

Revised  
5/22/2015

Submit original with signatures + 1 copy + electronic copy to Faculty Senate (Box 7500).  
See <http://www.uaf.edu/uafgov/faculty-senate/curriculum/course-degree-procedures/> for a complete description of the rules governing curriculum & course changes.

**TRIAL COURSE OR NEW COURSE PROPOSAL**

**SUBMITTED BY:**

Department	Veterinary Medicine	College/School	CNSM
Prepared by	Cathy Griseto	Phone	474-1928
Email Contact	<a href="mailto:cagriseto@alaska.edu">cagriseto@alaska.edu</a>	Faculty Contact	Mike Harris & Arleigh Reynolds, Assoc Dean Vet Med

**1. ACTION DESIRED**

(CHECK ONE):

Trial Course

New Course

X

**2. COURSE IDENTIFICATION:**

Dept

DVM

Course #

619

No. of Credits

4

Justify upper/lower division status & number of credits:

Professional Program required course – see CSU syllabus attached

**3. PROPOSED COURSE TITLE:**

Veterinary Neurobiology

**4. To be CROSS LISTED?**  
YES/NO

NO

If yes, Dept:

Course #

NOTE: Cross-listing requires approval of both departments and deans involved. Add lines at end of form for additional required signatures.

**5. To be STACKED?**  
YES/NO

NO

If yes, Dept:

Course #

How will the two course levels differ from each other? How will each be taught at the appropriate level?:

Stacked course applications are reviewed by the (Undergraduate) Curricular Review Committee and by the Graduate Academic and Advising Committee. Creating two different syllabi—undergraduate and graduate versions—will help emphasize the different qualities of what are supposed to be two different courses. The committees will determine: 1) whether the two versions are sufficiently different (i.e. is there undergraduate and graduate level content being offered); 2) are undergraduates being overtaxed?; 3) are graduate students being undertaxed? In this context, the committees are looking out for the interests of the students taking the course. Typically, if either committee has qualms, they both do. More info online – see URL at top of this page.

**6. FREQUENCY OF OFFERING:**

Spring each year

Fall, Spring, Summer (Every, or Even-numbered Years, or Odd-numbered Years) — or As Demand Warrants

**7. SEMESTER & YEAR OF FIRST OFFERING**

(AY2013-14 if approved by 3/1/2013; otherwise AY2014-15)

AY2015-2016

**8. COURSE FORMAT:**

NOTE: Course hours may not be compressed into fewer than three days per credit. Any course compressed into fewer than six weeks must be approved by the college or school's curriculum council. Furthermore, any core course compressed to less than six weeks must be approved by the Core Review Committee.

COURSE FORMAT:  
(check all that apply)

1

2

3

4

5

X

6 weeks to full semester

OTHER FORMAT (specify)

Mode of delivery (specify lecture, field trips, labs, etc)

Lecture and Lab

**9. CONTACT HOURS PER WEEK:**

3

LECTURE  
hours/week

3

LAB  
hours /week

0

PRACTICUM  
hours /week

Note: # of credits are based on contact hours. 800 minutes of lecture=1 credit. 2400 minutes of lab in a science course=1 credit. 1600 minutes in non-science lab=1 credit. 2400-4800 minutes of practicum=1 credit. 2400-8000 minutes of internship=1 credit. This must match with the syllabus. See <http://www.uaf.edu/uafgov/faculty-senate/curriculum/course-degree-procedures/guidelines-for-computing/> for more information on number of credits.

OTHER HOURS (specify type)

10. **COMPLETE CATALOG DESCRIPTION** including dept., number, title, credits, credit distribution, cross-listings and/or stacking (50 words or less if possible):

Example of a complete description:

FISH F487 W, O Fisheries Management

3 Credits Offered Spring

Theory and practice of fisheries management, with an emphasis on strategies utilized for the management of freshwater and marine fisheries. *Prerequisites:* COMM F131X or COMM F141X; ENGL F111X; ENGL F211X or ENGL F213X; ENGL F414; FISH F425; or permission of instructor. Cross-listed with NRM F487. (3+0)

**DVM 619 Department of Veterinary Medicine**

**4 (3+3) Credit Offered Spring**

**Veterinary Neurobiology**

Learn information on neurologic conditions in domesticated. A problem-oriented approach makes it easy to diagnose and treat neurologic problems in domesticated animals. The coverage of disorders by problem, not by established disease diagnosis, emulates how animals present to the veterinary hospital and simplifies the formulation of a correct diagnosis.

**Pre-requisites: Successful completion of first Semester Veterinary Courses**

11. **COURSE CLASSIFICATIONS:** Undergraduate courses only. Consult with CLA Curriculum Council to apply S or H classification appropriately; otherwise leave fields blank.

H = Humanities

S = Social Sciences

Will this course be used to fulfill a requirement for the baccalaureate core? If YES, attach form.

YES:

NO:

x

If YES, check which core requirements it could be used to fulfill:

O = Oral Intensive, Format 6

W = Writing Intensive, Format 7

X = Baccalaureate Core

11.A Is course content related to northern, arctic or circumpolar studies? If yes, a

"snowflake" symbol will be added in the printed Catalog, and flagged in Banner.

YES

NO

x

12. **COURSE REPEATABILITY:**

Is this course repeatable for credit?

YES

NO

x

Justification: Indicate why the course can be repeated (for example, the course follows a different theme each time).

How many times may the course be repeated for credit?

TIMES

If the course can be repeated for credit, what is the maximum number of credit hours that may be earned for this course?

CREDITS

If the course can be repeated with variable credit, what is the maximum number of credit hours that may be earned for this course?

CREDITS

13. **GRADING SYSTEM:** Specify only one. Note: Changing the grading system for a course later on constitutes a Major Course Change – Format 2 form.

LETTER:

x

PASS/FAIL:

**RESTRICTIONS ON ENROLLMENT (if any)**

14. **PREREQUISITES**

Acceptance in Professional Veterinary Medical Program or permission of instructor

These will be required before the student is allowed to enroll in the course.

15. **SPECIAL RESTRICTIONS, CONDITIONS**

Professional Veterinary Medical program student or permission of instructor

16. **PROPOSED COURSE FEES**

TBD

Has a memo been submitted through your dean to the Provost for fee approval?

Yes/No

Yes



**17. PREVIOUS HISTORY**

Has the course been offered as special topics or trial course previously?

Yes/No

No

If yes, give semester, year, course #, etc.:

**18. ESTIMATED IMPACT**

WHAT IMPACT, IF ANY, WILL THIS HAVE ON BUDGET, FACILITIES/SPACE, FACULTY, ETC.

Professional Program approved by BOR, Chancellor and Provost – Impact on Animal Resource Center in year one depending upon renovation completion.

**19. LIBRARY COLLECTIONS**

Have you contacted the library collection development officer (kljensen@alaska.edu, 474-6695) with regard to the adequacy of library/media collections, equipment, and services available for the proposed course? If so, give date of contact and resolution. If not, explain why not.

No

x

Yes

Department will keep complete library of required course materials in AHRB office. Additional resources are available through the UAF library as per current catalogue.

**20. IMPACTS ON PROGRAMS/DEPTS**

What programs/departments will be affected by this proposed action?

Include information on the Programs/Departments contacted (e.g., email, memo)

Impact on Animal Resource Center facility in year on due to renovation completion. ARC contacted and approved (jeblake@alaska.edu)

**21. POSITIVE AND NEGATIVE IMPACTS**

Please specify positive and negative impacts on other courses, programs and departments resulting from the proposed action.

Biology & Wildlife, Chemistry or SNRE students may request admission to course for research or professional development. Vet Med will be providing curriculum in biomedical sciences which was not available previously.

**JUSTIFICATION FOR ACTION REQUESTED**

The purpose of the department and campus-wide curriculum committees is to scrutinize course change and new course applications to make sure that the quality of UAF education is not lowered as a result of the proposed change. Please address this in your response. This section needs to be self-explanatory. Use as much space as needed to fully justify the proposed course.

The course is required for first year veterinary students and the syllabus is provided by CSU CVMBS. The course has been approved by their accreditation requirements and will be offered at UAF as part of the 2+2 program (first two years at UAF and last two years at CSU).

**APPROVALS:** Add additional signature lines as needed.

*As per attached*

Date

Signature, Chair, Program/Department of:

Veterinary Medicine

Date

Signature, Chair, College/School Curriculum Council for:

CNSM

Date


Signature, Dean, College/School of:


CNSM

Offerings above the level of approved programs must be approved in advance by the Provost.

