

# K-12 Newsletter

Published by the Minority Faculty Development Program of Harvard Medical School — Spring 2005

## *Project Success: Opening the Door to Biomedical Careers—A Vision of Success*

By Angela Counts, Former Project Coordinator, K-12 Programs

By any measure, *Project Success: Opening the Door to Biomedical Careers* lives up to its name.

Since its founding in 1993 by Joan Y. Reede, MD, MPH, MS, Dean for Diversity and Community Partnership at Harvard Medical School (HMS), *Project Success* has had as its mission to encourage the biomedical research interests of deserving underrepresented minority and disadvantaged students living in the greater Boston area. *Project Success* students receive one-on-one mentoring by HMS scientists and physicians, while working full-time in laboratories at HMS and its affiliated institutions. During the eight-week, paid internship program, students work on research projects designed by their mentors. The program culminates in a day of formal research presentations.

To date, the program has served 120 students, 99 percent of whom have gone on to college; several have also gone on to medical, dental, and graduate schools. This spring, **Karlene Boswell** will become the first *Project Success* student to graduate from medical school; she first participated in *Project Success* in 1994, at which time she was advised by **Frederic Wondisford, MD**, then of Beth Israel Hospital. Her other advisors were: **David Wong, DMD, DMSc**, Harvard School of Dental Medicine, in 1997; **Joan W. Miller, MD**, Massachusetts Eye and Ear Infirmary, in 1998; **Jessica Henderson Daniel, PhD**, Children's Hospital Boston, in 2000.

Some students like **Glenn Hall** (*Project Success* alumnus 1999, 2000, 2001, 2002),

develop an enduring relationship with their mentors, as he did with his mentor, **Robert Sackstein, MD, PhD**, Associate Professor of Dermatology, HMS. A recent graduate of Tufts University, Glenn is now in his first year at Meharry Medical College in Nashville, Tennessee.

During the summer of 2004, 20 *Project Success* students worked in research laboratories at HMS, Beth Israel Deaconess Medical Center, Brigham and Women's Hospital, Children's Hospital Boston, Joslin Diabetes Center, and Massachusetts General Hospital, in areas ranging from environmental epidemiology and pathogenesis of bacterial infection to pathology of neurodegenerative diseases and genetics.

If by chance you had stopped by the Courtyard Café on the HMS Quadrangle for lunch one afternoon this past summer, you would have seen a group of young people eating, laughing and talking. If you had paused a moment longer, you might have glimpsed future doctors, dentists, scientists, educators, and leaders who, for a brief moment in time, were enjoying a carefree afternoon with friends.

That is the secret of *Project Success*: create the right environment for talented young people from underrepresented minority and disadvantaged backgrounds to learn about biomedical research and career paths in research and the health sciences. Provide them with caring mentors who are eminent physicians and scientists in their fields. Supplement the students' research experiences with educational seminars, and you will be offering them opportunities to learn, thrive, grow, and achieve their dreams of success.



PHOTO  
2004 Project Success  
Students



## *A Summer to Remember*

By Francesca Morency

I remember looking at the application and being terrified that it was eight pages long, and telling my parents "I don't want to spend my entire summer vacation writing a 12-page research paper!" Nevertheless, I filled it out, wrote an essay, asked for recommendations, and submitted everything a week before it was due. I was in the tenth grade when I was accepted into *Project Success: Opening the Door to Biomedical Science Careers*.



*Project Success* in one of the many programs run by Harvard Medical School. Upon acceptance, I was assigned to the lab of **Jordan A. Kreidberg MD, PhD** at an annex of Children's Hospital Boston. I must admit it was an intense summer, working full time four days a week at the lab and walking 15 minutes to Harvard Medical School on Fridays for 6 hours of seminars. Between learning protocols, performing laboratory experiments, reading several chapters of *Molecular Biology of the Cell*, all while attempting to write my very first full-length research paper, there was only enough time to complete the required summer reading.

It was only during my junior year that I realized how much I had grown that previous summer. Eager to perfect my laboratory skills, improve my research and writing skills, and simply to keep a neater notebook, I reapplied for a second summer. The post doctoral students, fellows, and my principal investigator, Dr. Kreidberg had become a second family to me; therefore I requested to continue in the same laboratory that following summer.

