

SIMON FRASER UNIVERSITY

MEMORANDUM

S.76-154

To Senate

From Senate Committee on Undergraduate
Studies

Subject Course Changes - Department of
Archaeology

Date 18th November, 1976

Action taken by the Senate Committee on Undergraduate Studies at its meeting of November 16, 1976 gives rise to the following motion:

MOTION 1

That Senate approve, and recommend approval to the Board of Governors, the prerequisite changes set forth on page 1 of S.76-154 as follows:

For Archaeology 272-3 from "prerequisite: ARC. 101 or 131" to "prerequisite: ARC.131 is recommended" and for ARC.273-3 from "prerequisite: ARC.101 or 131" to "prerequisite: ARC. 101 is recommended".

Note - ARC. 101 and 131 were introduced as prerequisites on a trial basis this year. It is now the judgment of the Department that lessening the prerequisite will make the courses more widely available to interested students without jeopardizing their quality.

MOTION 2

That Senate approve, and recommend approval to the Board of Governors, the proposed new courses, ARC.340-3 Introductory Zooarchaeology and ARC.440-3 Advanced Zooarchaeology.

Note - The introduction of these two courses is entirely consistent with the orientation and objectives of the Department. The courses reflect the appointment of Dr. Richard Casteel during the past year to provide leadership in the field of Zooarchaeology.


Daniel R. Birch

DB/as

SCUS 76-45A

FACULTY OF ARTS

CALENDAR SUBMISSION

1977-78

DEPARTMENT OF ARCHAEOLOGY

p. 93 ARC 272-3 Prerequisite Change: From "Prerequisite:
ARC 101 or 131."
to: "Prerequisite: ARC 131 is recommended.
SEE APPENDIX A

p. 93 ARC 273-3 Prerequisite Change: From "Prerequisite:
ARC 101 or 131."
to: "Prerequisite: ARC 101 is recommended.
SEE APPENDIX B

Rationale:

ARC 101 or 131 were put in as prerequisites for ARC 272 and 273 this year on a trial basis as part of a larger curricular revision. There have been some complaints from students in Latin American Studies that with these requirements it forces them to take too much Archaeology to get into the upper division Latin American Archaeology courses. This same situation is potentially true for African Middle East Studies. After considerable discussion the department decided that it should return to the previous situation in which 272 and 273 had no prerequisites. Neither of the courses in question are majors or honors requirements. They do have considerable appeal to other students and as such they should be more available to them. This change also brings these courses in line with many 200 level Faculty of Arts courses which do not have prerequisites.

p. 94 ARC 340-3 New Course Proposal SEE APPENDIX C

p. 95 ARC 440-3 New Course Proposal SEE APPENDIX D

Change of Prerequisite only.

SENATE COMMITTEE ON UNDERGRADUATE STUDIES

NEW COURSE PROPOSAL FORM

Calendar Information

Department: Archaeology

Abbreviation Code: ARC Course Number: 272 Credit Hours: 3 Vector: 2-1-0

Title of Course: Archaeology of the Old World

Calendar Description of Course: A survey of Old World Prehistory from the Paleolithic to the Bronze Age. Basic concepts used in reconstructing prehistoric cultures, and the artifactual, fossil, and contextual evidence for the evolution of man and culture.

Nature of Course Lecture/Tutorial

Prerequisites (or special instructions):

ARC. 131 is recommended

What course (courses), if any, is being dropped from the calendar if this course is approved:

None

2. Scheduling

How frequently will the course be offered?

Semester in which the course will first be offered?

Which of your present faculty would be available to make the proposed offering possible?

3. Objectives of the Course

4. Budgetary and Space Requirements (for information only)

What additional resources will be required in the following areas:

Faculty

Staff

Library

Audio Visual

Space

Equipment

5. Approval

Date: September 15, 1976

Nov. 5 / 76

R. Carlson
Department Chairman

J. M. Munro
Dean

Chairman, SCUS

SCUS 73-34b:- (When completing this form, for instructions see Memorandum SCUS 73-34a. Attach course outline).

