nih.gov/prevent.html**—NCI-FDA Joint Training in Cancer Prevention.



"The CPFP allowed me to explore diverse interests and work closely with many of the great minds in epidemiology and biostatistics, an opportunity that I would not have had in a traditional postdoctoral position."

> Pam Marcus, Ph.D., M.S., Fellow Alumna, Division of Cancer Prevention, NCI

Division of Cancer Prevention

The Division of Cancer Prevention (DCP)'s mission is to plan, direct, implement, and monitor cancer research and training that is focused on early detection, cancer risk, chemoprevention, and supportive care. DCP projects address the need to identify where a person is in the process of carcinogenesis, and to determine ways to actively intervene to stop it from becoming invasive cancer. Varied approaches are supported, from pre-clinical discovery and development of biomarkers and chemoprevention agents, including pharmaceuticals and micronutrients, to Phase III clinical testing. Programs are harmonized with other NCI divisions. NIH institutes, and federal and state agencies. Additional information can be found at http://prevention.cancer.gov.

FOUNDATIONS OF PREVENTION RESEARCH GROUPS

The **Basic Prevention Sciences Research Group**, in collaboration with trans-NCI programs dedicated to systems biology research, is developing systems approaches to cancer prevention in areas such as drug development and carcinogenesis modeling. The focus is to integrate fundamental research of NCI intramural and extramural research divisions with that of the Division of Cancer Prevention.

Acting Chief: Peter Greenwald, M.D., Dr.PH.

The **Biometry Research Group** engages in independent and cooperative research studies on cancer epidemiology, prevention, screening, and diagnosis using methods of mathematical and analytic statistics. In addition, the BRG conducts independent and collaborative studies in biostatistical and epidemiologic methodology and in mathematical modeling of processes relevant to cancer prevention activities.

Chief: Philip C. Prorok, Ph.D.

The Cancer Biomarkers Research Group

promotes and supports research to identify, develop, and validate biological markers for earlier cancer detection and risk assessment. The group integrates basic and clinical science studies along with computational, statistical, and epidemiologic approaches, for a comprehensive and understanding of biomarkers. It coordinates the Early Detection Research Network.

Chief: Sudhir Srivastava, Ph.D., M.P.H.

The **Chemopreventive Agent Development Research Group** conducts research to identify and develop agents to prevent, reverse, or delay early, preinvasive cancer. Activities include preclinical efficacy and safety testing; development of animal models; development of markers for agent mechanisms of action and effects in carcinogenesis; clinical Phase 1 safety, pharmacokinetic, and dose ranging studies; and preparation of Investigational New Drug applications to the FDA.

Acting Chief: Vernon E. Steele, Ph.D., M.P.H.



Worta McCaskill-Stevens, M.D., M.S., Preceptor, Community Oncology and Prevention Trials Research Group, Division of Cancer Prevention, NCI

The Community **Oncology and Prevention Trials Research Group** involves community physicians in clinical trials, via the Community Clinical Oncology Program, and is involved in all aspects of the design and implementation of NCI's large cancer prevention clinical trials. The group also reviews and approves all Cooperative Group cancer control and prevention clinical trials. Chief: Lori M. Minasian, M.D., F.A.C.P.

The Early Detection Research Group

identifies and ascertains the effectiveness of both the operating characteristics and the impacts on mortality, and the immediate and downstream risks of molecular and imaging cancer detection technologies and practices. It systematically assesses the value of cancer screening and early detection tests and technologies by establishing their ability to reduce cancer mortality.

Chief: Christine D. Berg, M.D.

The Nutritional Science Research Group

plans, develops, directs, and coordinates external research programs in diet and nutrition, including micronutrients as modifiers of cancer risk and tumor behavior, to help establish a comprehensive understanding of the precise role of bioactive food components. Projects focus on determining how specific genes or molecular targets are influenced by either essential or non-essential nutrients. Research is aimed at identifying people who will benefit, and people who might be placed at risk from dietary intervention strategies. *Chief:* John A. Milner, Ph.D.

ORGAN SYSTEMS RESEARCH GROUPS

The efforts of the **Breast and Gynecologic Cancer Organ System Research Group** are specifically directed at reducing the incidence, morbidity, and mortality of breast and gynecologic cancers. This is accomplished through planning, supporting, and conducting research and clinical trials that develop interventions for risk assessment, screening, early detection, and

prevention of breast and gynecologic cancers. Acting Chief: Terri L. Cornelison, M.D., Ph.D.



"The CPFP has been an incredible opportunity to acquire in-depth training in Cancer Prevention and Control. The program provides the possibility to do cutting edge research and promotes top-quality professional interactions. The CPFP definitely raises the bar for future cancer research scientists."

