

MEMORANDUM

TO:

Robert T. Dillon, Jr.

Associate Professor of Biology

FROM:

Brian McGee Mu

Provost and Executive Vice President for Academic Affairs

DATE:

February 18, 2016

SUBJECT:

Proposed Sanction and Opportunity to Persuade

Delivered via electronic mail on the date indicated above.

I have received a memorandum from Dean Auerbach, dated February 12, 2016 (hereafter, "Auerbach memorandum"), in which he recommends that you be subject to discipline under the provisions of the Faculty/Administration Manual (herafter, "FAM"; see Art. VII, Sect. B). There are two stated grounds for discipline. First, Dean Auerbach maintains that you have failed to comply with a direct order from your supervisors, even after you were told repeatedly that the order in question was necessary to assure the continued regional accreditation of the College of Charleston (hereafter, "College"). Second, Dean Auerbach concludes that you have violated a policy of the College, as the College requires that certain content be included in course syllabi and/or other materials distributed to students.

The evidence supporting Dean Auerbach's recommendation takes the form of email correspondence, beginning with an email sent to you by your Department Chair, Dr. Hillenius, on January 19, 2016, and concluding with an email sent by you to Dean Auerbach on February 11, 2016.¹ The email correspondence, in its entirety, is attached to the current memorandum. As Drs. Auerbach and Hillenius made very clear to you in those messages, the 1896 quotation you provide from Woodrow Wilson does not meet their expectations, or the College's expectations, for such course-specific learning outcomes. You were directed in four separate emails to provide such outcomes; you were given sample, satisfactory learning outcomes for a course like your own; and you were told that failure to comply with these directives would be deemed insubordination and would result in a sanction under the appropriate provisions of the FAM. Nevertheless, you

¹ Throughout this memorandum, Drs. Auerbach and Hillenius are referred to collectively as your "supervisors."

failed to comply with the directives of your supervisors, even after you were given a deadline for doing so.

I find that your email responses to Drs. Hillenius and Auerbach provided no plausible account for your noncompliance with their directives. I understand your responses to be reducible to three arguments. First, you question the importance of the task you were instructed to complete, relative to the income-tax example provided by Dr. Hillenius. Second, you assert that the complaint about your learning outcomes might only be relevant to their formatting, after which you recast the Wilson quotation as a series of bullet points, with the suggestion that the new formatting would somehow address Dean Auerbach's concerns. Third, you assert that the Wilson quotation is a wholly satisfactory statement of the learning outcomes for your course, and you then conclude that the locus of the controversy is a difference in teaching philosophies that has marked a series of disagreements between you and your supervisors during your faculty career at the College.

At no time do you suggest in your email messages of January 20, January 21, February 10, and February 11 that you have complied with the provisions of College policy or the directives of your supervisors. By your own request of Dean Auerbach on February 11 that he "prayerfully consider" his directives to you and the disciplinary consequences he had previously outlined, it is clear that you understand you have not complied with his directives.

No one is disputing your ability to include the Wilson quotation on your syllabi. As Dr. Hillenius indicated to you, the Wilson quotation could be referenced by you in explaining your teaching philosophy. However, as you previously were told, the College must have learning outcomes that are specific to this course, and Dr. Hillenius did you the courtesy of providing exemplary learning outcomes appropriate for BIOL 305L. The content, not the form, of the student learning outcomes you supplied was gravely deficient. Further, your claim that "my teaching has received poor evaluations from at least five different department chairmen, three deans, and three provosts" is not relevant to the present case. Your current conduct is the only relevant fact where the recommendation of the Auerbach memorandum is concerned.

The importance to the College of compliance with these directives was clearly explained to you by your supervisors. Nevertheless, you failed to respond in accordance with those directives.

Following a review of the totality of the evidence in this case, and in response to the recommendation of Dean Auerbach, I find your conduct in the exchanges with your supervisors to be insubordinate, with four separate and documented instances in which you expressly failed to comply with the lawful, reasonable directives of those supervisors.² You were expressly informed

² On February 11, 2016, you maintained that your conduct was not "insubordination," but "a difference of philosophy. I do not view the role of the college professor in the same way that most of my colleagues do." However, your argument misrepresents the meaning of insubordination. No one is telling you what instructional philosophy to adopt, or that you must agree with the directives of your supervisors. Instead, insubordination is the willful failure by an employee to comply with a lawful, reasonable order of a supervisor directly related to the employee's employment. Insubordination occurred in your case not when you disagreed with the directives of your supervisors, but when you

of the actions Dean Auerbach would take in response to your noncompliance, but you still failed to follow his directives, or those of your Department Chair. Consequently, I find that you have violated the College's Employee Code of Conduct, as published at College Policy 9.1.2 (Sect. A).

Because you have failed to follow College policy as stated in the FAM (see Art. VIII, Sect. A(2)) and the procedures summarized for you by your supervisors, I separately find your conduct, as documented in the exchanges with your supervisors, to have violated the Code of Professional Conduct and the Statement of Professional Ethics, as stated in the FAM, and the College's Employee Code of Conduct, as published at College Policy 9.1.2 (Sect. A). Even now, several days after the deadline for compliance announced by Dean Auerbach, I understand that you still have not modified your course syllabi in response to the directives of your supervisors.

Following your repeated and documented noncompliance with the directives of your supervisors and the policies of the College, I am now considering the imposition of a sanction in your case. Given the totality of the conduct outlined in the present memorandum, as supported by the documentary evidence made available to me, I take seriously the recommendation of the Auerbach memorandum that a significant sanction should be considered. In examining the personnel files maintained by the School of Sciences and Mathematics, I additionally note that you have previously been cautioned about or reprimanded regarding inappropriate remarks or conduct in your interactions with students or the public on three separate occasions, in 2000, 2002, and 2006.³ This documentation of your inappropriate behavior in the past also received my consideration in contemplating a possible sanction.

To be clear, no sanction has yet been imposed. Instead, I am outlining the terms of the sanction I am now considering. Specifically, after careful review and consideration, I am contemplating the following separate elements of your sanction:

• You would be suspended without pay from August 16, 2016 through December 31, 2016. Your university e-mail account would be closed and you would no longer have access to your office and laboratory, beginning on August 16, 2016; based on departmental needs, your current office and laboratory may be reassigned to another faculty member or members. The computer(s) assigned to you, as the property of the College of Charleston, would no longer be available to you during your suspension, but you would be able to request copies of specific files relative to your professional work. An electronic copy of your email files would be made for your use and provided to you. Following the conclusion of your suspension and a return to faculty status, your email account would be reactivated and provisions would be made for your access to a faculty office and other resources.

failed to comply with those directives on four separate occasions. Indeed, Drs. Auerbach and Hillenius exercised patience with you and gave you multiple opportunities to comply with their directives.

³ The relevant documents are a letter written to you by Dr. Auerbach on December 19, 2000; a memorandum written to you by Dr. Deavor on February 19, 2002; and an email written to you by Dr. Lazarro on September 28, 2006.

- Should I determine that you are to be suspended without pay beginning on August 16, 2016, you would be asked to contact Dr. Hillenius in writing, with a copy to Dean Auerbach, within three (3) working days of your receipt of the final sanction document to provide Dr. Hillenius with a list of any additional computer files you wish to have copied, to schedule a time to collect your personal and professional belongings from your office and laboratory, and to turn in any keys or key cards you may hold to the offices and buildings on campus, including buildings or space leased by the College. If you were to prefer that the personal contents of your office be packed and delivered to your residence, you could then make that request of Dr. Hillenius in writing, with a copy to Dean Auerbach. If we did not hear from you regarding the contents of the office and laboratory within three (3) days of receiving the final sanction letter, their contents would be packed and delivered to your residence. If we were to determine that there is additional College or Foundation property within your control, we would need to make arrangements for the timely return of such property.
- During your unpaid suspension, you would write no letters of reference and would not
 provide references of any sort for former or current students, unless you have the written
 permission of Dean Auerbach to do so.
- Prior to the onset of your unpaid suspension, you would not be eligible for any instructional assignment or other paid College of Charleston work during the 2016 summer terms.
- For the duration of your unpaid suspension, you would be barred from campus, including
 property leased by the College, with exceptions to be approved in advance. At our sole
 discretion, the Dean or I may require that you be escorted by Public Safety while you are
 present on property owned or leased by the College.
- Following the conclusion of your suspension, you would not be eligible to serve as an instructor of record during the 2017 Spring Semester or 2017 summer terms. Your faculty assignments during the 2017 Spring Semester and summer terms would be limited to non-instructional administrative and research duties and/or to work as a non-instructor of record, consistent with the needs of your academic department, as determined by the Dean and the Department Chair.
- After the 2017 summer terms, you may resume your duties as an instructor of record only if you submit your syllabi to your Department Chair, prior to the first day of classes for the relevant academic term and on a schedule to be determined by the Chair. Before permitting you to perform as an instructor of record in one or more course sections in an academic term, or to distribute syllabi to students, your Chair must certify to Dean Auerbach in writing that your syllabi for each course section comply with all applicable institutional policies and directives. The requirement for the Chair's review and approval of your syllabi will remain in place for two academic semesters following resumption of your duties as an instructor of record. Your failure to produce syllabi by the announced

deadline that are deemed compliant with the College's policies and directives would be grounds for further disciplinary action against you, up to and including termination.

Consistent with the terms of the FAM, you now have the opportunity to persuade me that one or more of the terms of the sanction being considered should not be imposed. Should you choose to avail yourself of this opportunity, I must receive your attempt at persuasion, in writing, no later than the close of business on Thursday, February 25, 2016. Following that date, and following consideration of the available evidence and other relevant materials, I would then provide you notice of the sanction, if any, that is being imposed.

I remind you that, should I notify you of the imposition of a sanction, you would then have the option to appeal to either the Faculty Grievance Committee or the Faculty Hearing Committee, depending on the nature of the grievance claim you choose to make. However, the sanction would take effect immediately following your receipt of my memorandum.

While awaiting my final determination of your sanction, and consistent with my authority, as described in the FAM (Art. VII, Sect. B(2)), I have decided that you will be assigned to new duties with pay, effective immediately. The specific nature of these duties will be non-instructional in nature and shall consist of the following: Under the supervision of your Department Chair and Dean, you will continue such research and professional development activities as are appropriate to your faculty position. Your teaching and service duties for the remainder of the 2016 Spring Semester shall be immediately assumed by others, until such time as you receive further written instructions from me.

Until further notice, and effective immediately, you must comply with the following conditions while assigned to new duties:

- You shall express neither oral nor written opinions regarding the skills, abilities, or
 employment suitability of any of your former or current students unless you receive express
 written permission to do so from Dean Auerbach and, further, should Dean Auerbach
 permit you to write any letter of reference for a former or current student, a copy of that
 letter must be provided to your dean and to me, prior to the release of the letter.
- You shall assist Dr. Hillenius and other employees of the Department of Biology and the College in the transfer of your instructional duties for the current semester to another faculty colleague, with all course records and other materials to be timely provided to that colleague.

If you violate one or more of these conditions, such conduct shall constitute an independent violation of College policies and procedures, and you shall be subject to serious sanctions.

If questioned about your change in duties during the current semester, the College will respond that you have undertaken research duties for the School of Sciences and Mathematics. It is recommended that you respond in like manner. As explained in the Faculty/Administration Manual, assignment to new duties is not a sanction.

Consistent with the provisions of the "Operating Procedures for Processing Initial Complaints Against Faculty and Administrators and Staff" (hereafter, "Operating Procedures"), I am directing that three faculty not appointed in the School of Sciences and Mathematics shall make up a "disinterested investigative review panel." The review panel shall investigate the allegation that you have violated the Code of Professional Conduct and the Statement of Professional Ethics. The investigation and report regarding the results of the investigation will proceed in accordance with the provisions of the Operating Procedures. You will be contacted by the Chair of the review panel in the next few days. The review panel will not be considering the allegation that you have violated College Policy 9.1.2 (Sect. A).

Please let me know in writing if you have any questions about this memorandum.

cc:

Michael Auerbach, Dean, School of Sciences and Mathematics Jaap Hillenius, Chair, Department of Biology Ed Pope, Vice President for Human Resources

⁴ The Operating Procedures are published as an attachment to College Policy 9.1.10, which is available at policy.cofc.edu.



SCHOOL OF SCIENCES AND MATHEMATICS

Michael Auerbach
Dean
auerbachmj@cofc.edu
843-953-5991

12 February 2016

MEMORANDUM

To: Dr. Brian McGee, Provost

From: Mike Auerbach, Dean, SSM

Re: Dr. Robert Dillon, Non-Compliant Syllabus

A recent audit of syllabi in the Department of Biology revealed that the syllabus for BIOL 305L, Genetics Lab, taught by Dr. Robert Dillon, Associate Professor of Biology, was not in compliance with SACSCOC standards or College Policy. The syllabus was missing acceptable course learning outcomes, with a quote from Woodrow Wilson serving as an unacceptable substitute. Dr. Dillon's chair, Dr. Jaap Hillenius, has on several recent occasions asked Dr. Dillon to replace the quote with acceptable learning outcomes. Dr. Dillon has refused to do so.

On Tuesday, February 9, 2016, I wrote to Dr. Dillon and re-iterated that every syllabus for every course required learning outcomes that were approved by the cognizant department chair. I also reminded him that the College had an official policy on structure of syllabi that included learning outcomes as a required component. Finally, I stressed that our accreditor, SACSCOC, required approved learning outcomes on syllabi and that we were currently in the midst of our reaffirmation process and needed to be able to demonstrate compliance with this standard. I gave Dr. Dillon until 5pm on Friday, February 12, 2016 to produce a syllabus with learning outcomes that were deemed acceptable by his chair.

The deadline I imposed for receipt of an acceptable syllabus has now passed. In addition, an email I received from Dr. Dillon on 11 February 2012 made it clear that he was not going to furnish any syllabus beyond what he had already provided. In my opinion, Dr. Dillon's refusal to abide by formal College policy and standards imposed by our accreditor, as well as his refusal to follow direct requests from his chair and his dean represents a violation of the Code of Professional Conduct and the Statement of Professional Ethics detailed in the College's Faculty & Administration Manual (FAM). Consequently, in my opinion, this insubordination should result in a sanction as detailed in Article VII, Section B of the FAM. Given the flagrant nature of the refusal to comply with policy and requests from supervisors, and the harmful position this places the College in with respect to its accreditation body, I recommend that the sanction not be an oral or written reprimand. Instead, I recommend something more severe.

McGee, Brian

From:

Dillon, Robert T

Sent:

Thursday, February 11, 2016 8:09 AM

To:

Auerbach, Mike

Cc:

McGee, Brian; Deavor, James; Hillenius, Willem Jacob

Subject:

RE: Learning Outcomes On Syllabus

Dear Mike,

I am sorry that you found my response unsatisfactory. I can only reiterate that the course (as I teach it) is designed to address the learning outcomes, as they are currently stated on my syllabus. It is true that the language was not crafted by myself personally. I admit that I have adopted sentiments stated more beautifully than I myself could ever have stated them. Bullet point #4 comes from Psalm 90, a prayer of Moses, the Man of God. I cannot do better than that, and would not profane the source to try.

