# UNIVERSITY FACULTY SENATE FORMS

# **Academic Program Approval**

This form is a routing document for the approval of new and revised academic programs. Proposing department should complete this form. For more information, call the Faculty Senate Office at 831-2921.

Submitted by: <u>Leslie Allshouse</u> phone number_302-831-2755_
Department: Medical Laboratory Sciencesemail address_allshous@udel.edu_
Action: Add Molecular Diagnostics Minor  (Example: add major/minor/concentration, delete major/minor/concentration, revise major/minor/concentration, academic unit name change, request for permanent status, policy change, etc.)
Effective term <u>Fall 2015</u>
(use format 04F, 05W)
Current degree NA
Current degree NA (Example: BA, BACH, BACJ, HBA, EDD, MA, MBA, etc.)
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Proposed change leads to the degree of:Molecular Diagnostics Minor
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Proposed name: Molecular Diagnostics Minor Proposed new name for revised or new major / minor / concentration / academic unit
Proposed new name for revised or new major / minor / concentration / academic unit (if applicable)
Revising or Deleting:
Undergraduate major / Concentration:
(Example: Applied Music – Instrumental degree BMAS)
Undergraduate minor:  (Example: African Studies, Business Administration, English, Leadership, etc.)
(Example: African Studies, Business Administration, English, Leadership, etc.)
Graduate Program Policy statement change:
(Must attach your Graduate Program Policy Statement)
Creative to Dreamon of Studen
Graduate Program of Study:
(Z. minje. 1 minut Science. 113 1 minut Science. 1115 Economics. 1111 Economics. 1115)
Creativate mineral concentration.
Graduate minor / concentration:

Note: all graduate studies proposals must include an electronic copy of the Graduate Program Policy Document, highlighting the changes made to the original policy document.

List new courses required for the new or revised curriculum. How do they support the overall program objectives of the major/minor/concentrations)?

(Be aware that approval of the curriculum is dependent upon these courses successfully passing through the Course Challenge list. If there are no new courses enter "None") - **NONE** 

**Supply support letter from the Library, Dean and/or Department Chair if needed.** (all new majors/minors will need a support letter from the appropriate administrator.)

Support Letter from Department chair is provided.

Supply a resolution for all new manors/programs; name changes of colleges, departments, degrees; transfer of department from one college to another; creation of new departments; requests for permanent status.

# **Molecular Diagnostics Minor Resolution**

WHEREAS, the Department of Medical Laboratory Sciences has been successfully offering several Molecular Diagnostics lecture and laboratory courses, and

WHEREAS, an increasing number of science students have an interest in molecular diagnosis of disease, and

WHEREAS, there is a need for individuals prepared with entry level theory and applicable skill in the field of molecular diagnostics; be it therefore

RESOLVED, that the Faculty Senate recommends the approval of the establishment of a new molecular diagnostics minor.

Explain, when appropriate, how this new/revised curriculum supports the 10 goals of undergraduate education: http://www.ugs.udel.edu/gened/

Employing engaging teaching strategies, these courses will motivate students to: Goal 2, learn to think critically and solve problems. Goal 3, work and learn both independently and collaboratively. Goal 5, understand the diverse ways of thinking that underline the search of knowledge in the arts, humanities, sciences and social sciences. Goal 6, develop the intellectual curiosity, confidence and engagement that will lead to lifelong learning. Goal 7, this minor will provide practical and applied knowledge for those interested Molecular Diagnostics.

### **Identify other units affected by the proposed changes:**

(Attach permission from the affected units. If no other unit is affected, enter "None")

Courses in the departments of Animal & Food Science, Biological Sciences and Chemistry are part of the curriculum. Letters of support are included. **BISC COURSES PENDING**, please see attached letter.

# Describe the rationale for the proposed program change(s):

(Explain your reasons for creating, revising, or deleting the curriculum or program.)

The Department of Medical Laboratory Sciences has been successful in offering a certificate program in Molecular Diagnostics to experienced Medical Laboratory Scientists, not exposed to the topics of Molecular Diagnostics, Genetics and Molecular techniques during their undergraduate education. Currently, there is a need for individuals prepared in molecular diagnostic techniques for basic science and industry research. This minor will provide current undergraduates the opportunity to acquire the knowledge and skill set needed for entry level positions in molecular diagnostics-related professions.

### **Program Requirements:**

(Show the new or revised curriculum as it should appear in the Course Catalog. If this is a revision, be sure to indicate the changes being made to the current curriculum and **include a side-by-side comparison** of the credit distribution before and after the proposed change.)

