David Golan: Catalyzing Graduate Education and Beyond
By Jenny Sims (G5) and Suzanne Nizza (G2)

In November 2008, BCMP Professor David Golan, M.D., Ph.D., was named Dean for Graduate Education at HMS. Golan’s laboratory uses biophysical methods and cell-imaging to study membrane-targeted proteins in blood cells and the vascular endothelium. His appointment and the creation of the new Dean’s position mark another step in the restructuring and unification of the educational administration, according to the recommendations produced by Dean Jeffrey Flier’s Strategic Planning Process which has been pressing forward since Fall 2007.

“Previously at HMS, there had been a dean for medical education focusing on the education of medical students,” described Golan. “Now, there is a set of education deans who are responsible collectively for oversight and development and implementation of activities and curriculum for all students, graduate students as well as medical students.”

The previous administrative position responsible for graduate education was Prof. Tom Roberts, who was the Faculty Dean for Graduate Education. Despite the similarity in title, this position pertained entirely to the DMS Ph.D. programs, while Golan’s new Deanship stands at the head of a new administrative construct called the “Program in Graduate Education.” This requires that his focus be broader than just DMS: “Dean Flier has asked me to look not only at DMS but also, in partnership with other schools, to think about the education of all students at HMS.”

Labby Holidays:
A Seasonal Recap on Where and for How Long BBS Students Celebrate
By Jenny Sims (G5)

The results are in! After undertaking a detailed study of BBSers’ holiday habits far and wide, we present the data to satisfy your curiosity. Survey data was obtained from 65 respondents (71% female and 29% male) whose department affiliations had similar distributions to those of the actual BBS student population.

“He knows when you are sleeping, he knows when you’re awake…”

According to our respondents, BBS students took a week and a half of vacation, on average, though the range was 0 days to 5 weeks. Eighty-seven percent (87%) of the respondents were off for at least a week. Since this was a bi-monthly publication, we did not have a 10 year anniversary edition.}

“Labby” continued on page 4
with the Dean for GSAS, at the interfaculty graduate programs that span the medical school and FAS. The Program in Graduate Education therefore includes Biophysics, Chemical Biology, and Systems Biology as well as the four DMS programs.”

He plans to focus on three facets of support that have been iteratively refined and optimized for medical students, but require significant development for the graduate programs: curriculum development, course logistics, and student support.

“For example,” he said, regarding curriculum development, “there has been general acknowledgement among the Ph.D. program heads that we, as a community, are relatively weak in a quantitative science curriculum. And this is an area in which, if the programs work together, they might be able to develop something that is more robust, more integrative, and perhaps more user-friendly than what any of them could do individually.”

Course logistical support, he says, would come in the form of web support, room scheduling, and “the whole array of things that go along with putting on a course...communications between faculty, forming small groups, posting discussion readings, and other infrastructure that ought to be supported.

“And in terms of student support, which is a mission that David Cardozo has taken on already in the year that he’s been appointed as associate dean, I think we want to continue and strengthen those activities. From all reports, the students are responding very well to David’s level of engagement.”

Wanted: Graduate Curriculum Committee

Dean Golan is also responsible for creating de novo a missing element recommended by the Strategic Advisory Group on Education (SAGE) — a Graduate Curriculum Committee. Such a construct has been considered for many years, if unofficially, to streamline the coverage of courses and provide a handy mechanism for student feedback, while potentially being an executive body for departmental and program decisions which have historically been slow and disjointed.

Golan’s vision for the role of the Graduate Curriculum Committee, he says, would be to facilitate some curriculum development ideas, but “not to be telling the programs what they should be doing in terms of curriculum, because they all have their different philosophies and approaches, and I’m starting from the premise that all seven of these programs are outstanding.”

He hopes for student involvement from top to bottom, from start to finish. “We’re still figuring out exactly how to construct these committees. I have a lot of experience in medical education and some in graduate education, and on the medical education side, I can say without exception that every committee I’ve been on that’s had student input has benefitted from having the student input.”

Student feedback at this stage, he says, can affect the composition of the committee and the tangible role it will take.

Broader Nets and Baby Steps

The mission to expand program development beyond DMS does not stop with Ph.D. students. “There are many other trainees who are not medical students who are pursuing educational activities in the graduate programs at HMS, and their oversight, reporting structures, and responsibilities for developing programs have been scattered among various entities at HMS. Dean Flier saw this as an opportunity to bring those activities and programs together.”