Roberto Flores, Ph.D., M.P.H. Current Fellow, Cancer Prevention Fellowship Program The primary mission of the **Gastrointestinal and Other Cancer Research Group** is to improve

the public's health by preventing gastrointestinal, dermatologic, endocrine, hematolymphoid, and treatment-induced malignancies. Staff collaborate with the public, academia, industry, and regulatory agencies to better identify persons at risk for cancer, and to develop novel interventions that reverse or retard carcinogenesis. The group investigates mechanisms of promising investigational agents and delivery systems that target preneoplasia.

Chief: Asad Umar, D.V.M., Ph.D.

The Lung and Upper Aerodigestive Cancer Research Group

promotes and supports research targeting the early detection and prevention of cancer arising within the lung and upper aerodigestive tract. Collaborative research is conducted with extramural and intramural NCI staff, with emphasis on Phase II clinical trials of novel chemopreventive agents in individuals at



Eva Szabo, M.D., Preceptor, Lung and Upper Aerodigestive Cancer Research Group, Division of Cancer Prevention, NCI

high risk for cancers at these sites. Optimization of trial design, identification/validation of surrogate endpoint biomarkers, and integration of new imaging modalities into chemoprevention trials are ongoing research priorities.

Chief: Eva Szabo, M.D.

The **Prostate and Urologic Cancer Research Group** promotes and supports extramural basic and applied research that focuses on the prevention of prostate and urologic cancers. The group plans, develops, implements, and monitors chemoprevention clinical trials that employ pharmacologic, biologic, genetic, immunologic, and vaccine interventions. The overall goal is to evaluate and validate new technologies that identify premalignant lesions, and to develop novel chemopreventive agents to reduce cancer incidence.

Chief: Howard Parnes, M.D.

Division of Cancer Control and Population Sciences

The Division of Cancer Control and Population Sciences (DCCPS) aims to reduce the risk, incidence, and death from cancer, as well as enhance the quality of life for cancer survivors. It conducts and supports an integrated program of the highest quality in cancer genetic, epidemiologic, behavioral, social, and surveillance research. The division's funded research aims to understand the causes and distribution of cancer in populations, to support the development and implementation of effective interventions, and to monitor and explain cancer trends in all segments of the population. Further information can be found at **http://dccps.nci.nih.gov**.

Director: Robert Croyle, Ph.D.

OFFICE OF THE DIRECTOR The mission of the Office of Cancer

Survivorship is to enhance the quality of life and to improve the length of survival of all persons



Julia Rowland, Ph.D, Preceptor, Office of Cancer Survivorship, Division of Cancer Control and Population Sciences, NCI

diagnosed with cancer, and to minimize or stabilize adverse effects experienced during cancer survivorship. The office conducts and supports research that both examines and addresses the long- and short-term physical, psychological, social, and economic effects of cancer, and its treatment among pediatric and adult survivors of cancer and their families.

Director: Julia H. Rowland, Ph.D.

The mission of the **Research Dissemination** and **Diffusion** team is to reduce cancer incidence, morbidity, and mortality through promoting adoption, reach, and impact of evidence-based interventions across the cancer control continuum from primary prevention to end of life care. It seeks to bring together resources to stimulate and support both dissemination and diffusion of cancer control research, and to close the gap between research discovery and program delivery by getting evidence-based information and interventions into use.

Deputy Director: Russell Glasgow, Ph.D.

APPLIED RESEARCH PROGRAM

The Applied Research Program plans, conducts, and supports research related to evaluating patterns and trends in cancer-related

risk factors, health behaviors, economics, outcomes, health services and patient-reported outcomes; moreover the program determines the influence of those factors at the individual, societal, and systems level on patterns and trends in measures of cancer burden, including incidence, morbidity, mortality, and survival. Associate Director: Rachel Ballard-Barbash. M.D., M.P.H.



Rachel Ballard-Barbash, M.D., M.P.H., Preceptor, Applied Research Program, Division of Cancer Control and Population Sciences, NCI

The Health Services and Economics

Branch supports, conducts, and coordinates research on the dissemination of effective cancer-related health services into community practice. The branch studies demographic, social, economic, and health system factors as they relate to providing preventive, screening, diagnostic, and treatment services for cancer. The ultimate purpose of this research is to improve cancer outcomes, reduce cancer-related health disparities, and reduce the burden of cancer to patients, their families, and society.

Chief: Martin Brown, Ph.D.

The **Outcomes Research Branch** conducts, coordinates and sponsors research to measure, evaluate, and improve patient-centered outcomes of cancer care delivery across the cancer care continuum. The branch is particularly interested in morbidity and mortality outcomes, patient symptoms and health-related quality of life (HRQOL), patient experience of and satisfaction with health care, and social and economic consequences of cancer care.

Chief: Steven Clauser, Ph.D.

The Risk Factor Monitoring and Methods

Branch is responsible for monitoring cancer-related risk factors among the general U.S. population and among selected population subgroups defined by gender, age, race, and ethnicity; developing and improving the methods of assessing such risk factors; and providing data to assist in formulating public policies addressing these factors.

