



SCHOOL OF MEDICINE & BIOMEDICAL SCIENCES

BMS 496: Biomedical Sciences Internship

Student: _____

Internship Site: _____

Site Supervisor: _____

Semester/Year: _____ **Credit Hours:** _____

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The Biomedical Sciences Major

The major in biomedical sciences is designed to provide students with a solid foundation of coursework in the natural sciences--biology, chemistry, physics and math. This foundation provides the infrastructure for required courses in the biomedical sciences: anatomy, physiology, microbiology, and biochemistry, as well as for biomedical sciences electives that confer a unique character on the major. Electives differentiate students from one another to the extent that they enable students to focus on a variety of areas of biomedical interest.

The major also offers students the option of completing a biomedical sciences internship as a credit-bearing course: BMS 496. The internship is available to upper division students (Jr/Sr). It is designed to provide valuable on-the-job experience at either on or off campus locations. Potential work sites include hospitals, clinics, public health agencies, research laboratories, and medical service and/or equipment providers.

The major requires students to take core courses that are traditionally considered prerequisites for professional programs in medicine, dentistry, optometry, podiatry, chiropractic and veterinary medicine, as well most graduate programs in various health science disciplines. Students who complete a major in the biomedical sciences are exposed to the interdisciplinary nature of the biomedical sciences, having already been grounded in the basic sciences. Graduates are thereby in a position to continue their studies in a professional or graduate school setting; they are also prepared to seek employment in the public and private sectors.

Additional information about the program can be found by visiting the Biomedical Sciences home page at <http://www.smbb.buffalo.edu/bms/>.

SCHOOL OF MEDICINE & BIOMEDICAL SCIENCES

The Biomedical Sciences Internship: An Overview

The Biomedical Sciences Internship (BMS 496) is designed to expose students to a non-academic environment within which to apply the knowledge gained via traditional coursework. Upper division students who are accepted into the major have the opportunity to work with a community, government, or private agency as a student intern. This volunteer, credit bearing experience is designed to give students the opportunity to “test the waters” in a specific job setting. Students may opt for biomedical sciences work sites whose primary focus is clinical, business, research or journalistic.

Students are required to identify preferred job sites/settings and make appropriate arrangements for the internship in consultation with the Program Director. Having determined the nature of the student internship responsibilities at the job site and the duration of time to be spent on site, students are required to keep a daily log of work experiences and an attendance roster. A 2-3 page final report reflecting on the internship experience must be submitted by each student intern before the last day of classes. The daily log, attendance roster, final report, and recommendation of the site supervisor determine the grade to be assigned by the Program Director. A pass/fail grade will be assigned by the Program Director in consultation with the site supervisor. An internship site visit will take place at or around mid-semester; student interns are to arrange the site visit for a day and time that is mutually convenient for the site supervisor, internship coordinator, and student.

NOTE! *The biomedical sciences internship obligates students to spend 3 hrs/wk at the internship site for every credit for which they are registered. Thus, students registered for 4 credits are expected to spend 12 hrs/wk "on the job." Internships can be arranged for 1-4 credits.*



Semester Timeline

Fall 2010:

Classes Begin	Mon/Aug 30
Drop/Add Deadline – Signed Contract Due	Fri/Sept 10
Deadline to Schedule Site Visit	Fri/Oct 8
Fall Recess	Wed/Nov 24-Fri/Nov 26
Last Day of Classes – Final Report Due	Fri/Dec 10

Student Responsibilities

Students participating in the BMS 496 internship must:

- consider preferred internship sites/settings and make appropriate arrangements for the experience in consultation with the Program Director
- submit a signed BMS 496 contract to the Program Director before the drop/add deadline
- schedule a site visit with the Internship Coordinator
- spend a total of 36 hours at the internship site for each course credit
- keep a daily log of work experiences
- keep an attendance roster; specify dates and times worked
- submit a final 2-3 page report to the Program Director by the last day of classes (along with the daily log and attendance roster)

Frequently Asked Questions

1. Where have students completed their biomedical sciences internships? What is an appropriate internship site?

Internships have been arranged in a variety of settings. These settings include local hospitals, community clinics, public health agencies, research laboratories, and pharmacies. A partial list includes Sisters Hospital, Women and Children's Hospital, Erie County Medical Center, the Center for Hospice and Palliative Care, Planned Parenthood, the Women's Health Initiative, the Olmstead Center for the Visually Impaired, the Erie County Health Department, Amherst Pediatrics, Walgreens, and Abbott Labs. Note that the above list is representative of the diversity of internship sites; it is not intended to limit student choices of possible internship sites.

