

IV

APPENDICES

APPENDIX I

Letters of Approval from Contributing Departments

College of Engineering:

- 1) Dr. Kenneth Barner, Chair, Department of Electrical & Computer Engineering
- 2) Dr. Norman Wagner, Chair, Department of Chemical Engineering
- 3) Dr. Anette Karlsson, Chair, Department of Mechanical Engineering
- 4) Dr. David Martin, Chair, Materials Science & Engineering
- 5) Dr. Errol Lloyd, Chair, Computer & Information Sciences
- 6) Dr. Harry (Tripp) W. Shenton, Chair, Civil & Environmental Engineering

College of Arts & Sciences:

- 1) Dr. Randall Duncan, Chair, Department of Biological Sciences
- 2) Dr. John Pelesko, Chair, Department of Mathematical Sciences
- 3) Dr. Klaus Theopold, Chair, Department of Chemistry & Biochemistry

College of Agriculture & Natural Resources

- 1) Dr. Titus Awokuse, Chair, Department of Food and Resource Economics



DEPARTMENT OF MATERIALS
SCIENCE AND ENGINEERING
201 DUPONT HALL

University of Delaware
Newark, Delaware 19716
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November 21, 2011

Dawn Elliott
Professor and Director
Biomedical Engineering Program
College of Engineering
University of Delaware
Newark, DE 19716

Dear Professor Elliott,

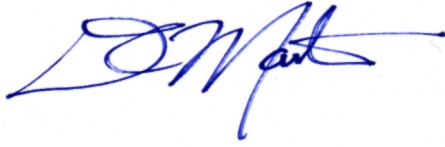
The Department of Materials Science & Engineering (MSEG) is pleased to support the creation of a PhD program in Biomedical Engineering. Several MSEG faculty, including myself, are BME-affiliated members. A graduate BMEG program at UD will provide an excellent opportunity for them to recruit outstanding BMEG graduate students into their research programs. I also support the inclusion of the BMEG-affiliated MSEG faculty on the BMEG Graduate Committee – typically 1 to 2 individuals from MSEG per term.

The department is pleased to support the following courses currently offered in our department as elective courses for the Biomedical Engineering PhD program. Additionally, as new MSEG courses are offered that are relevant for Biomedical Engineering, we will support BMEG graduate student participation.

MSEG/CHEG 601	Structure and Properties of Polymer Materials
MSEG 625	Entrepreneurship and risk: meeting the challenges
MSEG 630/CHEG 600	Introduction to Polymer Science and Engineering
MSEG 633/833	Polymer Synthesis and Characterization Laboratory
MSEG 635/835	Principles of Polymer Physics
MSEG 660	Biomaterials and Tissue engineering
MSEG 803	Equilibria in Materials Systems
MSEG 804	Kinetics in Materials Systems
MSEG 817	Composite Materials
MSEG/CHEG 823	TEM in Materials Science
MSEG 832	Principles of Polymerization


The Department of Materials Science & Engineering is excited to be a part of this initiative and looks forward to seeing BMEG students in our labs and in the College of Engineering.

Regards,

A handwritten signature in blue ink, appearing to read 'DM', with a stylized flourish extending to the right.

David Martin
Karl W. and Renate Böer Professor and Chair
Department of Materials Science & Engineering

To: Dawn Elliott
Professor and Director
Biomedical Engineering Program

From: Errol Lloyd 
Professor and Chair
Computer and Information Sciences

Date: November 22, 2011

Subject: CIS support for a PhD in Biomedical Engineering

The Department of Computer & Information Sciences is pleased to support the creation of a PhD program in Biomedical Engineering. Some of our faculty are BME-affiliated members and this program will provide an excellent opportunity for them to recruit outstanding BME graduate students into their research programs.

This PhD program will make a terrific companion for the Center for Bioinformatics & Computational Biology program directed by Cathy Wu in CIS. These two programs have great synergy and UD faculty will be able to serve as thesis advisors in both. Since the scope of the two programs is quite different, they will enhance the interdisciplinary bio-related research and education initiatives of the university.

CIS is pleased to support the following courses currently offered in our department as elective courses for the Biomedical Engineering PhD program:

- CISC642 Introduction to Computer Vision
- CISC681 Artificial Intelligence
- CISC/BINF689 Topics in AI course (Machine Learning)
- CISC/BINF849 Advanced Topics in Computer Applications (Computational Biomedicine)
- CISC852 Computer Network Performance
- CISC887 Internet Information Gathering

Additionally, as new CIS courses are offered that are relevant for Biomedical Engineering, we will support and encourage BME graduate student participation.

The Department of Computer & Information Sciences is excited to be a part of this initiative!



November 21, 2011

Dawn Elliott
Professor and Director
Biomedical Engineering Program
College of Engineering
University of Delaware

Dear Professor Elliott,

The Department of Civil & Environmental Engineering is pleased to support the creation of a PhD program in Biomedical Engineering. Some of our faculty are BME-affiliated members and this program will provide an excellent opportunity for them to recruit outstanding BME graduate students into their research programs.