To my delight many of the students from the previous summer had also reapplied and it was as if we were continuing from where we had left off. There were many changes during my second summer in *Project Success* that kept things interesting. Having learned many protocols and mastered several procedures, I was given greater responsibilities and worked independently on most of the experiments. Keeping a notebook became fun and rewarding, and the reading was more interesting.

The summer was going very well and only got better when I was selected to host a tour of my laboratory for **Mayor Thomas Menino** and the President of Harvard University, **Lawrence Summers**. This was in preparation for the Democratic National Convention during a week in which *innovation* in Boston was showcased. During the tour and the barbecue that followed, I had the honor of meeting the President of Children's Hospital and the Dean of Harvard Medical School as well. The event was shown on the local news and was reported in several newspapers and magazines including the *Boston Globe* and the *Harvard Gazette*. A few weeks after the tour, I was contacted by the public affairs office at Children's Hospital for an interview about my experience in *Project Success* and about the program itself. Within a few weeks, I found my interview and photograph on the front page of *Children's News* magazine.

It all feels like a dream when I think back on the whirlwind of the summer of 2004. I not only had the honor of working with some of the finest researchers in the world, but also had the privilege of meeting many important and accomplished people. I have only the utmost respect and gratitude towards those that I met and am eternally grateful for the experience. Thanks to *Project Success* and Children's Hospital Boston I have grown immensely both academically and socially.

By Alexandra Belcher

*Project Success* has been an important part of my life since the summer after my sophomore year of high school. As a participant, I met some of my closest friends, had wonderful lab experiences, and spent the summer working hands-on with people who are, every day, attempting to better the world. There are essentially no words to describe the impact my experience at *Project Success* has had. The wonderful people at the Office for Diversity and Community Partnership, the mentors I have had, and my fellow participants together made *Project Success* a rewarding experience. As a college student, I recall the skills I learned over these past few summers in my daily experiences, illustrating the practicality that the work done at *Project Success* has on my world beyond science. Simply put, *Project Success* goes beyond being a summer well-spent. It is rather, is an experience I will carry with me for a long time to come.

[Editor's Note: Alexandra is currently a freshman at Harvard College. In 2004 she worked in the laboratory of **Cesario Bianchi, MD, PhD**, Beth Israel Deaconess Medical Center.]



## *A Summer to Remember—Continued*



By Bernice Fedestin

I must admit that my initial impression of *Project Success* left me quite apprehensive. Could anyone really blame me? When one hears the name "Harvard" brought up in conversation, they know that the best of the best are involved, and I was no exception to that belief. When my biology teacher suggested that I apply to the program, I was skeptical as to whether or not I would be admitted. However, my desire to learn more about biomedical science overcame my trepidation. I produced a successful application and was granted acceptance to the *Project Success* program.

As I entered the program I was introduced to a new world of learning that filled me with awe. What impressed me the most about the program was the independence that each student was given to complete his or her research project. Not only did this freedom provide me with the essential skills I would need to

become an active researcher, but it allowed me to learn more effectively in the lab by working on my own and learning from my mistakes.

Although I usually worked independently in my lab work, my experience outside of the lab was filled with unyielding support from the *Project Success* staff. The environment with my *Project Success* advisors has always been one that is both nurturing and vigorous. From weekly seminars to one-on-one conferences at the main office, they have always attempted to provide the participants with guidance and various opportunities to broaden our base of knowledge. Indeed, my entire experience at *Project Success* has been one filled with great intellectual challenges. Moreover, it is an experience that has greatly influenced my decision to pursue a career in the biomedical sciences.

[Editor's Note: Bernice was the recipient of the 2004 John R. Moore Scholarship, given through the Biomedical Science Careers Program (BSCP). She conducted her research in the laboratory of Lisa Cavicini, PhD, Beth Israel Deaconess Medical Center.]

By Steven Watkins

This past summer, I worked under the advisement of Dr. Tovia Libermann in the New England Bone and Joint Institute. I worked primarily with Dr. Luiz Zerbini, a scientist in the lab, who eased me into the lab setting and helped me stay on track to complete the required paper and presentation.

My project was to clone the promoter sequence of the gene Mda-7. Mda-7 is a gene found in cancer cells, more specifically found in prostate cancer cells. When this gene is overexpressed, the gene can inhibit tumor growth and can kill the cancer cells. I used a lot of molecular biology techniques to clone the gene sequence, and I learned a lot about the molecular biological profession.