2. What is the role of the Site Supervisor? the role of the Internship Coordinator? the role of the Program Director?

*The **Site Supervisor** is the person with whom the student intern spends most of his or her time. This is typically a professional (MD, PhD, PA, and the like) who directs the student's internship experience. This is the person who determines what the internship experience will involve. The Site Supervisor is the individual who indicates what the student will be expected to do, what the limitations of the experience will be, and what the expectations are relative to actual responsibilities on site.*

*The **Internship Coordinator** acts as the liaison between the student intern and the Program Director. He is responsible for answering questions about the internship and finalizing arrangements for the internship site visit. The Internship Coordinator makes site visits and prepares evaluations based on the visits.*

*The **Program Director** assists students in identifying potential internship sites and site supervisors. He is the faculty member who is responsible for enforcing university policies relative to registration, course evaluation and grading. The Program Director registers the student in BMS 496 once the student submits a signed contract. He reviews the daily log, attendance roster and summary paper, and consults with the site supervisor regarding assignment of a final grade (P or F).*

3. What is a daily log?

The daily log is essentially a journal in which students record significant learning experiences. The entries are generally brief descriptions of tasks, procedures, patient encounters, and new learning experiences. They may include student reactions to situations encountered on the job. References to patients or to patient records should be made without identifying patients by name or number. Daily entries may be as brief as 2-3 sentences or as lengthy as the student chooses to make them.

4. What is the recommended format?

The format of the journal is left to the discretion of the student intern. Journals may be handwritten (if the handwriting is legible), or prepared using a word processing program. Journals take on a variety of forms: bound notebooks, 3-ring binders, and folders.

5. What is an attendance roster?

The attendance roster is a record of participation in the internship. It should list the dates and time spent at the internship site. Most student interns date each journal entry and indicate the number of hours spent on site. A note in the margin might read "9/1/06: 2 pm – 5 pm (3 hours, 15 hours total)". That note refers to the 3 hours spent on site on 9/1/06 and shows a running total of 15 hours to date. Some site supervisors provide pre-formatted time sheets that serve as attendance rosters.

6. What belongs in the final report?

The final 2-3 page report provides students with an opportunity to reflect on their internship. It should summarize how well the objectives that were established at the beginning of the internship were met by the actual experience. The final report can include references to specific learning experiences, successes and failures, new insights, positive and negative aspects of the internship. It should be typed and double-spaced.

7. How is the time commitment related to credits earned?

<i>Credits earned</i>	<i>Total time commitment</i>	<i>Typical schedule</i>
1	36 hours	3 hrs/wk/12 wks
2	72 hours	6 hrs/wk/12 wks
3	108 hours	9 hrs/wk/12 wks
4	144 hours	12 hrs/wk/12 wks

8. What is the purpose of the site visit and evaluation?

The site visit and evaluation are designed to check on a student's performance as an intern. They offer the Site Supervisor and the student an opportunity to share their reactions to the internship experience. In some cases, the site visit may be conducted by e-mail, with both the Site Supervisor and the student submitting responses to the questions posed on the evaluation form.

9. How is the final grade determined?

The Program Director reviews the daily log, attendance roster and summary paper and consults with the Site Supervisor before a final grade determination is made. The only grades that can be assigned for BMS 496 are P (pass) or F (fail).

