



**THE OHIO STATE UNIVERSITY**  
WEXNER MEDICAL CENTER

**College of Medicine**  
**Department of Biological Chemistry and Pharmacology**

206 Rightmire Hall  
1060 Carmack Rd.  
Columbus, OH 43210  
614-292-5451 Phone  
614-292-4118 Fax  
[medicine.osu.edu](http://medicine.osu.edu)

DATE: November 14, 2023

TO: Randy Smith, Vice Provost for Academic Programs, Office of Academic Affairs

FROM: Jessica Berner, Administrative Assistant for Biological Chemistry and Pharmacology

RE: Informational Item: Modification of Medical Pharmacology Minor

Dear Randy,

The Department of Biological Chemistry and Pharmacology is requesting modification of the total number of credit hours for the online Medical Pharmacology minor from 14 credit hours to 15 credit hours. One of the required courses for the minor, BIOPHRM 5050 Molecular Basis of Oxidative Stress, is changing from a 2-credit hour to a 3-credit hour class effective with the Summer 2024 term. As a result of this change, the total credit hours required for the minor will increase to 15 credit hours.

Supporting documentation is attached. Please let me know if you have any questions or need additional information.

Sincerely,

Jessica Berner | Administrative Assistant

The Department of Biological Chemistry and Pharmacology – College of Medicine

206 Rightmire Hall – 1060 Carmack Road Columbus, Ohio 43210

Office: 614-292-5451

Email: [Jessica.berner@osumc.edu](mailto:Jessica.berner@osumc.edu)

**From:** Clinchot, Dan <Dan.Clinchot@osumc.edu>  
**Sent:** Tuesday, November 14, 2023 2:58 PM  
**To:** Berner, Jessica <Jessica.Berner@osumc.edu>  
**Cc:** Parthun, Mark <parthun.1@osu.edu>  
**Subject:** Re: Approval Request: Medical Pharmacology Minor Change

Thank you for sending me the detail Jessica. Yes, I approve. Best Dan

**From:** "Berner, Jessica" <[Jessica.Berner@osumc.edu](mailto:Jessica.Berner@osumc.edu)>  
**Date:** Tuesday, November 14, 2023 at 1:38 PM  
**To:** "Clinchot, Dan" <[Dan.Clinchot@osumc.edu](mailto:Dan.Clinchot@osumc.edu)>  
**Cc:** "Parthun, Mark" <[parthun.1@osu.edu](mailto:parthun.1@osu.edu)>  
**Subject:** Approval Request: Medical Pharmacology Minor Change

Dear Dr. Clinchot,

I respectfully request your approval to increase the number of required credits hours for the Medical Pharmacology Minor from 14 to 15 credit hours. Effective SU2024, one of the required courses for the minor BIOPHRM 5050: Molecular Basis of Oxidative Stress is converting from a 2-credit to a 3-credit hour course. Therefore, the addition of one credit hour for the Medical Pharmacology Minor is needed.

Please find attached "Current Medical Pharmacology Minor" and "Medical Pharmacology Minor with changes." Also, please find attached Dr. Gu's approval to change the credit hours for the minor.

Please let me know if you have any questions or need any additional information.

Kind regards,  
Jessica

**From:** Parthun, Mark <parthun.1@osu.edu>  
**Sent:** Wednesday, November 15, 2023 11:41 AM  
**To:** Berner, Jessica <Jessica.Berner@osumc.edu>  
**Subject:** Re: Approval Request\_ Modification of Medical Pharmacology Minor

I approve.