Chief: Susan Krebs-Smith, Ph.D.

BEHAVIORAL RESEARCH PROGRAM

The Behavioral Research Program initiates, supports, and evaluates a comprehensive program of research ranging from basic behavioral research to research on the development, testing, and dissemination of disease prevention and health promotion interventions in areas such as tobacco use, screening, dietary behavior, sun protection, and health communication.

Associate Director: William Klein, Ph.D.

The Applied Cancer Screening Research Branch plans, implements, and maintains a comprehensive research program to develop effective strategies for promoting cancer-screening methods known to reduce cancer morbidity and mortality. The branch employs interdisciplinary teamwork and collaboration with appropriate organizations and constituencies to establish a national research agenda for cancer screening. Chief: Stephen Taplin, M.D., M.P.H.

The Basic and Biobehavioral Research Branch promotes, sponsors, and supports biobehavioral and basic (social, cultural, behavioral) research and training. This research attempts to identify the mechanisms, principles, and theoretical underpinnings of cancer-related behavior and behavior change across all ages, racial and ethnic groups, socioeconomic strata, and cancer diagnoses. The branch seeks to understand behavior and behavior change in its social, cultural, and economic context, including how basic and biobehavioral research relates to cancer health disparities.

Chief: Paige Green McDonald, Ph.D., M.P.H.

Preceptorships



Bradford Hesse, Ph.D., Preceptor, Health Communication and Informatics Research Branch, Division of Cancer Control and Population Sciences, NCI

The Health Communication and Informatics Research

Branch plans, develops, and coordinates important new research on risk communication, health communications and informatics relevant to cancer prevention and control. The branch coordinates research using both traditional means of communication, as well as new digital interactive media and other new media to reach at-risk populations. It

acquires and disseminates health communication knowledge to stimulate sophisticated training of health communication scholars, research professionals, and public health practitioners.

Chief: Bradford Hesse, Ph.D.

The Tobacco Control on and Research Branch was

established to provide a focal point for tobacco control research within the division. The branch plans, develops, implements, and maintains a broad spectrum of basic and applied research in the behavioral, social, and population sciences on the prevention and cessation of tobacco use among both youth and adults. The mission is to reduce cancer incidence and mortality caused by tobacco use through a comprehensive research program.

Chief: Cathy Backinger, Ph.D., M.P.H.



"I realized that to do what I wanted in tobacco control research, I needed additional training, some protected time for research, and opportunities to meet people in my area of interest. I was provided with all three of these—and then some—at the NCI CPFP."

Ted Marcy, M.D., M.P.H., Fellow Alumnus, University of Vermont



Linda Nebeling, Ph.D., M.P.H., R.D., Preceptor, Health Promotion Research Branch, Division of Cancer Control and Population Sciences, NCI

The Health Promotion Research

Branch supports research on behavioral prevention, which includes diet, physical activity, energy balance, virus exposure, and sun exposure. It provides leadership in these areas by focusing research efforts on effective clinical, environmental, and community-based intervention strategies. It synthesizes and disseminates findings,

recommendations, and priorities of successful strategies in behavioral change prevention interventions to target organizations and individuals. The branch solicits input from and communicates regularly with the extramural community to refine methodology and evaluate effectiveness.

Chief: Linda Nebeling, Ph.D., M.P.H., R.D.

EPIDEMIOLOGY AND GENETICS RESEARCH PROGRAM

The Epidemiology and Genetics Research Program manages a comprehensive program of grant-supported, population-based research to increase our understanding of cancer etiology and prevention. Its mission is to increase our understanding of the determinants of cancer and cancer-related outcomes in human populations by using an epidemiologic approach. The branch seeks to facilitate movement of discoveries in the basic sciences and improved technologies to studies in human populations, discoveries about the determinants of cancer and cancer-related health outcomes after cancer into clinical and public health practice. The program seeks to aid the movement of scientific knowledge from clinical and public health to human studies and basic biology.

Acting Associate Director: Deborah Winn, Ph.D. The **Clinical and Translational Epidemiology**

Branch plans, develops, and coordinates a comprehensive program of epidemiologic research in human populations related to clinical factors that influence development of cancer among persons with underlying diseases and conditions and progression, recurrence, new primary cancers, and mortality from cancer among cancer survivors. This program includes research to study differences in cancer susceptibility and risk in individuals and populations, and the multiple environmental and genetic factors that jointly contribute to development of cancer among persons with underlying diseases and conditions and progression, recurrence, new primary cancers, and mortality from cancer among cancer survivors with the ultimate goal of elucidating cancer development and progression among people with these health conditions.

Chief: Andrew N. Freedman, Ph.D.