A related recommendation of the SAGE report is the foundation of an “HMS Academy Center for Teaching, Learning and As-

Harvard Catalyst: Found in Translation

Prior to his Dean for Graduate Education appointment, Golan had been serving as the Director of the Research Education, Training, and Career Development Program within the Harvard Catalyst. Designated a Clinical and Translational Science Center and funded through both Harvard and the NIH, the Harvard Catalyst is the largest of its kind in the country. As Director of the Research Education Program, Golan has been working on ways to support trainees at the many different stages of their careers. Thus, the Research Education Program is an administrative construct that includes a number of different clinical and translational degree programs, such as Leder Human Biology and Translational Medicine Program, several Master’s-level programs in clinical investigation, as well as non-degree training programs at HMS and the Harvard teaching hospitals.

“Within the Catalyst Research Education Program, we have a very broad mission and mandate,” says Golan, “which is to provide the optimal education and mentoring and career development opportunities for students and trainees at all levels, from Harvard college undergraduates to medical students, graduate students, Master’s students, postdoctoral fellows, and even junior faculty. In the clinical and translational realm, the beginning years of junior faculty training are in some ways a more vulnerable period than for basic scientists. Traditionally, in the basic science departments at HMS, faculty are hired as assistant professors after a number of years in postdoctoral training. Many of them either have grants or are highly competitive for their own independent investigator supported research, such as R01s from the NIH. In contrast, in the clinical and translational realm, many junior faculty are hired as instructors, which have 1-year appointments instead of 3-year appointments. Many instructors are not yet ready to write an R01 grant application, and some of them have significant clinical responsibilities that take away valuable time from their ability to do clinical or translational research. That’s a vulnerable period, so the support of junior faculty is critically important to the success of the Harvard Catalyst mission.”

For more information on Harvard Catalyst: http://catalyst.harvard.edu
Ahh...snow. Especially if you were new to it, the late December flurries were greeted with anticipation and excitement. Snow, real snow! Beautiful snow covering everything in a pristine white blanket! But wait — then you remembered that cell culture waits for no man, and on Saturday morning you had to brave public transportation for two hours just to finish up that last experiment before the break. Ugh, snow, the bane of your very existence! Your distaste for snow will only deepen as the snow itself turns into brown sludge. Occasionally, you will even see yellow snow, and things spelled in yellow in the snow, which will prompt you to avoid Allston for the rest of the winter. How does one survive winter in Boston, much less survive it in style? Is it possible to dress for a bar, without losing a limb to frostbite en route? I’m here to save the day with a few tips for braving the lab and the snow in style.

1. I’ve spotted many girls out there wearing Wellington boots during the rainy fall season. Girls, hold on to those boots because I am about to change your life! I’d like to introduce you to the Hunter ‘Fleece Welly’ sock, a thick fleece liner which turns your rain boots into snow boots for just $30. These might just be the most fabulous winter fashion innovation in recent memory. Now your feet will stay toasty warm while your pants cuffs stay bone dry, even in drifts of snow a foot deep. The socks are available in a wide range of colors, so there is sure to be one which will coordinate with your boots; you might even pick up two to change things up a bit. Use the liners as super-cozy knee socks with your less-rubbery lab shoes to stay toasty the rest of the day.

2. Have you ever noticed you are totally unable to navigate your iPod while wearing your winter gloves? What to do? Well, I’ve seen two great options out there. The first is Tavo Ipod Click wheel gloves, which have special electrically conductive pads on the fingertips that allow you to use the iPod click wheel or your computer’s touch pad through your gloves. Your second option is to purchase gloves where a part of the pad moves to expose your fingers. I favor the fingerless glove/mitten hybrid variety, which is widely available on the internet. The first is Tavo Ipod Click wheel gloves, which have special electrically conductive pads on the fingertips that allow you to use the iPod click wheel or your computer’s touch pad through your gloves. Your second option is to purchase gloves where a part of the pad moves to expose your fingers. I favor the fingerless glove/mitten hybrid variety, which is widely available on the internet.

3. For the Girls out there who like to head out for a big night on the town when they escape from lab, I highly recommend knee high leather boots. For the coordinated, and those willing to spend their precious booze money on taxis, I say...go for heels! For everyone else, you can look just as hot in flats. This is probably only news to first years from warmer climes — everyone else already owns at least two pairs of going-out boots. NOTE: You don’t just wear these boots with skirts, you can wear them with pants, too, for added warmth! But, whatever you do, don’t wear them with your pants tucked in — that is so last year!

4. Boys, might I suggest that you head down to Filene’s basement and take advantage of their extensive collection of clearance sale winter coats? You see, a ski jacket (though functional) is probably not the style statement you want to make if you are out to impress...well, anyone. You lose an extra ten points for every old ski pass still attached to said ski jacket. (That stopped being cool in high school.)