I am very grateful for the program, for in all likelihood, I wouldn't have met the same incredible people anywhere else. All the participants, speakers, and *Project Success* staff were all a tremendous help in aiding me in my search for a possible career. Thanks, *Project Success*, for everything you've done for me and all the participants this past summer.

[Editor's Note: Steven will graduate from St. Sebastian's School this spring and will attend George Washington University in the fall.]



## *Mentoring for Science*

By Pinar Kilicci-Kret, Project Coordinator, K-12 Programs

The first big snow storm of the year, that closed Boston Public Schools for nearly a week, came at the same time the *Mentoring for Science* Program was about to start. This snowfall delayed our start for a week, but this did not discourage any of our eager students.

*Mentoring for Science* is an after-school program designed to enhance students' critical thinking skills, provide them with laboratory exposure, and increase their knowledge about careers in science; all done through mentored relationships as well as hands-on science and biomedical research-based activities.

Now in to the middle of our 8-week program, we have more than a dozen students in each session (8<sup>th</sup> Grade and 9<sup>th</sup> Grade). Mentees have paired up with Harvard Medical School graduates or medical student mentors and are busily working in their labs every week. We are working towards a curriculum for *Mentoring for Science* 10<sup>th</sup> Grade Program for the 2005-2006 Academic Calendar.

## Explorations Highlights

By Pinar Kilicci-Kret, Project Coordinator, K-12 Programs



PHOTOS  
Explorations students

*Explorations* was a great success again for the fourth consecutive year! On October 26, 2004 approximately 200 Boston public middle school students were hosted for *Explorations* Program at the Harvard Medical School's New Research Building sponsored by the K-12 Programs within the Minority Faculty Development Program at the Office for Diversity and Community Partnership.

*Explorations* is a full day program. The morning is filled with presentations, including a medical/graduate student panel discussion about educational paths and the afternoon program continues with a two-hour visit to the laboratories of Harvard Medical School and affiliated institutions across the Longwood Medical Area, partnering individual students with researchers and laboratories.

According to this year's evaluations completed by the laboratory advisors, 70% of the students were rated excellent for their "eagerness to learn," 19% were rated above average, and 9% rated average. Ninety-nine percent of the laboratory advisors thought this program was very beneficial to students because it is a hands-on experience, offers great exposure to biomedical sciences, and is an eye-opener to the students with regard to the vast world of research. One hundred percent of the laboratory advisors said that they would participate again next year and that it was "great to have the students" in their labs.

Students rated the keynote speech delivered by **Jessica Henderson Daniel, PhD**, as excellent. What they learned from her talk and interactive session was that they can accomplish anything in life and be successful if they follow their dreams and goals, work hard, and be resilient. Students also commented on how much they learned in the labs: how we sleep and how it affects our daily lives, how a frog can be cloned from a needle, how drugs are made and how they work in a human body, how liquid nitrogen can freeze anything that has water in it, and how DNA has different colors, but they said the most important lesson was that science can be a lot of fun!

## Nery M. Porras Selected to Receive Hope Scholarship

By Judith Sanford-Harris, PhD, Director of K-12 Programs



**Nery M. Porras**, a senior at **Brookline High School**, will be awarded a 2005-2006 Hope Scholarship sponsored by the *Biomedical Science Careers Program* (BSCP) in the amount of \$7500, to be used for educational purposes over two academic years. The scholarship will be presented at the eighth annual BSCP fundraising dinner, *Evening of Hope*, on Thursday April 14, 2005 at The Boston Park Plaza Hotel.

The Hope Scholarships are awarded to New England minority students enrolled in high school, college, medical, graduate or professional school who have demonstrated an interest in biomedical, biotechnology or science-related field and have had direct involvement in the *Biomedical Science Careers Program* (BSCP). The students selected are highly motivated, have recognized potential, and seek opportunities for educational advancement.

The two event honorees will be **Frank L. Douglas, MD, PhD**, Executive-in-Residence at the Sloan School of Management, Massachusetts Institute of Technology and Former Chief Scientific Officer at Aventis and **Lise D. Kaye**, Executive Director, *Biomedical Science Careers Program*. **Edward J. Benz, Jr., MD**, President and Chief Executive Officer of Dana-Farber Cancer Institute and **Frank C. Fishman, MD**, President of Novartis Institutes for BioMedical Research will co-chair the event.