The Host Susceptibility Factors Branch

plans, develops, and coordinates a comprehensive program of epidemiologic research in the etiology of cancer in human populations related to host (i.e., personal) susceptibility factors. These include genetic, epigenetic, immunological and hormonal biological pathways, and social, cultural, and race/ ethnicity elements factors.

Chief: Elizabeth Gillanders, Ph.D.

The Methods and Technologies

Branch plans, directs, and coordinates research related to epidemiologic methods to address research issues, and to translate technological approaches developed in the context of other research endeavors to the development of biomarkers of risk susceptibility and cancer epidemiologic settings.

Chief: Mukesh Verma, Ph.D.

The Modifiable Risk Factors Branch

plans, develops, and coordinates epidemiologic research in the etiology of cancer in human populations relating to factors that may be modifiable, such as nutrition, physical activity and energy balance, infectious diseases, and physical and chemical agents. *Chief:* Britt Reid, D.D.S., Ph.D.



"The Cancer Prevention Fellowship Program was the natural next step in my career path. It provided support for the necessary public health training to complement my doctoral work and the opportunity to pursue my own research interests."

Annette Kaufman, Ph.D., M.P.H., Current Fellow, Cancer Prevention Fellowship Program

SURVEILLANCE RESEARCH PROGRAM

The role of the Surveillance Research Program is to monitor emerging trends in our national cancer burden, track the impact of cancer on the U.S. population, and provide information that will enable researchers to generate hypotheses and address questions about observed changes over time. Research within the program is developing innovative methods for the analysis and understanding of cancer statistics and outcomes of cancer control research.

Associate Director: Brenda Edwards, Ph.D.

The Data Analysis and Interpretation Branch

leads the analysis and interpretation of patterns and trends in cancer surveillance data. We develop methods for statistical reports on national and regional trends in population-based cancer rates, identifying implications of coding changes and quality issues and developing tools for analysis of complex databases that may include demographic, behavioral, medical, and social/environmental data. *Chief*: Kathy Cronin, Ph.D.

The **Data Modeling Branch** supports research on statistical and mathematical models to understand the impact of cancer control interventions and economic, health care delivery, and utilization factors on the cancer burden. We use mathematical modeling to develop, evaluate and improve estimates of cancer progress measures, such as survival, prevalence, and quality of life and develop software for integration of modeling into data systems.

Chief: Angela Mariotto, Ph.D.

The Statistical Methodology and Applications Branch

provides optimal statistical methods for the collection, analysis, and presentation of complex biostatistical measures related to the cancer control, surveillance, and epidemiology programs of the National Cancer Institute. These methods may be pertinent to risk and behavioral factors, spatial and temporal analysis, survey methods, or genetic factors.

Chief: Eric J. (Rocky) Feuer, Ph.D.



"The Cancer Prevention Fellowship Program has given me the training, skills, opportunities, and connections to launch my career as an independent scholar, and more importantly as a productive researcher."

David Portnoy, Ph.D., M.P.H. Current Fellow, Cancer Prevention Fellowship Program

The Surveillance

Systems Branch provides essential information for tracking the nation's progress against cancer. We manage the Surveillance, Epidemiology, and End Results (SEER) Program, an authoritative source of population-based cancer incidence and survival data in the United States. We provide national and international leadership to the cancer surveillance community in the areas of population-based data collection, geospatial data systems, and quality improvement.

Division of Cancer Epidemiology and Genetics

The Division of Cancer Epidemiology and Genetics (DCEG) is the primary focus within the NCI for population-based research to discover the genetic and environmental determinants of cancer and new approaches to cancer prevention. Intramural and collaborative interdisciplinary studies are conducted on the distribution, causes, and natural history of cancer, and the means for its prevention. Further information can be found at http://dceg.cancer.gov.

EPIDEMIOLOGY AND BIOSTATISTICS PROGRAM

The Epidemiology and Biostatistics Program conducts independent and collaborative epidemiologic and biostatistical investigations to identify the distribution, characteristics, and causes of cancer in human populations.

The **Biostatistics Branch** is responsible for (1) providing expert consultation and active collaboration on study design and analysis of epidemiologic studies; (2) developing statistical, computational, and other methods needed for conduct and analysis of epidemiologic studies; and (3) leading selected epidemiologic studies.

Chief: Nilanjan Chatterjee, Ph.D.

The Hormonal and Reproductive Epidemiology Branch

conducts research aimed at identifying groups at high risk of cancer, clarifying the natural history of various cancers, understanding interactive effects of genetic and environmental factors on cancer risk, and elucidating biologic mechanisms of carcinogenesis. To define risk factors for hormonally related tumors, we assess reproduction and other factors, measure endogenous hormones, identify hormonal



"The fellowship has given me the tremendous opportunity to apply my basic science immunology background to cancer epidemiology. The research experience and network I've developed through the MPH education and NCI training will undoubtedly further my career in the cancer prevention field."