5. Flannel lined jeans are not just a myth — they’re available from J.Crew and L.L Bean. I personally don’t know a single person who owns them, and I’ve lived here for five years now. Maybe they wear them in Maine? When I first moved here from warmer climes I wore flannel pajama pants or leggings under my jeans to walk to school, but I removed them as soon as I got to school so that I didn’t die from heat stroke.

6. Finally, a universal skin care tip to all members of both sexes: Moisturize! You don’t have to use anything expensive; you just have to be religious about it. I’m partial to Neutrogena body oil or Eucerin from CVS, king of skin from Lush or the oils and creams from Sabon on Newbury Street. To maximize the effectiveness of moisturizer, you should apply it as soon as you finish showering. Quickly pat your skin dry, but not completely dry, it should still be damp, apply your moisturizing cream or oil and then give yourself another quick pat down. Your towels will need more frequent washing, but you will not suffer from gross chapped knees and elbows this winter! For those latex-glove hands, which get particularly funky this time of year, a similar regimen applies: when you take off your gloves for a bit, wash that residue off with warm water, then apply a repairing moisturizer. It helps your hands make the most of their break from the bench, and if you use a product that smells nice, you’ll suddenly find that your desk becomes a more popular place to hang out!

Check out more fashion tips from ‘Sophia Charming’ at her blog: http://www.chicandcharming.com.

Behold the ‘Fleece Welly’ Effect!

Nordstrom.com
Did you know what your P.I. was doing over winter break?

<table>
<thead>
<tr>
<th>Category</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>I don't know if my P.I. takes breaks</td>
<td>35%</td>
</tr>
<tr>
<td>My P.I. doesn't take breaks</td>
<td>13%</td>
</tr>
<tr>
<td>YES</td>
<td>39%</td>
</tr>
<tr>
<td>NO</td>
<td>58%</td>
</tr>
</tbody>
</table>

Small Grants for Thanksgiving and Winter Break Travel

The majority of BBS students claim their decisions about mode of travel to take over the holidays were unaffected by gas prices or the financial carnage of Fall 2008. The facts:

- 76% Gas prices didn’t affect Thanksgiving travel
- 68% Personal financial issues didn’t affect Thanksgiving travel
- 67% Gas prices didn’t affect winter break travel
- 63% Personal financial issues didn’t affect winter break travel

Thanksgiving travel cost an average of $102, ranging from $800 down to a few people who got away with using free travel miles.

More of us traveled during winter break (83-85%) than during the Thanksgiving weekend (61-66%), and for both occasions, about 30% of respondents were on the receiving end of a little gift ($$) from their happy hosts to offset their travel expenses. For winter break travel, 21% of travelers who received such a helping hand ($$), said that the gift ($$) influenced their travel choices.

Deck the Department

Sixty-three percent (63%) of respondents who knew their department had a holiday party planned on attending. 18% were undecided, 8% did not plan to go, and 21% of total respondents didn’t know if there was such a thing.

Sixty percent (60%) of respondents say their lab has a holiday celebration, such as a gift exchange or themed party, while 25% responded that their lab does not, and 14% had yet to find out at the time of the survey. Respondents indicated that these events tended to not be strongly religiously themed.

Opinion Poll: Do BBS students think seasonal celebrations are better off without religion?

- “Definitely not. Religion is a big part of life and excluding it just makes people not comfortable. The correct way of promoting integrating is being inclusive of everyone’s traditional background, not erasing it.”
- “Yes — it is just too personal. I think it’s better to keep office parties more general so as to not make anyone feel excluded in a celebration that does not match up with his/her religious beliefs or lack thereof.”
- “I say Merry Christmas to Christians, and Happy Holidays or something to others. Why do we have to be so p.c. and not step on each other’s toes? Some people actually have religious beliefs and IT’S OK!”
- “I think that religious themes should be excluded so as not to make people uncomfortable. That said, it is difficult to define what is too religious. For instance, putting up tinsel, lights or fake snow isn’t really religious even though it is all associated with Christmas.”
- “I think religion should not be the focus of the party, but rather an excuse to party.”
Melinda Faulkner and Erica Gerace (above left and right, respectively) prove that the Retreat is still cool, even when you’ve been to a few already.

(at left, from left to right) Luis Gonzalez, Sonny Nguyen, Luciann Cuenca rock out at the BBS retreat after party.

(above, left to right) Luhan Yang, Joyce Yang, Melissa Lin, and Xuyu Cai enjoy the beach at the Cell Bio Retreat.