In addition to Nery's participation in BSCP, he is a *Project Success* alumnus (2004, in the lab of **Sven-Erik Bursell, PhD**, Beetham Eye Institute, Joslin Diabetes Center) and one of ten students selected to give an oral presentation at the 2005 Southern New England Junior Science and Humanities Symposium, where he placed a very respectable sixth in the region. He will attend Harvard College in the fall.

# Striving for Excellence

By Jabbar R. Bennett, PhD, Research and Science Specialist, K-12 Programs

Although 2003-2004 was the inaugural year for the Harvard Medical School (HMS) *Minority K-12 Initiative for Teachers and Students* (MKITS) Program, several new initiatives were launched and succeeded with flying colors! The HMS MKITS Program is a 5-year effort funded by the National Heart Lung and Blood Institute that supports existing and newly formed DCP after-school and summer programs for Boston Public Schools (BPS) teachers and students. The *AP Biology Scholars Program* was successfully piloted last spring in collaboration with **Brighton High School**, the **Economics and Business Academy of the Dorchester Education Complex**, and **English High School**, and their *AP Biology* students and teachers, the latter being **Kenny Salim**, **Diana Christian**, and **Paul Muller**, respectively. Diana Christian also went on to earn the 2004 Amgen Award for Science Teaching Excellence last May and received an unrestricted monetary gift of \$10,000. The Amgen awards honor public or private school science teachers, grades K-12, who demonstrate outstanding science teaching and have a great impact on the lives of their students. This year we are working with Diana Christian, Paul Muller, and Brighton High School's new science teacher **Stephanie McMillan**. The *AP Biology Scholars Program* has been expanded to a full academic year in 2004-2005 and the remaining 3 years of the grant.

Since its inception in 1999, the *Program for Investigation in Science and Math* (PRISM) has commenced during the summer for 3 weeks, engaging young people in the medical case-based method of learning while enhancing their science and math proficiency. The goal of *PRISM* is to provide case-based, hands-on science activities, and site visit that reinforce science learning and help ease the students' transition from middle to high school. As part of their study of medical cases, students visit labs at HMS and affiliated hospitals to learn about various body systems and diseases. The culmination of the program is an awards celebration with a play put on by the students, in which they act out their cases. *PRISM* is designed to support the academic transition of rising ninth graders as they approach the rigors of high school science and math courses. To address the critical need of supplying the biomedical research and health professions pipeline with underrepresented (URM) minority



males, we expanded *PRISM* to 2 sessions last summer, with the second being all-male. Historically, minority males have not tended to apply for academic summer programs focusing on science and math, but we developed a successful recruitment mechanism that yielded over 75% male applicants to *PRISM*. This session involved 11 URM and disadvantaged students from 7 BPS middle schools, while 13 students from 9 middle schools participated in the coed session. The overall impact that this novel all-male session had on our program participants was very profound and led to our students feeling enlightened, challenged, and empowered.

**Elizabeth Mtembu, PhD**, a 7<sup>th</sup> grade science teacher from the **Martin Luther King Middle School**, participated in the 6-week *Teacher Research Internship Program* (TRIP), where she conducted research in the laboratory of Dr. Frederick Alt in the Center for Blood Research Institute for Biomedical Research. Dr. Mtembu was engaged in an intense cell biology and karyotyping research project. By the completion of her summer internship she had developed lesson plans related to her summer research that she took back to her classroom at the King Middle School and shared with her students in their unit entitled, "The Cell". This year we plan to recruit at least seven teachers to participate in the program which will be shortened to 5 weeks in order to accommodate other obligations they have to BPS regarding science teacher certification courses being offered at Northeastern University through UMass Boston's \$12.5 Million Massachusetts Science Partnership Grant.

The *Mentoring for Science-Grade 8 and 9 Programs* run during the spring semester of each year and each involve 12-15 BPS middle school students who are individually paired with HMS graduate and medical students. Traditionally this program has taken place after-school for 8 weeks and offers hands-on cell biology, microbiology and molecular biology-based laboratory experiences. This year these programs have been expanded to 10 weeks in order to accommodate additional sessions that will allow students to participate in shadowing experiences with HMS researchers and physicians.

No time has been wasted in offering our students the most beneficial exposures to and experiences in biomedical research and the health professions. There are so many great things in store for these young people. Their hearts are passionate, their drive is persistent, and their futures are growing brighter by the day!