Wenny Lin, Ph.D., M.P.H. Current Fellow, Cancer Prevention Fellowship Program

correlates of risk factors for these diseases, and investigate conditions associated with marked hormonal perturbations. A major area of research also focuses on defining the role of the human papillomaviruses in the etiology of genital tumors. *Chief:* Louise A. Brinton, Ph.D.

The **Infections and Immunoepidemiology Branch** believes that health will be improved greatly through the discovery and understanding of infections associated with human cancers. The mission of the branch is to conduct research that will clarify substantially whether and how infections relate to human cancers and associated conditions, to discover new viruses, and to train and facilitate others in such research. *Chief:* Allan Hildesheim, Ph.D.

To clarify the role of nutrition in the etiology of human cancer, the Nutritional Epidemiology **Branch** carries out a wide range of interdisciplinary investigations, including observational epidemiologic studies, experimental epidemiologic studies (clinical trials), and metabolic studies. The branch integrates biospecimen collection in its studies to explore the physiologic, cellular, and molecular processes linking nutrition and cancer. It emphasizes the 'exposure' side of nutrition research, with studies of dietary patterns, intake biomarkers, food composition databases, and dietary measurement error. 'Nutrition' is conceived broadly, comprising dietary factors, body size and body composition, and physical activity and energy balance.

Chief: Rashmi Sinha, Ph.D.

The Occupational and Environmental

Epidemiology Branch conducts studies to identify causes of cancer, with a focus on occupational and environmental exposures. Interdisciplinary casecontrol, cohort, and transitional studies include quantitative exposure assessment and collection of biologic samples to identify and characterize risk factors and mechanisms of action.

Chief: Debra T. Silverman, Sc.D.

The mission of the **Radiation Epidemiology Branch** is to identify, quantify, and understand the risk of cancer in populations exposed to radiation, alone or in combination with other agents. Because models of the carcinogenic effects of radiation exposure are relevant to other exposures, the studies of radiogenic tumors contribute to overall understanding of the biologic basis of carcinogenesis.

Chief: Martha Linet, M.D., M.P.H.

HUMAN GENETICS PROGRAM

The **Clinical Genetics Branch** integrates clinical observations into an interdisciplinary approach involving clinical, genetic, epidemiologic, statistical, and laboratory methods to define the role of susceptibility genes in cancer etiology; translates molecular genetic advances into evidence-based management strategies (including screening and chemoprevention) for persons at increased genetic risk of cancer; identifies and characterizes phenotypic manifestations of genetic and familial cancer syndromes; counsels individuals at high risk of cancer; investigates genetic polymorphisms as determinants of treatmentrelated second cancers; and pursues astute clinical observations of unusual cancer occurrences that may provide new clues to cancer etiology.

Chief: Mark H. Greene, M.D.

The Genetic Epidemiology Branch

designs and conducts interdisciplinary clinical, epidemiologic, genetic, and laboratory studies of persons, families, and populations at high risk of cancer. These investigations identify genes and exposures conferring cancer predisposition and explore the combined effects of predisposition, and specific exposures. As part of this effort, the branch maintains a familial cancer registry and biospecimen repositories. Families participating in specific studies receive counseling about their risk of cancer and about screening or intervention options.

Chief: Margaret A. Tucker, M.D.

The Laboratory of Translational Genomics

develops new approaches to the study of the genetic basis of cancer and its outcomes. The lab seeks to understand the genetic basis of SNP markers validated in large scale, genomewide association studies (GWAS). Specifically, the laboratory uses integrated approaches to identify and validate common SNPs and ancestral haplotypes, which could be used to dissect the genetic basis of disease susceptibility. *Chief:* Stephen Chanock, M.D.

Center for Cancer Research

The Center for Cancer Research (CCR) is home to more than 250 scientists and clinicians working in intramural research at NCI. CCR is organized into over 50 branches and laboratories, each one grouping scientists with complementary interests. CCR's investigators are basic, clinical, and translational scientists who work together to advance our knowledge of cancer and AIDS and to develop new therapies against these diseases. CCR investigators collaborate with scientists at the more than 20 other Institutes and Centers of the National Institutes of Health (NIH), as well as with extramural scientists in academia and industry.

http://ccr.nci.nih.gov



Stefan Ambs, Ph.D., Preceptor, Laboratory of Human Carcinogenesis, The Breast and Prostate Unit, Center for Cancer Research, NCI The **Breast and Prostate Unit** of the Laboratory of Human Carcinogenesis investigates the relative contribution of genetic and environmental factors to human breast and prostate cancer causation.

Head: Stefan Ambs, Ph.D.

The **Cell and Cancer Biology Branch** conducts investigations into the molecular mechanisms

of cellular transformation, tumorigenesis, and metastasis, with the goal of applying this knowledge towards prevention of and intervention in human carcinogenesis.

Chief: Kathleen Kelly, Ph.D.