Yes, I understand that the learning outcomes for my courses do not meet the expectations of my supervisor. They rarely have, in my entire 34 year career. My teaching has received poor evaluations from at least five different department chairmen, three deans, and three provosts.

But I do not think this is insubordination. I think it is a difference of philosophy. I do not view the role of the college professor in the same way that most of my colleagues do, or any of my bosses ever have. But surely you would not suggest that Woodrow Wilson's philosophy of higher education is suddenly insubordinate after 34 years, because it is held by the minority, or because you personally disagree with it, I trust?

Please do prayerfully consider!

Dr. Robert T. Dillon, Jr.
Department of Biology, College of Charleston
Charleston, SC 29424
Voice 843-953-8087, Fax 843-953-5453
DillonR<at>cofc<dot>edu
http://dillonr.people.cofc.edu/home.html

From: Auerbach, Mike

Sent: Wednesday, February 10, 2016 11:32 AM

To: Dillon, Robert T

Cc: McGee, Brian; Deavor, James; Hillenius, Willem Jacob

Subject: RE: Learning Outcomes On Syllabus

Dear Rob,

Your response below is unsatisfactory because you have not furnished learning outcomes that were crafted by you, address the course you are teaching, and meet the expectations of your supervisor. You have been advised repeatedly of the attributes of acceptable learning outcomes and your chair has even provided examples. Thus, I am re-iterating

my request that you provide satisfactory learning outcomes as determined by your chair by my original deadline of COB, Friday, February 12, 2016.

Noncompliance by this deadline will be deemed to be a violation of the Code of Professional Conduct and the Statement of Professional Ethics. Consequently, you would receive a sanction as detailed in Article VII, Section B of the FAM.

Cordially, Mike

Mike Auerbach, Dean School of Sciences & Mathematics College of Charleston 843-953-5991 auerbachmj@cofc.edu

US Mail Address: 66 George Street, Charleston, SC 29424

Physical Address for Visitors, UPS/FedEx, etc.: 202 Calhoun Street, Room 130, Charleston, SC 29401

From: Dillon, Robert T

Sent: Wednesday, February 10, 2016 8:09 AM

To: Auerbach, Mike

Cc: Hillenius, Willem Jacob; Deavor, James; McGee, Brian

Subject: RE: Learning Outcomes On Syllabus

Dear Mike,

As I indicated in my correspondence with Jaap, I have honestly endeavored to state the learning outcomes for Genetics Lab 305L on my syllabus as clearly as I can. **Perhaps the problem is one of formatting?** Perhaps it would help if I divided my little selection of Woodrow Wilson's (1896) address into a list of discrete bullet points?

See attached, Rob

<< File: 305LS16-syl-draft10Feb16.docx >>

Dr. Robert T. Dillon, Jr.

Department of Biology, College of Charleston

Charleston, SC 29424

Voice 843-953-8087, Fax 843-953-5453

DillonR<at>cofc<dot>edu

http://dillonr.people.cofc.edu/home.html

From: Auerbach, Mike

Sent: Tuesday, February 09, 2016 3:50 PM **To:** Dillon, Robert T < <u>DillonR@cofc.edu</u>>

Cc: Hillenius, Willem Jacob < Hillenius W@cofc.edu >; Deavor, James < Deavor J@cofc.edu >; McGee, Brian

<McgeeB@cofc.edu>

Genetics Lab 305L Course Policy, Spring 2016

Four Sections - Monday L01, Tuesday afternoon L02, Tuesday evening L03, Wednesday L04.

R. T. Dillon (SCRA Innovation Center, 645 Meeting Street) 953-8087, DillonR@cofc.edu

- 1. <u>Catalog Description</u> An introduction to the principles of heredity using common experimental organisms. Recent techniques in molecular genetics are also covered. Biology 211 and 211D (Biodiversity) is a prerequisite, and Genetics Lecture 305 is a pre-requisite or co-requisite. Math 250 (Statistical Methods) is a prerequisite for all 300-level biology classes.
- 2. Explicit Learning Outcomes (From Woodrow Wilson, 1896):
 - The student will be able to discern the right thought of the world, the thought which the world has tested and established, the principles which have stood through the seasons and become at length part of the immemorial wisdom of the race.
 - The student's mind will be drawn into a proper adjustment with the physical and social world in which it has its life and development. It will be enlightened, strengthened and made fit.
 - The student will understand that the business of the world is not individual success, but rather its own betterment, strengthening, and growth in spiritual insight.
 - The student will number his days, so that he may apply his heart unto wisdom.
- 3. The Genetics Laboratory (Relocated to SSMB 141 during the renovation) is open essentially every day during regular school hours, although the labs for several other courses are sharing our same space. So if you need to work in the lab at some time other than assigned for your class, please be respectful. I will have "office hours" in SSMB 141 on Monday & Wednesday 1-2:00 PM, and Tuesday 12:15-1:15 PM, and will certainly be present at many other times as well, but it is always best to make an appointment.
- 4. <u>Lab Manual</u> is available from the College Bookstore. Please read the introduction and be familiar with each investigation before coming to class. You will also find it helpful to review the relevant sections of your textbook.
- 5. Attendance. You are expected to do your share of the work. Many of the investigations (especially the fruit fly ones) can get tedious, and it is unfair to expect your lab partner to do all the work if you miss a class. So if you're sick, please call 953-8087 or email dillonr@cofc.edu ASAP so arrangements can be made. Some of the investigations may be impossible to make up, although you can get the data later.
- 6. <u>Lab reports</u> are variably-formatted. There will be questions to answer and analyses to perform after each exercise. You must work closely with your lab partner to gather data for most lab reports, but **please think independently.** Everyone should submit his <u>own</u> report with his <u>own</u> data analysis. Reports are due one week after the completion of the investigation, unless noted later in this packet. Reports not submitted promptly at the **start of class** are late, and will be marked off 50%. If you are sick, send me your lab report by email or by courier. You have a week-long "grace period" in which to submit your report for half credit, but lab reports will not be accepted thereafter.
- 7. <u>Practical quizzes</u> do not consume the entire class period and are not comprehensive. Nevertheless, the same policy pertains in lab and lecture. Contact me ASAP if you must miss a quiz. Regardless of your excuse, the later the make-up, the harder the test.
- 8. You will need a <u>calculator</u> for this course. A smart phone will not suffice. No smart phones or any other device that may be connected to the internet will be allowed during quizzes.
- 9. Watch the <u>Genetics Lab website</u> for "News, Announcements, and Reminders" as the semester proceeds: http://dillonr.people.cofc.edu/genelab.htm

Among the many useful resources available from the course site is a pdf download entitled, "Dr. Dillon's Teaching Philosophy."

Monday Schedule, Spring 2016 Genetics Lab 305.L01 R. T. Dillon

Date	Investigations and Exercises	Readings		
Jan 11	Introduction	-		
Jan 18	MLK Day, no classes	-		
Jan 25	Inv. 1, Probability & Statistics	56-57, 64-66		
Feb 1	 Inv. 3, Drosophila familiarization Inv. 4, Set up two experiments with the "Lobed" gene: - A comparison of variation in expressivity due to genetics and environment ("expressivity") - Incomplete penetrance in a monohybrid cross ("penetrance") 	126-127		
Feb 8	Inv. 2, Independent assortment and gene interaction in maize Inv. 5, Set up selection & drift experiments ("S&D") Clear penetrance & expressivity experiments	59-62, 110-115		
Feb 15	Analysis of variable expressivity Inv. 6, Set up trihybrid cross for gene mapping experiment ("THC") Clear S&D experiments	180-186		
Feb 22	Count & transfer F1 from S&D experiments Clear penetrance experiment Clear parentals from THC	-		
Feb 29	Analysis of incomplete penetrance in a monohybrid cross Make THC test cross Clear S&D experiments	-		
Mar 7	Spring Break Instructor will clear F1 from THC	-		
Mar 14	Lab Quiz Count & transfer F2 from S&D experiments	-		
Mar 21	Inv. 6, Linkage analysis Clear S&D experiments	-		
Mar 28	Inv. 7, Human cytogenetics Count & transfer F3 from S&D experiments	222-227		
Apr 4	Inv. 8, Chromatography Clear S&D experiments	412-15		
Apr 11	Inv. 9, Protein electrophoresis	716-23, 746-7		
Apr 18	Count F4 and terminate S&D experiments Selection and genetic drift	728-732		
Apr 21	(Thursday!) Lab Quiz	-		

Tuesday Schedule, Spring 2016 Genetics Lab 305.L02 & L03 R. T. Dillon

Date	Investigations and Exercises	Readings		
Jan 12	Introduction	-		
Jan 19	Inv. 1, Probability & Statistics	56-57, 64-66		
Jan 26	 Inv. 3, Drosophila familiarization Inv. 4, Set up two experiments with the "Lobed" gene: - A comparison of variation in expressivity due to genetics and environment ("expressivity") - Incomplete penetrance in a monohybrid cross ("penetrance") 	126-127		
Feb 2	Inv. 2, Independent assortment and gene interaction in maize Inv. 5, Set up selection & drift experiments ("S&D") Clear penetrance & expressivity experiments	59-62, 110-115		
Feb 9	Analysis of variable expressivity Inv. 6, Set up trihybrid cross for gene mapping experiment ("THC") Clear S&D experiments	180-186		
Feb 16	Count & transfer F1 from S&D experiments Clear penetrance experiment Clear parentals from THC	-		
Feb 23	Analysis of incomplete penetrance in a monohybrid cross Make THC test cross Clear S&D experiments	-		
Mar 1	Lab Quiz Clear F1 from THC Count & transfer F2 from S&D experiments	-		
Mar 8	Spring Break Instructor will clear S&D experiments	-		
Mar 15	Linkage analysis	-		
Mar 22	Inv. 7, Human cytogenetics Count & transfer F3 from S&D experiments	222-227		
Mar 29	Inv. 8, Chromatography Clear S&D experiments	412-15		
Apr 5	Inv. 9, Protein electrophoresis	716-23, 746-7		
Apr 12	Count F4 and terminate S&D experiments Selection and genetic drift	728-732		
Apr 19	Lab Quiz	-		

Wednesday Schedule, Spring 2016 Genetics Lab 305.L04 R. T. Dillon

Date	Investigations and Exercises	Readings		
Jan 13	Introduction	-		
Jan 20	Inv. 1, Probability & Statistics	56-57, 64-66		
Jan 27	 Inv. 3, Drosophila familiarization Inv. 4, Set up two experiments with the "Lobed" gene: - A comparison of variation in expressivity due to genetics and environment ("expressivity") - Incomplete penetrance in a monohybrid cross ("penetrance") 	126-127		
Feb 3	Inv. 2, Independent assortment and gene interaction in maize Inv. 5, Set up selection & drift experiments ("S&D") Clear penetrance & expressivity experiments	59-62, 110-115		
Feb 10	Analysis of variable expressivity Inv. 6, Set up trihybrid cross for gene mapping experiment ("THC") Clear S&D experiments	180-186		
Feb 17	Count & transfer F1 from S&D experiments Clear penetrance experiment Clear parentals from THC	-		
Feb 24	Analysis of incomplete penetrance in a monohybrid cross Make THC test cross Clear S&D experiments	-		
Mar 2	Lab Quiz Clear F1 from THC Count & transfer F2 from S&D experiments	-		
Mar 9	Spring Break Instructor will clear S&D experiments	-		
Mar 16	Linkage analysis	-		
Mar 23	Inv. 7, Human cytogenetics Count & transfer F3 from S&D experiments	222-227		
Mar 30	Inv. 8, Chromatography Clear S&D experiments	412-15		
Apr 6	Inv. 9, Protein electrophoresis	716-23, 746-7		
Apr 13	Count F4 and terminate S&D experiments Selection and genetic drift	728-732		
Apr 20	Lab Quiz	[-		

COURSE GRADING, Spring 2016

LAB REPORT	Due date for Monday.L01	Due date for Tuesday.L02 & L03	Due Date for Wednesday.L04	POINTS	TOTALS
1. Probability and Statistics	Feb 1	Jan 26	Jan 27	8	
2. Drosophila familiarization	Feb 1	Jan 26	Jan 27	5	
3. Dihybrid crosses in corn	Feb 15	Feb 9	Feb 10	8	
4a. Variable expressivity	Feb 22	Feb 16	Feb 17	6	
4b. Incomplete penetrance	Mar 14	Mar 1	Mar 2	8	
6. Chromosome mapping	Apr 28	Mar 22	Apr 23	12	
7. Human cytogenetics	Apr 4	Mar 29	Mar 30	12	
8. Chromatography of eye pigments	Apr 11	Apr 5	Apr 6	10	
9. Protein electrophoresis	Apr 21	Apr 19	Apr 20	12	
5. Selection and genetic drift	Apr 27	Apr 27	Apr 27	24	
TOTAL for lab reports					105
LAB EXAMS, two @ 40 pts ea.					80
Lab performance					15
COURSE TOTAL					200

Subject: Death, taxes, and SLOs?

Date: Thursday, January 21, 2016 10:09:14 PM ET

From: Dillon, Robert T

To: Hillenius, Willem Jacob

CC: Deavor, James

Dear Jaap,

Surely you must be joking? Or exaggerating to render emphatic a point otherwise weak?

We are obligated to file our tax returns by rule of law. If we do not do so, we go to jail. Surely you do not mean to suggest that generating "student learning objectives" is as important as filing our taxes?

Please re-assure me! Rob

Dr. Robert T. Dillon, Jr.

Department of Biology, College of Charleston

Charleston, SC 29424

Voice 843-953-8087, Fax 843-953-5453

DillonR<at>cofc<dot>edu

http://dillonr.people.cofc.edu/home.html

From: Hillenius, Willem Jacob

Sent: Thursday, January 21, 2016 1:53 PM

To: Dillon, Robert T **Cc:** Deavor, James

Subject: Re: Student Learning Outcome

Dear Rob,

While your Explicit Learning Outcome for BIOL 305L may be a fine overall course philosophy (see below), it does not the minimum requirements for student learning outcomes (SLOs) in a university course.

2. Explicit Learning Outcome — "It is the business of a University to impart to the rank and file it trains the right thought of the world, the thought which it has tested and established, the princ stood through the seasons and become at length part of the immemorial wisdom of the race. The education is not merely to draw out the powers of the individual mind: it is rather its right object to a proper adjustment to the physical and social world in which they are to have their life and to enlighten, strengthen and make fit. The business of the world is not individual success, but i strengthening, and growth in spiritual insight— 'So teach us to number our days, that we may as wisdom' is its right prayer and aspiration." Woodrow Wilson, 1896.