BMS 496: Biomedical Sciences Internship

Fall 20__ Spring 20__ Summer 20__

Student: _____
(last name) (first name)

Person Number: _____ Major: _____

Credits (1-4): _____ **NOTE:** *Student internships in the biomedical sciences obligate students to spend 3 hrs/wk at the internship site for every credit for which they are registered. Thus, students registered for 4 credits are expected to spend 12 hrs/wk "on the job."*

Expected Time Commitment: _____
(days) (hours)

Work Site: _____ _____
(on campus location) (off campus location)

Brief Description of the Scope of the Student Internship "Duties":

All parties whose signatures appear on this form agree to the conditions specified above. The student understands that s/he will be expected to keep a written log of work experiences and an attendance roster. The student is also aware that a 2-3 page written report based on the internship experience must be submitted by the last day of classes before a pass/fail grade can be assigned by the Program Director in consultation with the site supervisor.

SIGNATURES: _____ (Student) _____ (date)

_____ (Site Supervisor) _____ (date)

_____ (BMS Program Director) _____ (date)

Site Supervisor Info: Printed Name _____ Phone # _____ E-mail address _____

BMS 496: Internship Site Visit / Evaluation

Student: _____

Work Site: _____

Site Supervisor: _____

Site Visitor(s): _____

Date of visit: _____

Site Supervisor's Evaluation:

- How is the student doing (in general)?

- Is s/he responsible, motivated, on time, professional?

- Are there any HIPAA issues that need to be addressed?

Student's Perceptions:

- What are you learning via the internship?

 - What has been your best/favorite experience? Worst/least favorite?

 - Would you recommend this site/supervisor to other students?
-

Student Testimonials

The quotes that follow were taken from summary papers submitted in recent years.

- “Overall, this experience has provided me with an inside look at what goes on behind the scenes in a medical practice and medical building. It was an unbelievable opportunity because I was given the power to make changes and decisions that normally a student my age would not have the opportunity to make.” (RS03)
- “Seeing both the medical and psychological ramifications of vision loss gave me a better perspective as to how precious a commodity our vision is.” (ECC03)
- “Spending time at an internship is an excellent way to get into gear for the business world after months of academics. It allows an individual to apply new skill sets learned at school and warms up the mind for the future.” (JK03)
- “I was exposed to the obstacles and setbacks that can occur in research, and most of all, I was able to use my knowledge from the classroom in a medical setting.” (KK04)
- “This experience opened my eyes to the rigors of learning medicine. I have always heard how tough a road it is in becoming a physician, but one has to walk side-by-side with a student of medicine to really appreciate the truth behind it.” (RL02)
- “If I were allowed to summarize my internship experiences in just one word, the word would be a resounding WOW! (KM01)
- “I would have to say that the most exciting and satisfying aspect of my internship was being able to apply what I knew to real-time medicine. I had just finished courses in microbiology and comparative anatomy. These were useful when working with the surgeon and with the radiologist.” (AP03)
- “My internship brought closure to my experience as an undergraduate.” (JP03)
- “I have made many valuable connections with professionals in the field of forensic science. This provided me with an education that I would not have obtained in a lecture hall.” (SS02)
- “If I had to pick the most defining experience of my college career, this would be it.” (MS04)

Hints for Making the Most of Your Internship

Adapted from the USC Internship Program Manual: pp. 7-8

Semester 2 2002

University of the Sunshine Coast - Queensland, Australia

Have a sense of direction. Know what you want to accomplish and find out how you can make it happen. Talk to your site supervisor about your learning objectives so that you get experiences that will help you fulfill your goals. Use your internship to gather ideas about the kind of work you will pursue after you graduate.

Develop a good relationship with your site supervisor. Communicate your aims and aspirations. Ask questions. Try to have regular meetings so you can discuss your progress and your accomplishments. But remember to also be a good listener and learn as much as you can during these meetings.

Find a mentor. A mentor is someone at a higher level in the organization who looks out for you and makes sure you are learning what you need to know and accomplishing what you need to do. A mentor can be a good sounding board for you to discuss ideas, ask questions, etc. Your site supervisor could be your mentor, but it could also be another person within the organization.

Have no fear. It is natural at the beginning of your internship to feel like you are in over your head. Because your experiences are new, you may be afraid to make a mistake. Realize, however, that even if you do make a mistake, the consequences are not like to be catastrophic, and you will have gained a learning opportunity. Remember: An error becomes a mistake **ONLY** when you refuse to correct it.

