

BSC 411(2 hours)/411L(1 hour)
Introduction to Entomology
Dr. Fred Howell, Professor
601 JST, 266-4750

Lecture Text: Romoser, W.S. and J.G. Stoffolano, Jr. 1998. *The Science of Entomology*, 4rd Ed., WCB Publishers, Dubuque, Iowa. 532 pp.

Lecture Topics:

Introduction to Arthropoda

- Characteristics
- Rules of Nomenclature
- Classification & Distinguishing Features of Major Arthropod Groups
- Relationships of Arthropods to other invertebrates
- Post-embryonic Development

Anatomy & Physiology of Insecta

- External Anatomy
- Body Wall
- Digestion
- Excretion
- Respiration
- Circulation
- Nervous System
- Hormonal Control of Development

Insect Behavior

- External factors affecting development
- External factors affecting behavior
- Life styles

Laboratory Text: Bland, R.G. and H.E. Jaques. 1978. *How to Know the Insects*, 3rd Ed., WCB Publishers, Dubuque, Iowa. 409 pp.

Laboratory Topics:

- Morphological features of arthropod groups
- External anatomy of grasshopper
- Using dichotomous keys
- Characteristics of Insect Orders
- Collection and identification of insects (by order and family)
- Sight identification of insect orders

Course Grade: The same letter grade is recorded for both lecture and laboratory portions of course, i.e. 411, 411L. Insect collection and associated paper will represent 25% of course grade; final exam will represent 25% of course grade. 50% of course grade will be determined from lecture and laboratory tests. 411 students will be required as per departmental policy to do a term paper (topic should be approved by Dr. Howell prior to beginning the work.)

Disabilities Act:

If a student has a disability that qualifies under the Americans with Disabilities Act and requires accommodations, he/she should contact the Office of Support Services for Students with Disabilities (OSS) for information on appropriate policies and procedures; Box 8586; Tel: 266-5024; TTY: 266-6837; Fax: 266-6035.