Below are two examples for genetics lab courses taught elsewhere.

EXAMPLE 1. Learning Outcomes in the Laboratory: Specifically you will be able to...

- 1. Perform hands-on laboratory skills related to genetics such as gel electrophoresis, DNA manipulation, microscopy, forensics, gene mapping, enzyme assays, and spectrophotometry.
- 2. Analyze and interpret the data collected in the laboratory experiments
- 3. Communicate and present on a topic related to genetics
- 4. Identify and discuss controversial and ethical issues related to genetics
- 5. Graph data in excel software

EXAMPLE 2. STUDENT LEARNING OUTCOMES FOR THIS COURSE As a result of successfully completing this course, the student will be able to do the following:

- 1. Manipulate *Drosophila melanogaster* (the fruit fly) as a genetic research organism.
- 2. Demonstrate classic Mendelian laws governing monohybrid and dihybrid inheritance.
- 3. Explain the use and role of fungi, bacteria, and viruses (bacteriophages) in genetic research.
- 4. Utilize the Hardy-Weinberg Equation for solving population genetic problems.
- 5. Collect, analyze, and interpret experimental data upon which to draw sound scientific conclusions in a scientifically written paper.
- 6. Demonstrate sound safety procedures within a molecular genetics laboratory.
- 7. Demonstrate molecular genetic techniques including PCR, gel electrophoresis, restriction enzyme digestion and mapping, DNA ligations, transformations, plasmid isolation, and DNA fingerprinting.

You are free to develop SLOs particular to your course, but a set of five to eight SLOs must be generated.

Realizing all of our days are numbered and our hearts should be applying themselves to wisdom, there are some things we must do (e.g. file an IRS 1040- by April 15 each year). And according to our employer, this task of writing SLOs must be done. If you need assistance in writing these I will be glad to answer questions that you might have.

Cheers, Jaap

Jaap Hillenius Professor & Chair Department of Biology College of Charleston 66 George Street Charleston, SC 29424 USA

T: (843) 953-5504 F: (843) 953-5453 E: <u>hilleniusw@cofc.edu</u>

From: "Dillon, Robert T" < DillonR@cofc.edu>

Subject: RE: Student Learning Outcome

Date: Wednesday, January 20, 2016 11:51:05 AM ET

From: Dillon, Robert T

To: Hillenius, Willem Jacob

Dear Jaap,

The learning outcome as stated on my Genetics 305L syllabus is as explicit as it can possibly be. And "the principles which have stood through the seasons and become at length part of the immemorial wisdom of the race" have not changed from 1896 to present.

How many days are you guaranteed on this earth, Jaap? Are "SACSCOC guidelines" the best application of your heart? Please carefully consider! Rob

Dr. Robert T. Dillon, Jr.

Department of Biology, College of Charleston
Charleston, SC 29424

Voice 843-953-8087, Fax 843-953-5453

DillonR<at>cofc<dot>edu
http://dillonr.people.cofc.edu/home.html

From: Hillenius, Willem Jacob

Sent: Tuesday, January 19, 2016 6:04 PM
To: Dillon, Robert T < DillonR@cofc.edu>
Subject: Student Learning Outcome

Hi Rob,

The student learning outcome statement on your Biol 305L syllabus does not meet the SACSCOC guidelines. Although the quote from Woodrow Wilson is lofty, it is not very specific. It also dates from 1896, and genetics has come a long way since then. Please include a brief list of student learning outcomes based on the content of your course, and send me a copy of the amended syllabus.

Thanks, Jaap

Jaap Hillenius Professor & Chair Department of Biology College of Charleston 66 George Street Charleston, SC 29424

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Genetics Lab 305L Course Policy, Spring 2016

Four Sections - Monday L01, Tuesday afternoon L02, Tuesday evening L03, Wednesday L04