Mark

Mark Parthun, PhD  
Professor and Chair  
Department of Biological Chemistry and Pharmacology  
The Ohio State University  
206G Rightmire Hall  
1060 Carmack Rd.  
Columbus, OH 43210

614-292-6215  
[Parthun.1@osu.edu](mailto:Parthun.1@osu.edu)

**From:** Berner, Jessica <[Jessica.Berner@osumc.edu](mailto:Jessica.Berner@osumc.edu)>  
**Date:** Wednesday, November 15, 2023 at 11:32 AM  
**To:** Parthun, Mark <[parthun.1@osu.edu](mailto:parthun.1@osu.edu)>  
**Subject:** Approval Request\_ Modification of Medical Pharmacology Minor

Dear Dr. Parthun,

I respectfully request your approval to increase the number of required credits hours for the Medical Pharmacology Minor from 14 to 15 credit hours. Effective SU2024, one of the required courses for the minor BIOPHRM 5050: Molecular Basis of Oxidative Stress is converting from a 2-credit to a 3-credit hour course. Therefore, the addition of one credit hour for the Medical Pharmacology Minor is needed.

Please find attached "Current Medical Pharmacology Minor" and "Medical Pharmacology Minor with changes." Also, please find attached Dr. Gu's approval to change the credit hours for the minor.

Please let me know if you have any questions or need any additional information.

Kind regards,  
Jessica

The Ohio State University  
College of Medicine

Medical Pharmacology Minor (online)

Department of Biological Chemistry and Pharmacology  
Contact: Professor Howard Gu  
206F Rightmire Hall, 1060 Carmack Rd  
Columbus, OH 43210; 614-688-5741  
[Gu.37@osu.edu](mailto:Gu.37@osu.edu)

The understanding of pharmacological principles underlies the treatment of all human diseases. The online minor in medical pharmacology educates undergraduate students in core areas of medical pharmacology and aims to place drugs and their effects in the context of well understood problems. This approach makes medical pharmacology easier to learn, provides a better understanding of the mechanisms of drug action, and affords a clearer rationale for use of specific drugs in human disease. The minor consists of 14 credit hours and is excellent preparation for admission to medical, dental, veterinary, optometry and nursing schools, and to biomedical sciences graduate programs.

Initial course: BIOPHRM 5600: "Introduction to General Pharmacology" (3 credits)

The additional 5 classes may be taken in any order:

BIOPHRM 5050 "Molecular Basis of Oxidative Stress" (3 credits)  
BIOPHRM 5300 "Molecular Pharmacology" (2 credits)  
BIOPHRM 5400 "Chemotherapeutic Drugs for Cancer and Infectious Diseases" (2 credits)  
BIOPHRM 5500 "Cardiovascular Pharmacology" (2 credits)  
BIOPHRM 5824 "Pharmacology of the Nervous System" (3 credits)

(Please consult course catalog for possible prerequisites.)

**Medical Pharmacology minor program guidelines**

Required for graduation No

Credit hours required

15 credit hrs. 1000 level courses shall not be counted in the minor.

Transfer and EM credit hours allowed

A student is permitted to count up to 6 total hours of transfer credit and/or credit by examination.

Overlap with the GE A student is permitted to overlap up to 6 credit hours between the GE and the minor

Overlap with the major and additional minor(s)

- The minor must be in a different subject than the major.
- The minor must contain a minimum of 12 hours distinct from the major and/or additional minor(s).

Grades required

- Minimum C- for a course to be listed on the minor.
- Minimum 2.00 cumulative GPA for all minor course work.
- Course work graded Pass/Non-Pass cannot count on the minor.
- No more than 3 credit hours of course work graded Satisfactory/Unsatisfactory may count toward the minor.

X193

No more than 3 credit hours

Minor approval

Minor program approval is not required, as long as there is no variation from the minor program sheet. Any variation from the minor as indicated must be approved by Professor Howard Gu, faculty contact.

Filing the minor program form

The minor program form must be filed with the student's college/school at least by the time the graduation application is submitted to a college/school counselor.

Changing the minor

Once the minor program form is filed in the college office, any changes must be approved by the academic unit offering the minor.

College of Arts and Sciences  
Curriculum and Assessment Services  
154 Denney Hall, 164 Annie & John Glenn Ave.  
<http://artsandsciences.osu.edu>  
Approved by CAA 4-4-18  
Updated 10-14-19 DH  
Updated 6-9-21 DH

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Medical Pharmacology Minor (online)

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