Oct. '73

SENATE COMMITTEE ON UNDERGRADUATE STUDIES

NEW COURSE PROPOSAL FORM

C. 76-9C

Calendar Information

Department: Archaeology

Abbreviation Code: ARC Course Number: 340 Credit Hours: 3 Vector: 3-0-0

Title of Course: Introductory Zooarchaeology

Calendar Description of Courses: An introductory examination of the role of faunal studies within the context of Archaeology; a detailed review of the major concepts and approaches utilized in the study of sub-fossil faunal materials from archaeological sites will be included.

Nature of Course 3 hours of lecture per week Lecture

Prerequisites (or special instructions): Any lower division archaeology course

What course (courses), if any, is being dropped from the calendar if this course is approved: none

2. Scheduling

How frequently will the course be offered? Once per academic year.

Semester in which the course will first be offered? Fall semester, 1977-3

Which of your present faculty would be available to make the proposed offering possible? Casteel

3. Objectives of the Course

To provide students in Archaeology with a basic introduction to and understanding of the role of faunal remains in Archaeology. The course will provide the student with the necessary information to illustrate the rationale for studies of sub-fossil faunal materials and the manner in which they are carried out. The integration of data and conclusions from such studies with appropriate archaeological and cultural data will be stressed.

4. Budgetary and Space Requirements (for information only)

What additional resources will be required in the following areas:

Faculty

Staff

Library some material will have to be placed on Reserve.

Audio Visual occassional use of slide projection equipment will be necessary.

Space lecture room.

Equipment see A/V requirements above.

5. Approval

Date: Sept. 30, 1976 : Nov. 5/76

R.L. Carlson Department Chairman

J.M. Munro Dean

Chairman, SCUS

C. 76-9C

Change of Prerequisite only.

SENATE COMMITTEE ON UNDERGRADUATE STUDIES
NEW COURSE PROPOSAL FORM

1. Calendar Information

Department: Archaeology

Abbreviation Code: ARC Course Number: 273 Credit Hours: 3 Vector: 2-1-0

Title of Course: Archaeology of the New World

Calendar Description of Course: A survey of the prehistoric cultures of North and South America. The entry of man into the New World, the rise of the pre-Columbian civilizations of Mexico and Peru, and the cultural adaptations by prehistoric populations to other parts of the New World.

Nature of Course Lecture/Tutorial

Prerequisites (or special instructions):

ARC 101 is recommended.

What course (courses), if any, is being dropped from the calendar if this course is approved:

None

2. Scheduling

How frequently will the course be offered?

Semester in which the course will first be offered?

Which of your present faculty would be available to make the proposed offering possible?

3. Objectives of the Course

4. Budgetary and Space Requirements (for information only)

What additional resources will be required in the following areas:

Faculty

Staff

Library

Audio Visual

Space

Equipment

5. Approval

Date: September 15, 1976

Nov. 5/76

[Signature]
Department Chairman

[Signature]
Dean

Chairman, SCUS

Introductory Zooarchaeology (ARC 349)

Reserve Reading:

- Wyman, J. 1869. On the fresh-water shell-heaps on the St. John's River, eastern Florida. *American Naturalist*, 2: 393-403, 449-463.
- Wintemberg, W.J. 1919. Archaeology as an aid to zoology. *Canadian Field Naturalist*, 33: 63-72.
- Hargrave, L.L. 1938. A plea for more careful preservation of all biological material from prehistoric sites. *Southwestern Lore*, 4(3): 47-51.
- Gilmore, R.M. 1946. To facilitate cooperation in the identification of mammal bones from archaeological sites. *American Antiquity*, 12: 49-50.
- Gilmore, R.M. 1949. The identification and value of mammal bones from archaeological excavations. *Journal of Mammalogy*, 30: 163-169.
- Olsen, S.J. 1959. The archaeologist's problem of getting non-artifactual materials interpreted. *Curator*, 2(4): 335-338.
- Daly, P. 1969. Approaches to faunal analysis in archaeology. *American Antiquity*, 34(2): 131-145.
- Butzer, K.W. 1975. The ecological approach to archaeology: are we really trying? *American Antiquity*, 40(1): 106-111.
- Fitch, J.E. 1966. Additional fish remains, mostly otoliths, from a Pleistocene deposit at Playa del Rey, California. *Los Angeles County Museum Contributions in Science*, 119.
- White, T.E. 1953. A method of calculating the dietary percentage of various food animals utilized by aboriginal peoples. *American Antiquity*, 18(4): 396-398.
- Nimmo, B.W. 1971. Population dynamics of a Wyoming pronghorn cohort from the Eden-Farson site, 48SW304. *Plains Anthropologist*, 16(54): 285-298.
- Weide, M.L. 1969. Seasonality of Pismo clam collecting at Ora-82. *University of California Archaeological Survey, Annual Report*, 11: 127-142.
- Clark, G.R., II. 1968. Mollusk shell: daily growth lines. *Science*, 161: 800-802.
- Kennish, M.J. and R.K. Olsson. 1975. Effects of thermal discharges on the microstructural growth of *Mercenaria mercenaria*. *Environmental Geology*, 1: 41-64.
- Bowen, J. 1975. Probate inventories: an evaluation from the perspective of zooarchaeology and agricultural history at Mott farm. *Historical Archaeology*, 9: 11-25.

ARC 340 (Introductory Zooarchaeology)

Texts: Casteel, R.W. 1976. *Fish Remains in Archaeology and Paleo-Environmental Studies*. Academic Press. London.
Chaplin, R.E. 1971. *The Study of Animal Bones from Archaeological Sites*. Academic Press. London.

Reserve Reading: See attached

Course Outline:

Older Works
Approaches to Faunal Analysis
Framework for Interpretation
General Works
Microscopic Examination
Biases in Faunal Sampling
Ethnographic Data and Archaeological Experiments
Estimation of Weight and Dietary Index
Cultural versus Natural Bone
Minimum Number of Individuals
Relative Frequency of Species
Butchering Techniques
Reconstruction of Man-Days
Seasonal Dating
Incremental Growth Structures
Environmental Reconstruction
Domestication

SENATE COMMITTEE ON UNDERGRADUATE STUDIES

NEW COURSE PROPOSAL FORM

Calendar Information

Department: Archaeology

Abbreviation Code: ARC Course Number: 440 Credit Hours: 3 Vector: 1-0-3

Title of Course: Advanced Zooarchaeology

Calendar Description of Course: A detailed examination of key concepts and approaches to the study of faunal materials from archaeological sites with an emphasis upon quantitative analysis of recent and sub-fossil faunal materials.

Nature of Course Lecture \ Laboratory 1 hour of lecture, 3 hours of lab per week

Prerequisites (or special instructions):
ARC 340 (Introductory Zooarchaeology)

What course (courses), if any, is being dropped from the calendar if this course is approved: none

2. Scheduling

How frequently will the course be offered? Once per academic year.
Semester in which the course will first be offered? Spring semester, 1978 -1

Which of your present faculty would be available to make the proposed offering possible? Casteel

3. Objectives of the Course

To permit detailed analysis of major theoretical trends in Zooarchaeology along with direct laboratory research work at an advanced level of study. Such laboratory work will be problem oriented and directed at the analysis of one or more major theoretical problems.

4. Budgetary and Space Requirements (for information only)

What additional resources will be required in the following areas:

Faculty

Staff One TA or lab assistant to help with laboratory operation.

Library Some material will be placed on Reserve.

Audio Visual Occasional use of slide projection equipment will be required

Space Full operation of the Department's recently funded faunal lab is assumed.

Equipment Two low-power binocular microscopes and two high-power compound microscopes with accessories will be required in order to conduct the laboratory.