The Experimental Immunology Branch

carries out basic research in immunology. It consists of 10 independent research laboratories, a flow cytometry facility, and a digital microscopy facility, all focused on multiple aspects of basic immunology. *Chief:* Alfred Singer, M.D.

The Laboratory of Cancer Biology and Genetics conducts an integrated research program designed to elucidate the cellular and tissue changes associated with specific stages of carcinogenesis; to define the molecular mechanisms involved; and to develop rational approaches for cancer prevention. Studies are performed *in vivo* in experimental animals, *in vitro* in cell and organ culture, and on tissues and cells obtained from human volunteers and cancer patients.

Chiefs: Stuart H. Yuspa, M.D. and Glenn Merlino, Ph.D.

The Laboratory of Cancer Prevention

investigates the molecular basis of cellular processes that, when perturbed, can lead to cancer induction and progression. Discovery and characterization of molecular targets for cancer prevention and intervention is a common area of interest throughout the lab. *Chief:* Nancy H.

Colburn, Ph.D.



Nancy Colburn, Ph.D., Preceptor, Laboratory of Cancer Prevention, Center for Cancer Research, NCI

The research in the Laboratory of Cellular **Oncology** focuses on normal and abnormal growth regulation, protein trafficking, cell signaling, gene regulation by retroviruses, and papillomaviruses. Current investigations include studies of myeloid leukemia, p53 regulation, E-cadherin, and regulation of Arf family proteins. The papillomavirus research is concerned with mechanisms of virus assembly, cell transformation by the viral oncogenes and their protein products, the epidemiology and natural history of papillomavirus infection, and the development of a vaccine against genital papillomavirus infection and cervical cancer.

Chief: Douglas R. Lowy, M.D.

The Laboratory of Comparative

Carcinogenesis is a chemical carcinogenesis laboratory devoted to investigating mechanisms of action of carcinogenic agents. Its principal research emphases are currently on cell signaling during the neoplastic change, perinatal carcinogenesis, lung tumorigenesis and tumor promotion, developmental renal biology, carcinogenic metals, and nitric oxide and the pharmacologic potential of nitric oxide-generating compounds.

Chief: Larry K. Keefer, Ph.D.

The Laboratory of Experimental **Immunology** conducts studies on biological response modification and the application of these studies to cancer therapy. Basic science approaches utilize cellular, biochemical, and molecular techniques to study the regulation of cell-mediated immune effector mechanisms, cytokine gene expression and function, biochemistry of receptor-mediated signaling in leukocytes, and the biology of growth factors.

Chief: Giorgio Trinchieri, Ph.D.

The Laboratory of **Human Carcinogenesis**

conducts investigations to assess: (1) mechanisms of carcinogenesis, including the cellular functions of tumor suppressor genes and oncogenes; (2) experimental approaches in biological systems for the extrapolation of carcinogenesis data and mechanisms from experimental



Curtis Harris. M.D.. Preceptor, Laboratory of Human Carcinogenesis, Center for Cancer Research, NCI

animals to humans; and (3) molecular epidemiology of human cancer risk. Chief: Curtis C. Harris, M.D.

The Laboratory of Metabolism conducts research in the areas of chemical carcinogenesis, mammalian development and gene control, and cell cycle control. It is composed of six sections focused on the study of: carcinogen metabolism, endocrinology, cell cycle regulation, high-mobility chromatin-associated proteins, gene regulation, and cytochrome P450s.

Chief: Frank Gonzalez, Ph.D.

The Laboratory of Molecular

Immunoregulation performs fundamental research studies of the role of cytokines in inflammation, immunity, hematopoiesis, and cancer. Scientists engage in the discovery and development of new cytokines by studying the regulation of cytokine production at the gene level, the action of cytokines on target cells, and cytokine regulation of pathophysiological processes.

Chief: Joost J. Oppenheim, M.D.

The Laboratory of Protein Dynamics

and Signaling investigates mechanisms that regulate the fundamental cellular processes of differentiation, proliferation, survival, apoptosis, and tumorigenesis. Research is predicated on the concept that understanding normal cellular function and human disease requires a solid mechanistic comprehension of crucial signaling pathways, their points of intersection and divergence, as well as differential regulation by dynamic alterations in critical regulatory proteins.

Chief: Allan M. Weissman, M.D.

The Laboratory of Tumor Immunology and Biology conducts research in the areas of tumor immunology, mechanisms of tumor cell-immune cell interactions, and immune mechanisms. The laboratory functions as an integrated translational research program with the goal of designing and developing new immunotherapies and immunologic strategies for cancer treatment and prevention.

Chief: Jeffrey Schlom, Ph.D.



"The Cancer Prevention Fellowship Program opens up a world of opportunities. The solid structure and support that the program provides ensures that Fellows gain the knowledge, experience and skills necessary to conduct quality research in our respective areas of interest. This makes the Program quite unique and invaluable."