The Department of Civil & Environmental Engineering is excited to be a part of this initiative.

Regards,

A handwritten signature in blue ink, appearing to read "H. Shenton".

Harry W. Shenton
Professor and Chair
Department of Civil & Environmental Engineering

APPENDIX II

Letters of Support from Deans of Participating Colleges

- 1) Dr. Babatunde A. Ogunnaike, Interim Dean, College of Engineering
- 2) Dr. George H. Watson, Dean, College of Arts & Sciences
- 3) Dr. Robin Morgan, Dean, College of Agriculture & Natural Resources
- 4) Dr. Kathleen Matt, Dean, College of Health Sciences



College of Engineering
OFFICE OF THE DEAN

University of Delaware
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November 15, 2011

Dawn Elliott
Professor and Director
Biomedical Engineering Program
College of Engineering
University of Delaware

Dear Professor Elliott,

The College of Engineering is pleased to support your application for a PhD program in Biomedical Engineering (BME). You and your colleagues have assembled an impressive program application, and we enthusiastically endorse it.

The college will provide research assistantships for September and October of the first year for new students who have not selected advisors. The college will also provide Teaching Assistant lines to BME as additional support for the graduate program and to meet the needs of the BME undergraduate program. Finally, we will provide administrative support consistent with the size of the graduate program.

The college, in collaboration with the departments, will ensure that the core BMEG courses are available and that faculty will be available to serve on the BME Graduate Committee. Our plans to hire additional faculty in the area of Biomedical Engineering will enable the instructional capacity needed for this program.

We feel that the one semester teaching requirement is a particular strength of this graduate program. It will prepare students for academic and industry positions while helping the College of Engineering meet its teaching needs.

This PhD program is critical to the success of Biomedical Engineering at UD and falls within the strategic plan of the College of Engineering. It will provide important new educational options for students, make the region more attractive to prospective employers and residents, and enhance the prominence of the University. We strongly support this initiative.

Sincerely,

A handwritten signature in black ink, reading 'Babatunde A. Ogunnaike'.

Babatunde A. Ogunnaike, Interim Dean
College of Engineering



College of Agriculture
& Natural Resources

OFFICE OF THE DEAN

113 Townsend Hall
531 South College Avenue
Newark, DE 19716-2103
Phone: 302-831-2501
Fax: 302-831-6758

November 22, 2011

Dawn Elliott
Professor and Director
Biomedical Engineering Program
College of Engineering
University of Delaware

Dear Professor Elliott,

The College of Agriculture and Natural Resources enthusiastically endorses the PhD program in Biomedical Engineering.

The college agrees to support the addition of BME doctoral students into our statistics courses to fulfill their core and elective requirements. As the program grows we look forward to further opportunities to collaborate in interdisciplinary research across our college and the BME program.

This is a great opportunity for the University of Delaware, and we applaud the standard it sets for similar efforts in other disciplines.

Sincerely,

A handwritten signature in black ink that reads 'Robin W. Morgan'.

Robin W. Morgan, Dean
College of Agriculture and Natural Resources

APPENDIX III

Forms

Progress Report Form (attached)

Candidacy Form (attached)

Transfer of Graduate Credit Form: <http://www.udel.edu/gradoffice/forms/credittransferform.pdf>

Change of Classification Form: <http://www.udel.edu/gradoffice/forms/classificationform.pdf>

Course Substitution Form: http://www.udel.edu/gradoffice/forms/course_substitution.pdf

Date: _____

BIOMEDICAL ENGINEERING
ANNUAL PHD STUDENT PROGRESS REPORT
(to be submitted before July 1st of each year)

Name:

Faculty Advisor:

Year of Entry:

Date of Last Committee Meeting:

Dissertation Committee Members:

Chair:

Other members:

- 1.
- 2.
- 3.
- 4.

Evaluation of the Student's Progress:

☐ Satisfactory

☐ Unsatisfactory

A short evaluation describing the student's progress should be written by the Chair of the Dissertation Committee immediately after the annual meeting and attached to this form.

Signature of Advisor:

Student must attach a 1 page summary of research progress and future directions (Please include thesis title; research objective; accomplishments since last Dissertation Committee meeting; goals for upcoming year; publications divided into categories of published, submitted, in preparation and abstracts; and presentations at scientific meetings with names and locations of meetings, and dates and titles of talk/poster)

Courses Completed: (attach an unofficial transcript of completed courses)

Core: ☐ BMEG 605

Other: ☐ Seminar, BMEG 890 (number of semesters):

☐ BMEG 606/BISC 606

☐ Research, BMEG 868 (number of credits):

☐ BMEG 801

☐ Doctoral Dissertation, BMEG 969 (number of credits):

☐ Advanced math (course number):

☐ Statistics (course number):

Electives (list courses):

Teaching Aid Requirement (course taught; anticipated or completion semester and year):

PhD Qualifying Exam (anticipated or completion date):

PhD Candidacy Defense (anticipated or completion date):

Title of Thesis:

Anticipated Dissertation Defense date: