

Introduction - 1

Biology 213 completes the Bellevue Community College introduction to Biology sequence. Much of the emphasis of Biology 213 is on the plant kingdom – the structure, function and diversity of plants. Biology 213 allows us to explore the somewhat hidden knowledge that plants are wonderful organisms, and extraordinarily clever! Sometimes studying plants takes more time – because we start with less. We're not plants so we have no life experience to contribute to the study of plants as we do with animal biology and few students have had previous educational opportunities to study who and what plants are.

Biology 213, in general, is divided into three units:

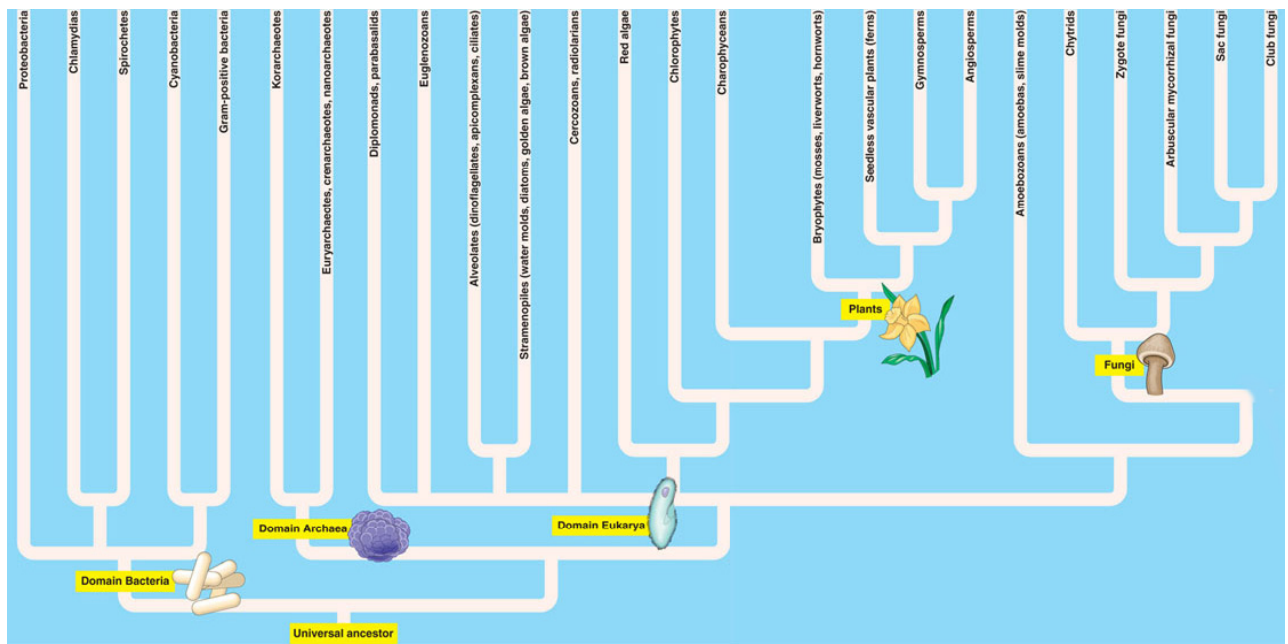
1. The Structure and Function of Plant Systems, focusing on flowering plants, often called the angiosperms, in the phylum, Anthophyta.

Topics included:

- Reproduction and development
- Tissues and organ systems
- Transport
- Nutrition
- Regulation (hormonal and environmental controls)

2. Diversity of Organisms

Biology 213 attempts to introduce you to the organisms in the Eukaryotic Kingdoms not addressed in Biology 212. In this unit we will look at the array of organisms with which we share this earth, and the major features of these groups, with emphasis on life history differences and determining characteristics, with examples of each group when possible. We will include materials on protists, fungi and plants, with emphasis on plants. The genetics of bacteria (and viruses) were briefly addressed in Biology 211 and are the focus of Biology 260, Microbiology, but may be included in Biology 213 poster projects.



One Current Classification Scheme

3. Organisms in the Environment – Ecology and Conservation Biology

Topics included:

Components of Ecosystems

Biomes

Behavioral Biology

Community Interactions in Ecosystems

Processes in Ecosystems

Conservation Biology

Our northwest climate favors more active plant growth as spring progresses. By doing the materials of Biology 213 in this order we have the opportunity to find within our local habitat many examples of the plant groups we will be discussing in the diversity unit. We can then conclude our study of biology with ecological concepts, ecosystems and conservation biology.