Date

Signature of Provost (if above level of approved programs)

		Date	7/7/14
Signature, Chair, Program/Department of:		<u>Veterinary Medicine</u>	

		Date	9-25-14
Signature, Chair, College/School Curriculum Council for:		<u>CNSM</u>	

		Date	9/28/19
Signature, Dean, College/School of: <u>CNSM</u>			

<div style="border: 1px solid black; height: 40px; width: 100%;"></div>	Date	<div style="border: 1px solid black; height: 40px; width: 100%;"></div>
Signature of Provost (if above level of approved programs)		

		Date	
Signature, Chair			
Faculty Senate Review Committee:   __Curriculum Review                   __GAAC			
__Core Review                   __SADAC			

	Date	
Signature, Chair, Program/Department of:		
	Date	
Signature, Chair, College/School Curriculum Council for:		
	Date	
Signature, Dean, College/School of:		

The Faculty Senate curriculum committees will review the syllabus to ensure that each of the items listed below are included. If items are missing or unclear, the proposed course (or changes to it) may be denied.

During the first week of class, instructors will distribute a course syllabus. Although modifications may be made throughout the semester, this document will contain the following information (as applicable to the discipline):

□ Title, □ number, □ credits, □ prerequisites, □ location, □ meeting time  
(make sure that contact hours are in line with credits).

2. Instructor (and if applicable, Teaching Assistant) information:



☐ Name, ☐ office location, ☐ office hours, ☐ telephone, ☐ email address.

**3. Course readings/materials:**

☐ Course textbook title, ☐ author, ☐ edition/publisher.

☐ Supplementary readings (indicate whether ☐ required or ☐ recommended) and

☐ any supplies required.

**4. Course description:**

☐ Content of the course and how it fits into the broader curriculum;

☐ Expected proficiencies required to undertake the course, if applicable.

☐ Inclusion of catalog description is *strongly* recommended, and

☐ Description in syllabus must be consistent with catalog course description.

**5. ☐ Course Goals (general), and (see #6)**

**6. ☐ Student Learning Outcomes (more specific)**

**7. Instructional methods:**

☐ Describe the teaching techniques (eg: lecture, case study, small group discussion, private instruction, studio instruction, values clarification, games, journal writing, use of Blackboard, audio/video conferencing, etc.).

**8. Course calendar:**

☐ A schedule of class topics and assignments must be included. Be specific so that it is clear that the instructor has thought this through and will not be making it up on the fly (e.g. it is not adequate to say "lab". Instead, give each lab a title that describes its content). You may call the outline Tentative or Work in Progress to allow for modifications during the semester.

**9. Course policies:**

☐ Specify course rules, including your policies on attendance, tardiness, class participation, make-up exams, and plagiarism/academic integrity.

**10. Evaluation:**

☐ Specify how students will be evaluated, ☐ what factors will be included, ☐ their relative value, and ☐ how they will be tabulated into grades (on a curve, absolute scores, etc.) ☐ Publicize UAF regulations with regard to the grades of "C" and below as applicable to this course. (Not required in the syllabus, but is a convenient way to publicize this.) Link to PDF summary of grading policy for "C":

[http://www.uaf.edu/files/uafgov/Info-to-Publicize-C\\_Grading-Policy-UPDATED-May-2013.pdf](http://www.uaf.edu/files/uafgov/Info-to-Publicize-C_Grading-Policy-UPDATED-May-2013.pdf)

**11. Support Services:**

☐ Describe the student support services such as tutoring (local and/or regional) appropriate for the course.

**12. Disabilities Services:** Note that the phone# and location have been **updated**.

<http://www.uaf.edu/disability/> The Office of Disability Services implements the Americans with Disabilities Act (ADA), and ensures that UAF students have equal access to the campus and course materials.

☐ State that you will work with the Office of Disabilities Services (208 WHITAKER BLDG, 474-5655) to provide reasonable accommodation to students with disabilities.

5/21/2013

# **DVM 619 VETERINARY NEUROBIOLOGY**

## **SYLLABUS – SPRING**

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**Department of Veterinary Medicine, University of Alaska Fairbanks**

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### **1. Course Information:**

Title: **Veterinary Neurobiology**  
Number: 619  
Credit: 4  
Prerequisites: Successful completion of first semester of veterinary courses  
Location: TBD  
Meeting time: Three times a week for one hour lectures, once per week for three hour laboratory, exact time TBD. Each week includes lectures and labs which correspond with the lectures – grades are based on both lecture/exams and lab/exams.

