

Syllabus: Botany/Plant Pathology 332 – Fungi, Spring 2016

Week	Date	Lecture Topics	Text Readings- Webster & Weber	Laboratory	Lab Readings
1	Jan. 19	Introduction to Fungi	1.1-1.2.2; 1.2.6-1.5.4	Lab 1 Fungal Overview & Introduction to Microscopy	1-15, 111- 116
	Jan. 21	Introduction to Fungal Systematics; Fungal Isolation & Culture		Lab 2* Culturing Fungi I: Isolating Fungi from the Environment	17-20
2	Jan. 26	Zygomycota	7	Lab 3 Mucorales	21-24
	Jan. 28	Zygomycota; Glomeromycota	7; Smith and Read (2008)	Lab 4 Entomophthoromycotina; Glomeromycota	25-26
3	Feb. 2	Chytridiomycota and other chytrids	6	Lab 5 Chytrids	27-30 Lab Quiz 1
	Feb. 4	Mating Systems in fungi - Introduction to fungal transformation		Lab 6 Culturing Fungi II: Single Organism Cultures; Fungal Transformation	31-35
4	Feb. 9	Ascomycota Overview; Ascomycete Yeasts	8-10	Lab 7 Yeasts; Apothecial Ascomycetes I	37-40 Lab Quiz 2
	Feb. 11	Apothecial Ascomycetes (Discomycetes)	14 & 15	Lab 8 Apothecial Ascomycetes II	41-43
5	Feb. 16	Lichens: Marie Trest	16	Lab 9 Lichens	45-51 Lab Quiz 3
	Feb. 18	Exam 1	11 & 13	Lab 10 Cleistothecial Ascomycetes: Eurotiales I; Erysiphales	53-54 Lab notebook due
6	Feb. 23	Cleistothecial Ascomycetes (Plectomycetes); Deuteromycetes	11 & 13	Lab 11 Cleistothecial Ascomycetes: Eurotiales II	55-58
	Feb. 25	Perithecial Ascomycetes (Pyrenomycetes)	12	Lab 12 Perithecial Ascomycetes I	59-62
7	Mar. 1	Isolation of DNA from Fungi		Lab 13 DNA Isolation	63 Lab Quiz 4
	Mar. 3	Pseudothecial Ascomycetes (Loculoascomycetes); Asco Review	17	Lab 14 Perithecial Ascomycetes II; Pseudothecial Ascomycetes	65-68
8	Mar. 8	Medical Mycology: Keller Lab	Handout	Lab 15 Medical Mycology	69
	Mar. 10	Introduction to Basidiomycota, Jellies, Smut Fungi (Ustilaginomycotina)	18, 21 & 22	Lab 16; Jelly Fungi; Smuts	70-73
9	Mar. 15	Rust Fungi (Pucciniomycotina)	23	Lab 17 Rusts	75-78 Lab Quiz 5
	Mar. 17	Exam 2		Lab 18 Molecular Identification of Fungi/DNA Identification & Systematics Software	79 Collections 1-5 due
SPRING BREAK MARCH 19 – MARCH 27					
10	Mar. 29	Intro to Agaricoid Fungi I, Ectomycorrhizae	19.1-19.4	Lab 19 Agaric Families with Dark- colored Spores; Ectomycorrhizae	81-83
	Mar. 31	Agaricoid Fungi II	19.1-19.4	Lab 20 Agaric Anatomy & Families with Light-colored Spores	85-86 DNA report due
11	Apr. 5	Russuloid and Boletoid Basidiomycetes	19.5, 19.7	Lab 21 Russuloid & Boletoid Fungi	87-88 Lab Quiz 6
	Apr. 7	Aphylloroid Fungi I	19.6, 19.8-19.11	Lab 22 Polyporoid & Hydroid Fungi	89-91
12	Apr. 12	Aphylloroid Fungi II	19.6, 19.8-19.11	Lab 23 Corticioid, Cantharelloid & Clavarioid Fungi	93-94 Lab Quiz 7
	Apr. 14	Gasteroid Fungi (Gasteromycetes); Basidiomycota Review	20	Lab 24 Stink Horns, Birds' Nests & Puffballs	95-97
13	Apr. 19	Introduction to non-Eumycota; Mycetozoa: Myxogastriids, Protostelids	2.1-2.2, 2.4-2.5	Lab 25 Myxogastriids	99-101 Lab Quiz 8
	Apr. 21	Field trip		Lab 26 * Field Trip	102
14	Apr. 26	Mycetozoa: Dictyostelids; Rhizaria: Plasmodiophorids	2.3 3.1-3.3	Lab 27 Dictyostelids, Plasmodiophorids	103-104 Lab Quiz 9
	Apr. 28	Oomycetes: Fungal organisms?	5	Lab 28 Oomycetes: Peronosporales, Saprolegniales	105-109
15	May 3	Topics in Mycology		Lab 29 Microsporidians, open lab	110 Lab Quiz 10 Lab notebook due
	May 5	Student Presentations		Student Presentations	Collections 6-10 due

Final Exam: May 9th (Monday), 5:05 PM

*Possible field trip: Dress appropriately!

Attendance: Unless otherwise arranged and with the permission of Dr. Kabbage, attendance at all lectures and laboratories is mandatory.