## **Degree: Molecular Diagnostics Minor**

The Molecular Diagnostics minor is designed to assist students earning a Bachelor of Science degree in such majors as: Animal and Food Science, Food Science, Ecology, Environmental Science, Earth Science Education, Geological Science, Marine Science, Biological Science, Biochemistry, Chemistry, Neuroscience, Medical Laboratory Sciences, Exercise Science and Nutritional Sciences, for an entry level position in a laboratory utilizing molecular diagnostic techniques. This minor will utilize both online and on-campus delivery of educational material, along with an intensive laboratory practicum. At this time, a lack of knowledge in this subject area can be limiting to career prospects and progression. This minor will broaden an undergraduate's education in the areas of molecular diagnostics, genetics and molecular techniques. Toward that end, completion of course work will allow students to acquire basic molecular diagnostics theory and laboratory skills that may enhance future job opportunities.

# Required Courses\*

BISC208 Introductory Biology II	4
CHEM104 General Chemistry	
MEDT500 Genetics & Molecular Diagnostics for the Clinical Laboratory	3
MEDT501 Molecular Diagnostics	
MEDT502 Application of Molecular Diagnostics Techniques	
Total credits	17
Electives (choose one course)	
ANFS300 Principles of Animal & Plant Genetics	3
MEDT200 The Language of Medicine	
MEDT270 Medical Microbiology and Infectious Disease	4
BISC305 Cell Biology	3
BISC306 General Physiology	
Total credits	20

<sup>\*</sup>Students must obtain a grade of C- or better in all required courses.

ROUTING AND AUTHORIZATION: (Please do	not remove supporting documentation.)
Department Chairperson	Date10-30-14
Dean of College January J. Hall	Date 11/6/14
7 000	Date11/6/14
Chairperson, Senate Com. on UG or GR Studies	
Chairperson, Senate Coordinating Com.	Date
Secretary, Faculty Senate	Date
Date of Senate Resolution	Date to be Effective
RegistrarProgram Code	Date
Vice Provost for Academic Affairs & International Programs	Date
Provost	Date
Board of Trustee Notification	Date

Revised 10/23/2007 /khs

305 Willard Hall Education Building Newark, DE 19716-3720 Phone: 302-831-2849 Fax: 302-831-4180 Email: mls-dept@udel.edu

Leslie Allshouse, M.Ed., M.B.A, MLS(ASCP)<sup>CM</sup> Chair, Undergraduate Program Committee Department of Medical Laboratory Sciences

October 30, 2014

Dear Prof. Allshouse,

This letter is to state my enthusiastic and unwavering support for the newly proposed Minor in Molecular Diagnostics to be offered by the Department for Fall 2015.

I strongly feel this minor, which incorporates our newly offered molecular oriented courses MEDT500, MEDT501, and MEDT502, will benefit numerous students on campus. Offering this to students from different Departments and Colleges will provide them with the opportunity to be educated in the area of molecular biology theory, applied molecular techniques and the latest technology in the molecular diagnosis of disease. Additionally, this minor will help to provide career opportunities previously lacking.

Please feel free to contact me with any questions or concerns.

Sincerely,

Michelle A. Parent, Ph.D. Associate Professor & Interim Chairperson Department of Medical Laboratory Sciences



Michelle Parent <mparent@udel.edu>

# **Minor in Molecular Diagnostics**

University of Delaware Mail - Minor in Molecular Diagnostics

2 messages

Michelle Parent <mparent@udel.edu>
To: John Burmeister <jlburm@udel.edu>

Mon, Oct 20, 2014 at 4:42 PM

Hi John,

We are in the process of submitting a Minor in Molecular Diagnostics. We would like to include CHEM104 as a requirement. We envision students in Biology, Exercise Science, Animal & Food Sciences, etc. would be the target of this minor, and they are already required to take CHEM 104 as a part of their major. Therefore, we do not anticipate any additional students taking this course to complete the minor. Could you please write a letter of support? Please let me know if you have any questions.

Best, Michelle

Michelle A. Parent, Ph.D., MT(ASCP)
Associate Professor & Interim Chairperson Department Medical Laboratory Sciences
College of Health Sciences
Joint appointment Department of Biological Sciences
University of Delaware
305 Willard Hall
16 West Main St.
Newark, DE 19716
Office(302)831-8591

"The question is not what you look at, but what you see." - Henry David Thoreau

John Burmeister <jlburm@udel.edu>

Mon, Oct 20, 2014 at 4:47 PM

To: Michelle Parent <mparent@udel.edu>
Cc: Murray Johnston <mvi@udel.edu>

Michelle:

No problem, whatsoever - happy to support you in this endeavor.