### **2. Instructor Contact Information:**

Name: Dr. Michael Harris  
Office Location: 123 Murie Life Sciences Bldg.  
Office Hours: By appointment  
Office Phone: 907-474-7801  
Email: [mbharris@alaska.edu](mailto:mbharris@alaska.edu)

Email is the best way to reach the instructor. You should receive a response to your email within 24 hours when it is received. If you do not receive a reply within this time frame, assume that the email was not received and please resend your message.

### **3. Course Reading/Materials:**

Notes: Available Course Notes, Guide: Laboratory Guide,  
List of text book resources:  
Textbook of Veterinary Anatomy, 4th ed.  
Guide to the Dissection to the Dog, 7th ed.  
Handbook of Veterinary Neurology, 5th ed.  
Veterinary Neuroanatomy and Clinical Neurology, 3rd ed.

### **4. Course Description:**

Learn information on neurologic conditions in domesticated. A problem-oriented approach makes it easy to diagnose and treat neurologic problems in domesticated animals. The coverage of disorders by problem, not by established disease diagnosis, emulates how animals present to the veterinary hospital and simplifies the formulation of a correct diagnosis.



#### 5. Course Goals:

This course will present an introduction to the organization and function of the nervous system of domestic mammals, in terms of relationships among major components comprising the nervous system, and how behavior is altered by disorders of nervous system components. The course will present the basic components and functions of the spinal cord, brain stem, cerebellum and cerebrum. The course is taught to provide a basic understanding of the nervous system, including the physiology, pharmacology and pathology of the nervous system, allowing for understanding of clinical diagnosis and treatment

#### 6. Student Learning Outcomes:

Upon successful completion of the course, students will be able to identify and pronounce the names of nervous system components, to facilitate their understanding of medical literature and communication with medical colleagues and future clients. They will be able to explain how neural components are structurally and functionally related to one another and how specific neural damage leads to particular neurological disorders. They will understand the rationale for procedures comprising a neurological exam of a veterinary patient and perform a basic neurological exam.

#### 7. Instructional Methods:

##### Lectures

The lectures will emphasize selected aspects of neurobiology that are applicable to the practice of veterinary medicine. Lectures are intended to provide illustration, clarification, and updating of information. My philosophy of lecturing is that it is a coaching session to help you understand which information is most important and how to use it. But, the lecture is NOT meant to be the transfer of the exact body of knowledge that is useful in the practice of veterinary medicine. There is far more to learn than I can recite in our limited time together.

##### Textbooks

There are many reference books that you may find helpful as a supplement to the lectures (see reading material list). A wide variety of general, allied health, and health professions neurobiology textbooks are available in the library. Various veterinary medical textbooks have large sections devoted to this subject.

##### Laboratory exercises

Laboratory exercises will be supported by a prepared laboratory guide, on-line resources and two CDs: "Veterinary Neurobiology Interactive Programs" (Whalen), a CD consisting of interactive programs introducing neurohistology, brain anatomy, cranial nerves, spinal cord, brachial and lumbosacral plexuses, and interactive tests; "Veterinary Neurobiology, Interactive Cases" (Whalen), an interactive CD containing video footage of 20 neurological cases allowing practice at neuroanatomical diagnoses.

**8. Course Calendar:**

For details, refer to the section "Tentative Lecture Schedule" in the end of this syllabus.

**9. Course Policies:**

**Attendance:**

Students are expected to attend all classes. Exams will draw on lecture material and students that do not attend class will likely not do well in exams.

**Classroom Behavior:**

Any type of behavior in the classroom that is disruptive, distracting, or disrespectful to the instructor or to your fellow students will not be tolerated and will result in dismissal from the classroom. This includes, but is not limited to, disrespectful comments, and the use of tobacco products. All cell phones or other such devices must be silenced while in the classroom. Do not browse the Internet, text message or IM while in the classroom. You can use such devices for note taking or other class related activities.

**Plagiarism:**

Plagiarism is the overt or covert use of other people's work or ideas without acknowledgement of the source. This includes using ideas or data from a classmate or colleague without permission and acknowledgement, including sentences from journal articles in your writing without citing the author, or copying parts of a website into your essay. Plagiarism and cheating are serious offenses that violate the student code of conduct which may result in an "F" in the course and/or referral to the university disciplinary committee.