**Retreat Outtakes**

Special thanks to Caitlin Reavey (G3), Erica Gerace (G6), and Joyce Yang (G1) for photos!

(above) The G2s (now G3s) prepare for PQE’s with their award-winning cover of “Livin’ on a Prayer.”

(above) Sejin Ahn (G5) rocks the poster session!

Melinda Faulkner and Erica Gerace (above left and right, respectively) prove that the Retreat is still cool, even when you’ve been to a few already.

(at left, from left to right) Luis Gonzalez, Sonny Nguyen, Luciann Cuenca rock out at the BBS retreat after party.
The Useless Facts from the BBS Bulletin Announcements

By Jimmy Hu (G4)

Over the years, the BBS Bulletin Announcement section (BBA) has not only served as an integral part of the BBS Bulletin where you can make announcements (obviously), but has also, indirectly, become a chronicle of student publications, important happenings, and student marital status. Being scientists and all, we are interested in what sort of information we are able to extrapolate from such a useful, yet unexplored, resource. In the next few issues, we will look hard and carefully into these data that have been collected between the long forgotten year of 2004 and the soon-to-be-forgotten 2008. We present to you, for the first time in the history of the BBS Bulletin: The Useless Facts from BBA.

In the first installment of the series, we will look at the relationship between authorship and grad school years. We first VACS (Visually Assisted Counting and Scoring) sorted student publications within each G year into three categories: first author, second author, and third (or lower) author papers. We then plotted this as a bar graph and compared the data set between each graduate (G) year.

From our study, it becomes apparent that G5 is THE year to shine (although “recent grad” is THE year to be, say, done), having achieved the most first authorship papers among all countable years. This correlates well with the fact that most students graduate in their 6th or 7th year (personal communication with no one).

On the other hand, G1s are clearly not reaching their full publishing potential, showing only 1.63% first author papers. Moreover, G3 is probably the most embarrassing (by that, I mean frustrating) year in grad school. When compared to the G2s, G3s score lower in second and third author paper counts and are only barely in front for the first author papers. This dire situation improves dramatically in G4 and finally culminates in G5. G5 is definitely the year to shine! Like a bulb.

In order to understand this anomaly, the author did some field research and found that G1s are actively engaged in rotations and classes, instead of publishing (data not shown). Nonetheless, rotations can be rewarding sometimes and do grant the G1 munchkins some respectable percentage of second and third author papers, which are reflected in the G2 year.

To conclude, BBA proves to be a useful resource for providing perhaps not-so-useless information to the BBS community. It gives hopes to the G1s. It propels the G2s. It presents reality to the G3s. It prepares the G4s. It hails the G5s. And it reminds all the G5’s that there is a “recent grad” at the end.

Recent BBS Student Publications:


Percent of Papers in BBA (by Author Rank) versus G year

![Graph showing Percent of Papers in BBA (by Author Rank) versus G year]

<table>
<thead>
<tr>
<th>G year</th>
<th>% of First Author Papers</th>
<th>% of Second Author Papers</th>
<th>% of Third (or Lower) Author Papers</th>
</tr>
</thead>
<tbody>
<tr>
<td>G1</td>
<td>30</td>
<td>25</td>
<td>10</td>
</tr>
<tr>
<td>G2</td>
<td>20</td>
<td>15</td>
<td>5</td>
</tr>
<tr>
<td>G3</td>
<td>15</td>
<td>10</td>
<td>5</td>
</tr>
<tr>
<td>G4</td>
<td>10</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>G5</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>G6</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>G7+</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>recent grad</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
</tbody>
</table>

shiqliccsvrديgeylpfaemrgmnlmdtsaeqlirelsqkkqalllferlyenakaelslapoudgbrgipantrhhtosvpzignetqtahtelristsndtiiravlifegiftgesvkhpsihnlsscisepvitvppk
‘Golan’ continued from page 2

assessment,” whose services would resemble those of the Bok Center for Teaching and Learning on the Cambridge campus, but would be tailored to the needs of the entire breadth of basic science and clinical/translational trainees housed at HMS. The “Academy Center” is on the verge of recruiting its future leaders, though the speed with which it can fully materialize may be affected by the state of the economy.

Although similar, smaller endeavors have been realized within the medical education system, the expansion to graduate students, postdocs, and faculty within the basic science regime and translational research fellows and junior faculty in the hospitals is a step that Golan is excited to see HMS take.

As Dean for Graduate Education, Golan will play a significant role (with Dean for Education Thomas Michel and Dean for Medical Education Jules Dienstag) in activities from brainstorming to enacting the tangible functions of the “Academy Center.” He hopes that the Academy Center might play the much needed role of helping to “educate the educators” in all fields to a degree that has been more common in medical education than in basic science.