Be consistent, responsible and dependable. Make sure that those you work with see you as someone they can depend on to get the job done, and done well. Complete your assignments on time. Show up on time, work hard, and limit the amount of time you spend socializing. Doing so will go a long way toward proving your integrity and worth.

Be flexible. You may not end up learning and doing the things you expected you would learn and do at the beginning of your internship. Be willing to do whatever needs to be done, and to learn whatever you can.

Tackle all tasks with enthusiasm and a positive attitude. In just about every company, the new hire/intern is going to have to “pay his or her dues.” You will undoubtedly be given some grunt work to do, such as making photocopies, but the key is to complete all your work assignments with the same level of enthusiasm and professionalism.

Take initiative. Employers love employees who dive into tackling tough problems and who think ‘outside the box’ in finding solutions. Just make sure you work with your site supervisor so you don’t overstep your authority – and make sure you share successes with them. But there is a fine line between taking initiative and being perceived as a “know-it-all,” and for interns especially, it is best to err on the side of caution.

Ask questions. Always remember that an internship is a learning experience for you. Seek advice and raise questions whenever you encounter something that is not familiar to you. Be open-minded about new ideas and procedures – remember that you don’t know everything and that your professors didn’t teach you everything.

Avoid negativity. The quickest way to kill a good internship is being negative. So, avoid complaining, being rude, disrespecting co-workers, arriving late, leaving early, being closed-minded, missing deadlines, appearing arrogant, wearing improper attire, acting unprofessionally, appearing inflexible and taking part in office politics. If conflict does arise, try to work through it professionally, or contact your internship coordinator.

Learn from your challenges and colleagues. Internships provide challenges that allow the intern to grow. As you experience challenges, ask yourself ‘What can I learn from this experience?’ Use these challenges as the basis for entries in your daily log.

Get as much exposure as possible. You may be rotated around different departments and supervisors, but if you are not, don’t let that stop you from tackling new tasks and meeting people outside your department. The more you are exposed to new ideas and new people, the more you’ll learn.

Leave with tangible accomplishments. One of your goals with any internship is leaving it with some tangible results. Maybe you developed a brochure, computerized an inventory system, met with clients, or designed something that will be used at the internship site. Keep a copy of any reports, articles or presentations you worked on and create a portfolio. When you go to job interviews or apply to graduate or professional schools, make sure that you highlight your internship experience – it will set you apart from applicants with no on-the-job experience. But remember to maintain confidentiality. Use pseudonyms when writing reports about your internship.

Enjoy yourself! Internships are great experiences, so make sure you have some fun while you’re working and learning.

Quick study: Interning can provide many benefits to graduates

(excerpts from Buffalo Job Finder -Tuesday, March 9, 2010)

“While barely 30 percent of employers consider a college transcript useful when evaluating a recent graduate for employment, two-thirds of them would consider a supervisor’s assessment of an internship or community-based project “very” or “fairly” useful in evaluating their potential for success, according to a survey by Association of American Colleges and Universities. Be sure to keep copies of your positive evaluations and offer them as part of your packet of application materials.

Selecting an internship with a focus on science and technology, or one with an international flavor, can help a new graduate applying for a job stand out from his or her peers. The percentages of employers who want colleges to place more emphasis on these areas are 82 percent and 70 percent, respectively.

In addition to impressing prospective employers and gaining valuable experience, interning gives students a chance to examine a chosen career field from the inside out. Based on what they learn, they may decide to pursue a slightly different position, or even switch fields.”

“While budget cuts and downsizing have forced employers to hire fewer interns, the programs have become an important pipeline for new talent. Among the findings of the most recent NACE study, published in March 2009:

- About 35 percent of full-time entry-level college hires from the class of 2007-08 were from company internship programs.
- Employers extended offers of full-time employment to an average of 67.7 percent of their 2007-08 interns. More than four out of five of their offers, on average, were accepted, the highest intern acceptance rate NACE has reported since it began collecting data in 2001.”