5. Approval

Date: September 30, 76 Nov. 5/76

R. L. Carlson
Department Chairman

J. M. Munn
Dean

Chairman, SCUS

Reserve Reading:

- Mori, J.L. 1970. Procedures for establishing a faunal collection to aid in archaeological analysis. *American Antiquity*, 35(3): 387-389.
- Grimes, W.F. 1969. On co-operation. In P.J. Ucko and G.W. Dimbleby (eds.), *The Domestication and Exploitation of Plants and Animals*: xxii-xxvi. Aldine. Chicago.
- Olsen, S.J. 1968. Fish, amphibian, and reptile remains from archaeological sites. Part I. Southeastern and southwestern United States. *Papers of the Peabody Museum of Archaeology and Ethnology, Harvard University*, 54(2).
- Ziegler, A.C. 1973. *Inference from prehistoric faunal remains*. Addison-Wesley. Reading.
- Kishinouye, K. 1911. Prehistoric fishing in Japan. *Journal of the College of Agriculture, University of Tokyo*, 2: 328-382.
- Pannella, G. 1971. Fish otoliths: daily growth layers and periodical patterns. *Science*, 173(4002): 1124-1127.
- Olsen, S.J. 1961. The relative value of fragmentary mammalian remains. *American Antiquity*, 26(4): 538-540.
- Thomas, D.H. 1969. Great Basin hunting patterns: a quantitative method for treating faunal remains. *American Antiquity*, 34(4): 392-401.
- Casteel, R.W. 1974. A method for estimation of live weight of fish from the size of skeletal elements. *American Antiquity*, 39(1): 94-98.
- Parmalee, P.W. and W.E. Klippel. 1974. Freshwater mussels as a prehistoric food resource. *American Antiquity*, 39(3): 421-434.
- Bökönyi, S. 1972. Zoological evidence for seasonal or permanent occupation of prehistoric settlements. In P.J. Ucko, R. Tringham, and G.W. Dimbleby (eds.), *Man, Settlement and Urbanism*: 121-126.
- Saxon, A. and C. Higham. 1969. A new research method for economic prehistorians. *American Antiquity*, 34(3): 303-311.
- Clark, G.R., II. 1974. Calcification on an unstable substrate: marginal growth in the mollusk *Pecten diegensis*. *Science*, 183(4128): 968-970.
- Evans, J.W. 1972. Tidal growth increments in the cockle *Clinocardium nuttalli*. *Science*, 176: 416-417.
- Drew, I.M., D. Perkins, Jr., and P. Daly. 1971. Prehistoric domestication of animals: effects on bone structure. *Science*, 171(3986): 280-282.
- McConnell, D. and D.W. Foreman, Jr. 1971. Texture and composition of bone. *Science*, 172(3986): 971-972.

ARC 440 (Advanced Zooarchaeology)

- Texts: Casteel, R.W. 1976. *Fish Remains in Archaeology and Paleo-Environmental Studies*. Academic Press. London.
- Chaplin, R.E. 1971. *The Study of Animal Bones from Archaeological Sites*. Academic Press. London.
- Gilbert, B.M. 1973. *Mammalian Osteo-Archaeology: North America*. Missouri Archaeological Society. Columbia.
- Olsen, S.J. 1964. Mammal remains from archaeological sites, part I, southeastern and southwestern United States. *Papers of the Peabody Museum of Archaeology and Ethnology*, 56(1).
- Anderson, R.M. 1965. Methods of Collecting and Preserving Vertebrate Animals. *National Museum of Canada, Bulletin No. 69*.

Reserve Reading: See attached.

Course Outline:

- Establishing a Faunal Collection
- Maceration Techniques
- Collection of Basic Data
- Weights and Measures
- Scale Sampling
- Preparation of Slides
- Basic Osteometrics
- Data Preparation
- Basic Computer Data Processing
- Data Analysis and Hypothesis Testing
- Specimen Collection