PHOTOS  
PRISM students



## Someone to Watch

By Judith Sanford-Harris, PhD, Director of K-12 Programs

**John Zeqi Luo**, currently a senior at **Bishop Hendricken High School** in Warwick, RI, has done it again. Last March, John won first place at the Southern New England Junior Science and Humanities Symposium (JSHS), sponsored by the Office for Diversity and Community Partnership. Although his oral presentation, "Down Regulating UCP-2 by American Ginseng Prevents IL-1 $\beta$  Induced  $\beta$ -Cell Apoptosis and Promotes the Viability of Insulin-Productive  $\beta$ -Cells" was not among the top five at the national symposium, he was successful at the 2004 Intel International Science and Engineering Fair (ISEF) in Portland, Oregon. There, John was awarded 3<sup>rd</sup> Prize for Outstanding Accomplishment in the Physiological Sciences from the American Physiological Society, a Special Recognition Award from the Endocrine Society, a Fourth Place Award for Medicine and Health Sciences, and Special Recognition for "Alternative Medicine: A Relief for Diabetes, Phase 3" from the Intel ISEF. Then, at the 2005 regional symposium held at Harvard Medical School on April 1 & 2, John won again! As the result of a question asked by one of last year's regional judges, John decided to expand his research. He submitted his abstract and paper and was invited to present again. John won first place at this year's regional symposium for his presentation, "American Ginseng Improving Pancreatic Beta Cell Function May Result from the Alteration of Metabolism, Cell Proliferation, Differentiation, and Apoptosis Gene Expression: A Microarray Approach." Truly someone to watch!



## Regional JSHS Winners

By Judith Sanford-Harris, PhD, Director of K-12 Programs

In addition to the stellar performance of **John Zeqi Luo** of **Bishop Hendricken High School** (see article above), the following students placed second through fifth at the regional level and have been invited to attend the national JSHS symposium in San Diego, CA in late April. Second place went to **Eric Wilson** of **North Attleboro High School** for his presentation, "Phycoremediation: Alternative Organic and Inorganic Aqueous Pollution Removal;" third place was awarded to **Anneke Schwob**, **Boston Latin School**, for her presentation entitled, "Regulation of Telomere Lengths During Stem Cell Differentiation;" fourth place went to **Paul Magyar**, **Classical High School**, Providence, RI, for his presentation, "Characterizing Martian Soil Analogues with Optical Microscopy;" and in fifth place, **Janina Kanin**, **Falmouth Academy**, for her presentation, "Microbial Biodiversity in Extreme Environments." John Luo and Eric Wilson will be among the more than 100 regional first- and second-place winners who will give their oral presentations at the national symposium.



PHOTO: The five oral winners L-R: Eric Wilson (2<sup>nd</sup> place), Anneke Schwob (3<sup>rd</sup> place), John Zeqi Luo (1<sup>st</sup> place), Janina Kanin (5<sup>th</sup> place), Paul Magyar (4<sup>th</sup> place)

## Important Dates

### Upcoming Events

#### Reflection in Action: Building Healthy Communities™: June 13, 2005

A day honoring and reflecting on everyday heroes from the past and present who have demonstrated a commitment to building healthy communities and inspiring students to generate a vision for positive change. Students who are Boston residents in grades 7, 8 and 9 are invited to submit contest entries – written, visual, or performance – about urban health issues and health disparities which describe how their individual and collective actions can help build healthy communities. Winners will receive cash prizes and all entrants are invited to attend the day of celebration. Teachers are encouraged to bring groups of students to the June 13 event. Performance contest winners will perform and all student attendees will participate in a "Health Bowl," followed by lunch, a community health fair, raffle drawings for prizes, and a sidewalk chalk drawing event. Please visit our web site at [www.mfdp.med.harvard.edu/reflectioninaction](http://www.mfdp.med.harvard.edu/reflectioninaction) for contest and celebration deadlines, details and forms, or contact Judith Sanford-Harris, PhD at 617-432-4634 or at [judith\\_sanford-harris@hms.harvard.edu](mailto:judith_sanford-harris@hms.harvard.edu).

#### Project Success: Opening the Door to Biomedical Careers: June 27-August 19, 2005

*Project Success: Opening the Door to Biomedical Careers*, a paid eight-week summer internship program for high school students particularly minority and disadvantaged students attending Boston and Cambridge schools, interested in developing careers in the biomedical sciences (medicine, research, public health, biotechnology, etc.). Applications due March 21, 2005. For more information contact Pinar Kilicci-Kret at (617) 432-4697 or [pinar\\_kilicci-kret@hms.harvard.edu](mailto:pinar_kilicci-kret@hms.harvard.edu).