JB

[Quoted text hidden]

[Quoted text hidden]

--

John L. Burmeister Alumni Distinguished Professor and Associate Chairman

Department of Chemistry & Biochemistry

University of Delaware

102 Brown Laboratory

Newark, DE 19716

Phone: 302-831-1130 Fax: 302-831-6335

http://www.udel.edu/chem/burmeister/jlb.htm

1 of 2

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2 of 2 10/30/2014 8:01 AM



Michelle Parent <mparent@udel.edu>

# Course approval for MLS minor in Molecular Diagnostics

4 messages

Michelle Parent <mparent@udel.edu>

To: Jack Gelb < jgelb@udel.edu>

Mon, Oct 27, 2014 at 8:31 PM

Hi Jack,

We currently have 3, new 500 level courses offered as a certificate to individuals that have already graduated with a BS but need molecular experience. This certificate was approved and is on the books as a current offering.

Currently, we are using these same 3, 500 level courses to submit a minor in Molecular Diagnostics that will target B.S. majors across the University.

For this minor, we have tried to include electives that respective students would possibly take as a part of their courses requirements and that were applicable to the minor, this is why you will see ANFS300 included.

There has been interest by current undergrads to take these courses to earn the certificate, the certificate alone is 9 credits. The undergraduate studies committee and I discussed that it would be more appropriate to offer this as a minor, to provide academic rigor and to discourage a 9-credit extra listing on the transcript and following a typical minor offering.

I've attached my APA form with the required information. Our department committee will be meeting the end of this week for preliminary review, although it this has been discussed previously. Please let me know if you or the committee has any questions.

Thanks, Michelle

--

Michelle A. Parent, Ph.D., MT(ASCP)
Associate Professor & Interim Chairperson Department Medical Laboratory Sciences
College of Health Sciences
Joint appointment Department of Biological Sciences
University of Delaware
305 Willard Hall
16 West Main St.
Newark, DE 19716

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Office(302)831-8591

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Gelb, Jack, JR <jgelb@udel.edu>
To: "Parent, Michelle A" <mparent@udel.edu>
Cc: "Kung, Limin, JR" <lksilage@udel.edu>

Tue, Oct 28, 2014 at 9:23 AM

Hi Michelle,

1 of 3 10/30/2014 3:50 PM

I am no longer serving as chair of ANFS. Limin Kung (cced) is serving in this capacity. Thanks, Jack

From: Michelle Parent [mparent@udel.edu] Sent: Monday, October 27, 2014 8:31 PM

To: Gelb, Jack, JR

Subject: Course approval for MLS minor in Molecular Diagnostics

[Quoted text hidden]

Michelle Parent <mparent@udel.edu>

Thu, Oct 30, 2014 at 8:08 AM

Thu, Oct 30, 2014 at 11:13 AM

To: "Gelb, Jack, JR" < igelb@udel.edu> Cc: "Kung, Limin, JR" < lksilage@udel.edu>

Hello Limin.

Please let me know if you have any questions regarding the use of ANFS300 as a possible elective for the MLS Department minor.

Best,

Michelle

[Quoted text hidden]

Michelle A. Parent, Ph.D., MT(ASCP)

Associate Professor & Interim Chairperson Department Medical Laboratory Sciences

**College of Health Sciences** 

Joint appointment Department of Biological Sciences

University of Delaware

305 Willard Hall

16 West Main St.

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Limin Kung < lksilage@udel.edu>

To: Michelle Parent <mparent@udel.edu>

Hello Michelle

Yes, this should be fine.

Best regards,

Limin

[Quoted text hidden]

Limin Kung, Jr., Ph.D.

S. Hallock du Pont Professor of Animal Sciences

Dept. of Animal & Food Sciences

Dairy Nutrition and Silage Fermentation Lab

University of Delaware

531 S. College Ave.

10/30/2014 3:50 PM 2 of 3

Newark, Delaware 19716-2150 USA

Phone: 302 831 2524 Fax: 302 831 2822

Email: LKSILAGE@UDEL.EDU

Web: http://ag.udel.edu/anfs/faculty/Kung.html

3 of 3 10/30/2014 3:50 PM



Michelle Parent <mparent@udel.edu>

# minor in molecular diagnostics

7 messages

Deni S. Galileo <dgalileo@udel.edu>

Wed, Oct 22, 2014 at 8:39 AM

To: "Parent, Michelle A" <mparent@udel.edu>

Hi, Michelle.

BISC requires that any commitment for our courses to be included in another department's programs requires discussion by our Undergraduate Programs Committee and the faculty as a whole. Would you please send me the proposal that you will submit to the Senate approval process? I am chair of our UPC this year.

Thanks.

-Deni

--

Deni S. Galileo, Ph.D.