**10. Evaluation:**

Included in this course are:

- There will be approximately 12 homework cases, each handed out on a Monday and due the following Monday. Late assignments will be reduced by 10% per day past due. All on-line cases must be finished before the end of the semester, or your final grade will be withheld.
- Individual Filmed Student Neurological Exam: Performance Assessments will begin in April. You will be required to perform a portion of the neurological exam. During the exam you will be asked to explain what is being tested, and given specific symptoms, be prepared to verbally specify a location for a possible lesion and state a rationale for that location. Afterward you will watch your performance, and write a one page self-review. Information for this assessment will be located on Blackboard under Student Neurological Exam: Performance Assessment. Sign-up sheets will be posted during the month of February. Keep in mind that some time slots will be during elective courses, so please be sure to check your own schedule before signing up for a time. You will be asked to sign up for a 30 minute slot with a partner and provide a pet (canine or feline) for the exam. Be prepared to do the entire exam, but the portion of the neurologic exam that you perform will be determined when you arrive for your exam. Your one page self-review will be due no later than one



week after your neurological exam is filmed. You must get a passing grade on this assessment in order to pass the DVM 619 course.

- 3 in class exams that will consist of multiple choice short answer and essay portions.

**Grades for the course will be assigned as follows:**

Homework (10 points each)	120
Neurological exam self review	80
Exam 1	100
Exam2	100
Exam 3 (comprehensive)	200
<b>Total</b>	<b>600</b>

Grades will be  
calculated on 100-  
point scale

A+	96-100	%
A	92-95.9	%
A-	88-91.9	%
B+	84-87.9	%
B	80-83.9	%
B-	76-79.9	%
C+	72-75.9	%
C	68-71.9	%
C-	64-67.9	%
D	60-63.9	%

**11. Support Services:**

If you require more assistance than can be provided in class, and office hours, you may want to contact Student Support Services (<http://www.uaf.edu/sssp/>) or the Department of Veterinary Medicine for assistance.

**12. Disability Services:**

All students, including those with disabilities, are welcome in this course, and we are committed to providing equal access to this course for all students. If you have a disability (including learning disabilities) please inform us during the first week of class so that we can accommodate your specific needs. If you have not already done so, you will also need to contact UAF's Office of Disabilities Services (474- 5655). Everyone should have the opportunity to participate fully in the course and to complete assignments and exams to the best of their ability. If accommodations are needed to enable you to do so, we will gladly work with you to provide them.

**Tentative Class Schedule** (Lecture & Lab) Each week includes lectures and labs which correspond with the lectures – grades are based on both lecture/exams and lab/exams.

Week Topic (approximate schedule)

<b>Week 1</b>	Introduction to Veterinary Neurobiology; Anatomy of the brain. Virtual canine Anatomy, Introduction to gross anatomy of the brain
<b>Week 2</b>	Neurohistology; Synaptic transmission; Cranial nerve examination; Brain anatomy
<b>Week 3</b>	Cranial nerve exam; Cranial nerve case study; Blood supply, ventricular system, CSF & meninges
<b>Week 4</b>	Nervous system signaling; Clinical examination of cranial nerves; case study
<b>Week 5</b>	<b>1<sup>st</sup> Exam</b> Spinal nerves and spinal cord anatomy and pathology; Somatosensory systems
<b>Week 6</b>	Conscious proprioception; Nociception; Pain modulation; Upper & lower motor neurons
<b>Week 7</b>	Clinical pain assessment; Vestibular system; CSF collection; Upper & lower motor neuron reflexes
<b>Week 8</b>	Acupuncture; spinal reflexes; tetany & flaccidity; Case studies
<b>Week 9</b>	Ear anatomy; Auditory system; cerebellum
<b>Week 10</b>	<b>2<sup>nd</sup> Exam</b> Brain cross sections; brain imaging; Eye
<b>Week 11</b>	Eye; clinical eye examination; Visual and papillary reflexes; case studies
<b>Week 12</b>	Clinical significance of ANS; Seizure; Functional cortical anatomy
<b>Week 13</b>	Behavior; Equine neurological exam
<b>Week 14</b>	Case studies; Review
<b>Week 15</b>	<b>3<sup>rd</sup> Exam / Comprehensive exam</b> as scheduled by UAF