#### Program for Research and Investigation in Science and Math (PRISM)

Session I - July 05-July 22 (girls & boys)

Session II - July 25-August 12 (boys only)

*PRISM* provides enjoyable summer academics and activities for rising Boston Public Schools 9<sup>th</sup> grade students. The program is designed to ease the transition from middle to high school and to help students build a solid foundation in their math and science skills. For more information contact Pinar Kilicci-Kret at (617) 432-4697 or [pinar\\_kilicci-kret@hms.harvard.edu](mailto:pinar_kilicci-kret@hms.harvard.edu)

#### The Teacher Research Internship Program (TRIP): July 05 – July 29, 2005

The Teacher Research Internship Program (TRIP) provides the opportunity for middle and high school science teachers from Boston and Cambridge to participate in a 5-week, intensive, hands-on mentored summer research experience with Harvard Medical School faculty where they participate as active members of a research team while focusing on disorders that affect the heart, lungs and blood. For more information contact Jabbar Bennett, PhD at 617-432-1557 or [jabbar\\_bennett@hms.harvard.edu](mailto:jabbar_bennett@hms.harvard.edu)

#### Explorations: October 25, 2005

Explorations is a one-day program in which Harvard faculty and research associates host approximately 200 Boston Public Schools middle school students for a day of presentations, panel discussions about educational paths and partnering of individual students with researchers. For more information contact Pinar Kilicci-Kret at (617) 432-4697 or [pinar\\_kilicci-kret@hms.harvard.edu](mailto:pinar_kilicci-kret@hms.harvard.edu)

#### Biomedical Science Careers Student Conference: Saturday, March 11, 2006

The eighth biennial Biomedical Science Careers Student Conference for high school seniors and juniors, sponsored by the Biomedical Science Careers Program, will take place on March 11, 2006 at The Boston Park Plaza Hotel. The objective of the conference is to encourage students to pursue and complete advanced studies. The participants will be matched with advisors/role models from academia, hospitals/medical centers, the federal government and the biotechnology industry. There is no registration fee, but pre-registration is required. Applications will be available in October 2005. To obtain an application or for more information, please contact Lise D. Kaye at [lise\\_kaye@hms.harvard.edu](mailto:lise_kaye@hms.harvard.edu) or (617) 432-0552.

## Summer Program Announcements



In addition to the programs offered by the Office for Diversity and Community Partnership for Boston and Cambridge residents, there are many summer program opportunities in and around Boston.

An excellent source for summer information is the **New England Resource Directory**, accessible on-line through the Biomedical Science Careers Program (BSCP) at [www.bscsp.org](http://www.bscsp.org).

Another Web site that provides a very extensive list of summer programs — [www.petersons.com/summerop](http://www.petersons.com/summerop) — includes some in the Boston area.

For information about the **Native American High School Program@Harvard Medical School**, contact the Office for Diversity and Community Partnership's K-12 Office. Students must be affiliated with selected tribes.

The **Northeast Fisheries Science Center** ([www.nefsc.noaa.gov/sstudent](http://www.nefsc.noaa.gov/sstudent)) and **Woods Hole Oceanographic Institute** ([www.whoi.edu/home/index\\_edu\\_programs.html](http://www.whoi.edu/home/index_edu_programs.html)) offer summer research programs for college students.

Please check with the staff of the various programs for application deadline dates and criteria.

### K-12 Newsletter—Spring 2005 Acknowledgments

Writers—Alexandra Belcher, Jabbar R. Bennett, PhD, Angela Counts, MFS, Bernice Fedestin, Pinar Kilicci Kret, Francesca Morency, Steven Watkins

Editors—Jabbar R. Bennett, PhD, Pinar Kilicci-Kret, Judith Sanford-Harris, PhD

Layout—Amy Avitabile

Photography—Amy Avitabile, Jennifer Badot, Steve Gilbert

### K-12 Programs

Harvard Medical School  
Office for Diversity and Community Partnership  
Minority Faculty Development Program  
164 Longwood Avenue, 2<sup>nd</sup> Floor  
Boston, MA 02115-5818



Tel: 617-432-4634

Fax: 617-432-3834

E-mail: [dcp\\_mfdp@hms.harvard.edu](mailto:dcp_mfdp@hms.harvard.edu)

Web site: [www.mfdp.med.harvard.edu](http://www.mfdp.med.harvard.edu)