Division of Medicinal Chemistry and Pharmacognosy College of Pharmacy, The Ohio State University

Synthetic Med. Chem. Track Graduate Course Requirements

Biochemistry:

PHR 8320 – Biomedicinal Chemistry for Graduate Students (5 credits)

Organic Chemistry:

CHEM 5420 - Spectroscopy of Organic Compounds (1.5 credits)
CHEM 6410 - Basic Organic Reaction Mechanisms (1.5 credits)

Medicinal Chemistry:

PHR 7350 - Drug Discovery and Drug Design (2 credits)
PHR 7370 - Advanced Pharmaceutical Analysis (2 credits)

PHR 7891 - Chromatographic Methods (2 credits) or one of the following: PHR 8350 Advanced Medicinal Chemistry I (2 credits), PHR 8360 - Advanced Medicinal Chemistry II (2 credits), PHR 8370 - Chemotherapy of Infectious Diseases (2 credits)

Two Organic Chemistry electives from the following:

CHEM 6420 - Stereochemistry and Conformational Analysis (1.5 credits)
CHEM 6430 - Introduction to Organic Synthesis (1.5 credits)
CHEM 6440 - Introduction to Physical Organic Chemistry (1.5 credits)
CHEM 7430 - Advanced Organic Synthesis (1.5 Credits)
CHEM 7450 - Metals in Organic Synthesis (1.5 Credits)
CHEM 7460 - Advanced Organic Reaction Mechanisms (1.5 credits)
CHEM 7480 - Advanced Organic Synthesis Laboratory (3 credits)

One Medicinal Chemistry elective from the following:

PHR 7891 - Chromatographic Methods (2 credits)
PHR 7893 - Phytochemical Analysis of Natural Products (2 credits)
PHR 8350 - Advanced Medicinal Chemistry I (2 credits)
PHR 8360 - Advanced Medicinal Chemistry II (2 credits)
PHR 8370 - Chemotherapy of Infectious Diseases (2 credits)
PHR 8390 - Recent Advances in Pharmacognosy (2 credits)
PHR 8510 - Advanced Pharmacognosy (2 credits)

Note: The courses listed above are in addition to the course requirements common to all graduate students in the Division of Medicinal Chemistry and Pharmacognosy, namely PHR 8520 (Research Ethics) and PHR 8880/8881 (College and Division Seminars). One enrollment in 8880 or 8881 is required per semester while on campus (with three 8880.01 or 8881.01 enrollments prior to graduation).