Nadine Bewry, Ph.D., M.P.H., Current Fellow, Cancer Prevention Fellowship Program The Mammary Biology and Tumorigenesis

Laboratory conducts research on development, differentiation, and tumorigenesis in the mammary gland. The goal of the laboratory is to utilize multidisciplinary approaches encompassing areas, such as endocrinology, molecular genetics, stem cell biology, growth factors, oncogenes, cell signaling, and animal model systems, to understand the pathobiology of breast cancer.

Acting Chief: David S. Salomon, Ph.D.

The **Medical Oncology Branch** functions: (1) To develop novel therapeutic research strategies for the treatment of cancer and to test those strategies by conducting clinical research in medical oncology; (2) To provide clinical care to adult cancer patients enrolled in research protocols; and (3) To train physician-scientists in a laboratory-to-clinic translational research setting to promote the development of their expertise in medical oncology research, and to support their certification by the American Board of Internal Medicine.

Chief: Guiseppe Giaccone, M.D.

The **Molecular Targets Development Program** provides leadership for converting CCR's basic science advances into drug leads, bioprobes, and reagents for molecular target evaluation. The program exploits chemical and biodiversity repositories, including the NCI Natural Products Repository, for molecularly targeted lead discovery.

Chief: James B. McMahon, Ph.D.

Members of the **Mouse Cancer Genetics Program** make use of molecular mouse genetics as a primary tool to better understand the fundamental processes underlying mammalian development or human disease.

Director: Terry A. Van Dyke, Ph.D.

The **Signal Transduction Section** in the Medical Oncology Branch is a multidisciplinary group that studies signaling pathways that



"The Cancer Prevention Fellowship Program fosters an environment that is supportive both scientifically and personally. The CPFP provides Fellows with the flexibility to work with scientists from across all of the NCI Divisions and Branches."

Joanne Watters, Ph.D., M.P.H. Fellow Alumna, Division of Cancer Control and Population Sciences, NCI

contribute to lung tumorigenesis. Current efforts are focused on the role of the Akt/mTOR pathway. Ongoing areas of investigation include the development of novel Akt inhibitors, the development and utilization of genetically engineered and carcinogen-driven mouse models of lung cancer, and the implementation of clinical protocols with pathway inhibitors for patients at high risk to develop lung cancer. Head: Philip Dennis, M.D.

The primary focus

of the **Transgenic Oncogenesis Group** of the Laboratory of Cancer Biology and Genetics is to determine molecular mechanisms involved in prostate and mammary tumorigenesis using transgenic mouse approaches. A primary goal is to define what molecular events are involved in tumor progression, and how this information may be used for targeting novel therapies to prevent cancer development or inhibit tumor progression.

Chief: Jeffrey Green, M.D.

Office of the Director, NCI

The **Office of Cancer Complementary and Alternative Medicine** coordinates and enhances the activities of the NCI in the arena of complementary and alternative medicine (CAM), to increase the amount of high-quality cancer research in this field. The office promotes and supports research within CAM disciplines and modalities as they relate to the prevention, diagnosis, and treatment of cancer, cancer-related symptoms, and side effects of conventional treatment. Further information can be found at **http://cancer.gov/cam**.

Director: Jeffrey D. White, M.D.

NCI planning and priority setting through the Office of Science Planning and Assessment (OSPA) involves the integration of input from individuals at NCI on our advisory boards in other government agencies and in research, professional, and advocacy organizations. OSPA staff provide guidance and coordination for these efforts, working alongside NCI leaders and staff to articulate priorities, develop strategies and plans, and communicate them to stakeholders and the public. Further information can be found at http://planning.cancer.gov/index.shtml. *Acting Director:* Margaret Ames, Ph.D.

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Post-Fellowship Employment

Alumni of the CPFP are currently located at the following institutions:

Universities:

Duke University Medical Center Economics Charite-Medical School Berlin Emory University Howard University College of Medicine Indiana University School of Medicine Johns Hopkins School of Medicine Michigan State University Morehouse School of Medicine New York University Northwestern University Feinberg School of Medicine The Ohio State University Oregon State University Linus Pauling Institute The Pennsylvania State University Queens College, City University of New York Queen's University Belfast University of Arkansas for Medical Sciences University of Colorado at Denver University of Delaware University of Florida University of Louisville School of Medicine University of Maryland at Baltimore University of Maryland School of Medicine University of Massachusetts The University of Medicine and Dentistry of New Jersev University of Memphis School of Public Health University of Minnesota University of Pennsylvania University of South Carolina

University of South Florida University of Southern California University of Tennessee Health Science Center University of Texas at Austin The University of Texas at Brownsville and Texas Southmost College The University of Texas Health Science Center at San Antonio The University of Texas M. D. Anderson Cancer Center The University of Texas Southwestern Medical Center, Department of Clinical Sciences University of Waterloo University of Wisconsin-Madison University of Vermont College of Medicine Wake Forest University School of Medicine Washington University School of Medicine Yale University School of Medicine **Cancer Centers:** Fox Chase Cancer Center, Cheltenham, PA