R. T. Dillon (SCRA Innovation Center, 645 Meeting Street) 953-8087, DillonR@cofc.edu

- 1. <u>Catalog Description</u> An introduction to the principles of heredity using common experimental organisms. Recent techniques in molecular genetics are also covered. Biology 211 and 211D (Biodiversity) is a prerequisite, and Genetics Lecture 305 is a pre-requisite or co-requisite. Math 250 (Statistical Methods) is a prerequisite for all 300-level biology classes.
- 2. Explicit Learning Outcome "It is the business of a University to impart to the rank and file of the men whom it trains the right thought of the world, the thought which it has tested and established, the principles which have stood through the seasons and become at length part of the immemorial wisdom of the race. The object of education is not merely to draw out the powers of the individual mind: it is rather its right object to draw all minds to a proper adjustment to the physical and social world in which they are to have their life and their development: to enlighten, strengthen and make fit. The business of the world is not individual success, but its own betterment, strengthening, and growth in spiritual insight— 'So teach us to number our days, that we may apply our hearts unto wisdom' is its right prayer and aspiration." Woodrow Wilson, 1896.
- 3. The Genetics Laboratory (Relocated to SSMB 141 during the renovation) is open essentially every day during regular school hours, although the labs for several other courses are sharing our same space. So if you need to work in the lab at some time other than assigned for your class, please be respectful. I will have "office hours" in SSMB 141 on Monday & Wednesday 1 2:00 PM, and Tuesday 12:15 1:15 PM, and will certainly be present at many other times as well, but it is always best to make an appointment.
- 4. <u>Lab Manual</u> is available from the College Bookstore. Please read the introduction and be familiar with each investigation before coming to class. You will also find it helpful to review the relevant sections of your textbook.
- 5. Attendance. You are expected to do your share of the work. Many of the investigations (especially the fruit fly ones) can get tedious, and it is unfair to expect your lab partner to do all the work if you miss a class. So if you're sick, please call 953-8087 or email <u>dillonr@cofc.edu</u> ASAP so arrangements can be made. Some of the investigations may be impossible to make up, although you can get the data later.
- 6. <u>Lab reports</u> are variably-formatted. There will be questions to answer and analyses to perform after each exercise. You must work closely with your lab partner to gather data for most lab reports, but **please think independently.** Everyone should submit his <u>own</u> report with his <u>own</u> data analysis. Reports are due one week after the completion of the investigation, unless noted below. Reports not submitted promptly at the start of class are late, and will be marked off 50%. If you are sick, send me your lab report by email or by courier. You have a week-long "grace period" in which to submit your report for half credit, but lab reports will not be accepted thereafter.
- 7. <u>Practical quizzes</u> do not consume the entire class period and are not comprehensive. Nevertheless, the same policy pertains in lab and lecture. Contact me ASAP if you must miss a quiz. Regardless of your excuse, the later the make-up, the harder the test.
- 8. You will need a **calculator** for this course. A smart phone will not suffice. No smart phones or any other device that may be connected to the internet will be allowed during quizzes.
- 9. Watch the <u>Genetics Lab website</u> for "News, Announcements, and Reminders" as the semester proceeds: http://dillonr.people.cofc.edu/genelab.htm

Among the many useful resources available from the course site is a pdf download entitled, "Dr. Dillon's Teaching Philosophy."

Wednesday Schedule, Spring 2016 Genetics Lab 305.L04 R. T. Dillon

Date	Investigations and Exercises	Readings	
Jan 13	Introduction		
Jan 20	Inv. 1, Probability & Statistics	56-57, 64-66	
Jan 27	 Inv. 3, Drosophila familiarization Inv. 4, Set up two experiments with the "Lobed" gene: - A comparison of variation in expressivity due to genetics and environment ("expressivity") - Incomplete penetrance in a monohybrid cross ("penetrance") 	126-127	
Feb 3	Inv. 2, Independent assortment and gene interaction in maize Inv. 5, Set up selection & drift experiments ("S&D") Clear penetrance & expressivity experiments	59-62, 110-115	
Feb 10	Analysis of variable expressivity Inv. 6, Set up trihybrid cross for gene mapping experiment ("THC") Clear S&D experiments	180-186	
Feb 17	Count & transfer F1 from S&D experiments Clear penetrance experiment Clear parentals from THC	-	
Feb 24	Analysis of incomplete penetrance in a monohybrid cross Make THC test cross Clear S&D experiments	-	
Mar 2	Lab Quiz Clear F1 from THC Count & transfer F2 from S&D experiments	-	
Mar 9	Spring Break Instructor will clear S&D experiments	-	
Mar 16	Linkage analysis	-	
Mar 23	Inv. 7, Human cytogenetics Count & transfer F3 from S&D experiments	222-227	
Mar 30	Inv. 8, Chromatography Clear S&D experiments	412-15	
Apr 6	Inv. 9, Protein electrophoresis	716-23, 746-7	
Apr 13	Count F4 and terminate S&D experiments Selection and genetic drift	728-732	
Apr 20	Lab Quiz	7.	

COURSE GRADING, Spring 2016

LAB REPORT	A NEW YORK WITH THE PARTY AND RESIDENCE AND	Due date for Tuesday.L02 & L03	Due Date for Wednesday.L04	POINTS	TOTALS
1. Probability and Statistics	Feb 1	Jan 26	Jan 27	8	
2. Drosophila familiarization	Feb 1	Jan 26	Jan 27	5	
3. Dihybrid crosses in corn	Feb 15	Feb 9	Feb 10	8	
4a. Variable expressivity	Feb 22	Feb 16	Feb 17	6	
4b. Incomplete penetrance	Mar 14	Mar 1	Mar 2	8	
6. Chromosome mapping	Apr 28	Mar 22	Apr 23	12	
7. Human cytogenetics	Apr 4	Mar 29	Mar 30	12	
8. Chromatography of eye pigments	Apr 11	Apr 5	Apr 6	10	
9. Protein electrophoresis	Apr 21	Apr 19	Apr 20	12	
5. Selection and genetic drift	Apr 27	Apr 27	Apr 27	24	
TOTAL for lab reports					105
LAB EXAMS, two @ 40 pts ea.					80
Lab performance					15
COURSE TOTAL					200