So what then lies within reach for Golan’s first year as Dean? “In the Ph.D. realm, it would be setting up this new Program in Graduate Education, examining what we should be doing, and developing a short-term and long-term strategy for doing it. I don’t want to presuppose what the one-year goals would be, because I would like the group to come up with those together. As soon as we constitute the group, I plan to ask them: where do you want to be in a year, and how can we get there? I think that will probably include the suggestion to form a Graduate Curriculum Committee and to figure out what the initial activities of the Curriculum Committee will be, but the formation of the Program in Graduate Education should come first. We need first to set up the top-level program and examine what shared goals people have.”

Another short-term goal, he says, would be to build on the Curriculum Fellows program, which currently supports six Fellows, both program- and department-specific. Golan hopes “to determine how the Curriculum Fellows can best come together and function even more coherently and integratively.”

HMS Strategic Planning Process:
hms.harvard.edu/public/strategy/index.html
Strategic Advisory Group on Education:
hms.harvard.edu/public/strategy/sage.pdf

‘Rinn’ continued from page 8

Vertical Panoramics: A Big Tree or just a big tree?
An image compiled from eight incremental shots.

John Rinn

John Rinn

Rinn was also a MacDougal Fellow (Yale’s equivalent of a Dudley Fellow). Highlights of his service were organizing a career fair and managing a series of specialized writing workshops led by experts in various fields (such as Tom Wolfe for Literature). He also set up panels on non-academic career opportunities, such as scientific writing and consulting. “To be sure I wanted to be an academic, I wanted to rule out everything else.” As a representative of Yale’s Graduate Student Assembly for a few years, he inspired undergrads to consider grad school.

Grad School Science and Beyond:

As a grad student, Rinn’s interests shifted from crystallography to microarrays; he built the first tiling array of a chromosome in Michael Snyder’s lab. Later, he worked on nailing the function of HOTAIR, the first IncRNA to regulate the genome in trans. He developed new techniques to look at conservation of IncRNA sequences and recently reported on 4,000 new hits that might be acting like HOTAIR. He is working on knocking them down to figure out their functions.

Why become BBS Faculty?

“For the same reason I had such a fun time at Yale. BBS is almost identical to what I had.” He also has a great passion for teaching. As part of BBS Pathology, Rinn would like to develop a genomics course that covers all the critical pros and cons of essential techniques as well as pointing out who you need to get in touch with locally to get started.

Advice for Grad Students:

“Graduate school is really the time to do this kind of thing.” It’s “the only time you have to explore all the opportunities and explore your horizons.”

Avocation: Panoramic Photography

“Photography is like science. If you can get information together in an elegant way, it really helps with putting together figures.” Rinn developed a method for manually overlapping photos to generate vertical panoramic shots before he had software good enough to do it. His impressive shots from around the world can be found here: http://homepage.mac.com/jrinn/Panoramics.html.

‘Rinn’ continued from page 8
Faculty Profile: John Rinn, Assistant Professor of Pathology at HMS and BIDMC

By Cherie Ramirez (G3)

Research Interests:
The role of large non-coding RNAs (lncRNAs) in “establishing the distinct epigenetic states of adult and embryonic cells and their misregulation in cancer”

Education:
• B.S. (1999) University of Minnesota
• Ph.D. in Molecular Biophysics & Biochemistry (2004) Yale University

First Steps Toward Science:
“In high school, I was a really bad student. My high school GPA was a 1.9. All I cared deeply about was snowboarding, but my parents told me that if I didn’t go to college, I would no longer have health-care to support the numerous inevitable injuries from snowboarding.”

A major turning point came when he read The Fountainhead following a major sports-related injury in his first year. Rinn was deeply inspired by a character (Howard Roark) in the novel who cared enough about his ideals that he refused to compromise them, even if it meant bringing about the destruction of a misbegotten creation.

After that summer, Rinn began running regularly and decided to take chemistry, biology, and physics even though he had already declared himself a psychology and business major. Running and chemistry became his passions. The more he ran, the better he did in his classes and experiments. Rinn went all-conference his senior year and dreamed of becoming an RNA crystallographer.

Grad School Days:
Heavily involved in Yale’s version of the BBS Bulletin, he contributed an article to each issue. As a coach for the cross-country and track teams for two years, he mentored his athletes in the biochemical principles of running and advised them about appropriate nutrients for particular workouts. One of his trainees went on to compete in the Olympic

‘Rinn’ continued on page 7