Associate Professor

Department of Biological Sciences

University of Delaware

and

Senior Research Scientist

Helen F. Graham Cancer Center

Christiana Care Health System

Newark, DE

(302) 831-1277 phone

(302) 831-2767 fax and lab phone

http://www.bio.udel.edu/users/dgalileo

Michelle Parent <mparent@udel.edu>

Wed, Oct 22, 2014 at 11:51 AM

Wed, Oct 22, 2014 at 5:48 PM

To: "Michelle .Parent" <mparent@udel.edu>

[Quoted text hidden]

Michelle A. Parent, Ph.D., MT(ASCP)

Associate Professor & Interim Chairperson Department Medical Laboratory Sciences

**College of Health Sciences** 

Joint appointment Department of Biological Sciences

University of Delaware

305 Willard Hall

16 West Main St.

Newark, DE 19716

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Michelle Parent <mparent@udel.edu>

To: "Deni S. Galileo" <dgalileo@udel.edu>

1 of 3 10/30/2014 8:05 AM

Hi Deni.

Let me give you some information about the minor we are proposing. We are targeting B.S. majors across the University that already take BISC 208 and CHEM104 as a part of their required course work. This minor would not be appropriate for students that don't have a minimum base of biology and chemistry.

Additionally, we have tried to include electives that respective students would possibly take as a part of their courses requirements and that were applicable to the minor, this is why you will see BISC305 & BISC306 included.

We currently have 3, new 500 level courses offered as a certificate to individuals that have already graduated with a BS but need molecular experience. This certificate was approved and is on the books as a current offering.

There has been interest by current undergrads to take these courses to earn the certificate, the certificate alone is 9 credits. The undergraduate studies committee and I discussed that it would be more appropriate to offer this as a minor, to provide academic rigor and to discourage a 9-credit extra listing on the transcript and following a typical minor offering.

I've attached my APA form with the required information. Our department committee will be meeting the end of this week for preliminary review, although it this has been discussed previously. Please let me know if you or the committee has any questions.

Thanks,

Michelle

[Quoted text hidden]

--

Michelle A. Parent, Ph.D., MT(ASCP)

Associate Professor & Interim Chairperson Department Medical Laboratory Sciences

College of Health Sciences

Joint appointment Department of Biological Sciences

University of Delaware

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#### APA MDX MINOR -MPARENT MLS.doc

<sup>1</sup> 43K

Michelle Parent <mparent@udel.edu>

To: "Deni S. Galileo" <dgalileo@udel.edu>
Bcc: Leslie Allshouse <allshous@udel.edu>

Hi Deni.

Do you have date for your committee and Department discussion? I have a CHS deadline coming up and have yet to hear anything regarding timeframe.

Thanks,

Michelle

[Quoted text hidden]

Deni S. Galileo <dgalileo@udel.edu>

Tue, Oct 28, 2014 at 8:28 AM

Mon. Oct 27, 2014 at 8:22 PM

To: Michelle Parent <mparent@udel.edu>

Michelle.

Our Undergraduate Programs Committee is meeting late Thursday afternoon, and we will have a departmental faculty meeting on Friday afternoon. Our chair cannot write a letter until these things occur. Since I have seen many proposals make it all the way up to the Faculty Senate Undergraduate Studies Committee lacking some required letters, I do not think your proposal will be halted if you

2 of 3 10/30/2014 8:05 AM

Michelle Parent wrote:

[Quoted text hidden]

Michelle Parent <mparent@udel.edu>

To: Leslie Allshouse <allshous@udel.edu>

fyi

----- Forwarded message -----

From: Deni S. Galileo <dgalileo@udel.edu>

[Quoted text hidden] [Quoted text hidden]

Michelle Parent <mparent@udel.edu>

To: "Deni S. Galileo" <dgalileo@udel.edu>

Thanks for the update. Best, Michelle

[Quoted text hidden]

get a letter from our chair a little late. Although I cannot predict the future, I imaging you will get the letter next week.

Tue, Oct 28, 2014 at 8:35 AM

Tue, Oct 28, 2014 at 9:28 AM

10/30/2014 8:05 AM 3 of 3



# **D**EPARTMENT OF **B**IOLOGY OFFICE OF THE CHAIR

University of Delaware Newark, Delaware 19716-2590 Ph: 302/831-6977 Fax: 302/831-2281

Robin W. Morgan, Ph.D. Professor and Chairman Department of Biological Sciences 118C Wolf Hall Telephone (302) 831-6977 Fax No. (302) 831-1033

October 31, 2014

Michelle A. Parent, Ph.D., MT (ASCP)
Associate Professor & Interim Chairperson Department Medical Laboratory Sciences
College of Health Sciences
University of Delaware
305 Willard Hall
Newark, DE 19716

Dear Michelle,

On behalf of the Department of Biological Sciences, I write to support your proposal to establish a minor in Molecular Diagnostics. Students earning this degree will be required to take BISC 208. The Department of Biological Sciences will be able to provide the coursework needed for students to complete this minor.

In accordance with the Department of Biological Sciences by-laws, this proposal has been considered by the Undergraduate Programs Committee and approved by vote of the department faculty at a duly scheduled faculty meeting.

Sincerely,

Robin W. Morgan, Ph.D.

Robin W. Morgan

Professor and Chair