Fox Chase Cancer Center, Cheltenham, PA
H. Lee Moffitt Cancer Center and Research Institute, Tampa, FL
Howard University Cancer Center, Washington, DC
James Graham Brown Cancer Center, Louisville, KY
Puerto Rico Cancer Center, San Juan, PR
The University of Texas M. D. Anderson Cancer Center, Houston, TX
Washington Cancer Institute, Washington, DC

Medical Practices:

Advanced Dermatology and Skin Surgery, Spokane, WA Ameripath, Tulsa, OK Annapolis Medical Specialists, Annapolis, MD Christus Spohn Hospital, Corpus Christi, TX Dell Children's Medical Center Trauma Services, TX Hershey Medical Center, Hershey, PA Hospice of Lancaster County, Lancaster, PA Oncology Associates, Omaha, NE The Permanante Medical Group, Vallejo, CA Twomey Industrial Medicine and Wellness, Sumter, SC Dept. Veterans Affairs Medical Center, OK Washington Hospital Center, DC Washington Medical Center, DC

National Institutes of Health, Bethesda, MD:

National Heart, Lung and Blood Institute National Institute on Alcohol Abuse and Alcoholism National Institute of Child Health and Human Development National Institute of Dental and Craniofacial Research National Institute on Nursing Research NCI, Center for Cancer Research NCI, Center to Reduce Cancer Health Disparities NCI, Division of Cancer Control and Population Sciences NCI, Division of Cancer Epidemiology and Genetics NCI, Division of Cancer Prevention NCI, Division of Cancer Treatment and Diagnosis NCI, Division of Extramural Affairs NCI. National Cancer Institute Center for Bioinformatics NCI, Office of Deputy Director for **Extramural Science** NCI, Office of Science Planning and Assessment NIH, Office of Behavioral and Social Sciences Research NIH, National Center for Research Resources NIH Warren G. Magnuson Clinical Center Office of Medical Application of Research

Government agencies outside of NIH:

CDC, National Center for Health Statistics, Hyattsville, MD CDC, Office on Smoking and Health, Atlanta, GA Centers for Medicare and Medicaid Services. Boston, MA FDA, Center for Drug Evaluation and Research, Silver Spring, MD FDA, Center for Food Safety and Applied Nutrition, College Park, MD FDA, Division of Drug Marketing, Advertising and Communication, Silver Spring, MD FDA, National Center for Toxicological Research, Jefferson, AR **Research firms or private organizations:** Advanced Dermatology and Skin Surgery AmeriPath Tulsa **BioInformatics** Children's Hospital of Austin Cincinnati Children's Hospital Medical Center Coempower, LLC The Council of State Governments CSR, Incorporated Exponent Genomic Nanosystems, Inc. Gradient Corporation Hospice of Lancaster County Kaiser Permanente Medical Center The Lancet The MayaTech Corporation **MSD-Management System Designers** Nova Research Company Pacific Hematology Oncology Associates **Pinney Associates RAND** Corporation Robert Wood Johnson Foundation SAIC WebMD/ViPS Westat

Life Outside the NCI

The CPFP Office is located at the NCI facilities in Rockville, Maryland, near the Nation's Capitol. With the convenient Metro subway reaching throughout the Washington, D.C. area, transportation is within easy reach.



Near the NIH campus, downtown Bethesda supports a diverse selection of more than 180 restaurants offering cuisine from all over the world.

Fifteen to 20 minutes away, Washington, D.C. offers magnificent monuments and world-class museums. The National Gallery of Art and the museums of the Smithsonian Institution are only

the most obvious; smaller museums such as the Phillips Collection and the Corcoran Gallery of Art should not



be overlooked. Other sightseeing opportunities such as the National Zoo, the Kennedy Center for the Performing Arts, the folk festivals, the cherry blossoms that bloom every spring, the numerous parades, and the many other worthwhile sightseeing adventures that are nearby. Washington has professional football, baseball, basketball, and hockey teams. Washington's best known outdoor recreational area, Rock Creek Park, offers a spacious and beautiful landscape that is much appreciated and heavily used by bicyclists, runners, and picnickers.

Washingtonians often make the trip to Baltimore to enjoy the Inner Harbor restaurants, aquarium, and shopping. Annapolis and the Chesapeake Bay are also nearby.



Within a short distance are the Atlantic coast beaches, the Shenandoah and Catoctin mountains, as well as the nearby ski

resorts in Maryland and Pennsylvania. Also close by are the historic homes of George Washington and Thomas Jefferson.

Our weather covers all seasons from the leaves turning colors in the fall to the warm sun-kissed days of summer we have it all!





Course Participants, NCI Summer Curriculum in Cancer Prevention, 2010



February 2011

