

Introduction to Archaeology, Fall 2009  
**Study guide for the midterm exam**

Bring one or two 8 ½ x 11 (large size) blue books. The midterm is worth 25% of the course grade, or 250 points. The midterm is worth slightly more than originally planned in the syllabus, because we dropped the in-class exercises. It covers all of the readings and lecture material up to the midterm. The test calls for written answers that range from a phrase or sentence to a few paragraphs.

You should be able to explain and use the terms and concepts listed below, as well as any others in the readings or lectures. That means that you can answer questions about them, and that you can use them when answering other questions. For example, a question that presents a hypothetical archaeological excavation and asks you to answer a question about it might call for you to use multiple concepts from different chapters or lectures.

I look for clear, logical explanations, supported by examples and evidence where appropriate. Don't just mention concepts; explain them. When an exam question has several parts, address them all. Your job is to show that you understand the issues and the answer.

Suggestions: Review the readings, lecture notes, and slides. Identify the important points and arguments of each. Figure out why the authors are discussing a given example. What do they want you to learn from it?

A.D./B.C., C.E./B.C.E, B.P.

history vs. prehistory

What is archaeology?

anthropological approach

culture, symbolic culture, material culture

ethnocentrism, cultural relativism

Very generally, how did archaeology begin and develop into what it is today?

Nabonidus, Boucher de Perthes, Alfred Kidder, Lewis Binford, other important figures

antiquarianism

classical archaeology

New Archaeology

adaptive vs. ideational approaches

generalizing vs. particularizing approaches

scientific approach

scientific method, especially as applied to a "historical" science like archaeology or geology

historical science (vs. "normal", predictive science, vs. history)

inductive reasoning, deductive reasoning

hypothesis, test implication, falsifiability

synchronic, diachronic

culture history

low-level theory, middle-level theory, high-level theory

paradigm, processual paradigm, post-processual paradigm

What are some reasons why people do (or support) archaeology?

ways that archaeologists find sites

preliminary or reconnaissance survey; systematic site survey

settlement pattern, settlement system

preliminary or reconnaissance survey

100% or full-coverage survey  
sampling strategies: judgment sample; systematic sample; random sample; stratified random sample  
transect  
surface collection  
shovel tests, post-hole samples, auger samples  
settlement pattern analysis:  
    catchment analysis, Thiessen polygons  
    central place theory models  
    site size hierarchies, rank-size diagrams  
    primate settlement hierarchy  
non-site analysis  
remote sensing; subsurface sensing, noninvasive archaeological methods; reasons for using them  
aerial and satellite photography – what sorts of things it can detect, and how?  
magnetometry, soil resistivity, ground-penetrating radar  
Geographic Information Systems (GIS)  
landscape archaeology  
site formation processes, erosion, deposition, disturbance, redeposition  
kinds of deposits: alluvial, eolian, colluvial  
Steno's law, or the Law of Superposition  
stratigraphy, stratum, strata  
Understand and interpret stratigraphy in profile views and plan views  
Be able to figure out the order of deposition of strata or features in a profile drawing  
Be able to interpret the dating and associations of artifacts and strata shown in a profile drawing  
midden, feature  
intrusion (or intrusive)  
reverse stratigraphy  
association  
curation, reuse processes, reclamation processes  
natural (cultural) levels vs. arbitrary levels  
terminus post quem (TPQ); terminus ante quem (TAQ)  
marker bed  
soil horizons: A horizon, B horizon, C horizon  
systemic context vs. archaeological context  
floralturbation, faunalturbation, cryoturbation, argilliturbation, graviturbation  
archaeological record; incompleteness and biases of it  
kinds of materials that do and don't tend to survive under ordinary circumstances  
special circumstances that preserve evidence particularly well, and why they do so  
vertical vs. horizontal approaches to excavation; advantages and disadvantages of each  
activity areas  
test pit, test trench, strata cut  
general process of excavation and keeping excavation records, and reasons for it  
tradeoffs of using different methods of excavation  
how excavation is destructive  
provenience, context  
profile, baulk, datum, sterile  
screening, flotation  
relative dating, absolute dating

“index fossils” or time-markers; diagnostic artifacts

seriation, battleship curve

Generally how the major absolute dating methods work, what materials they work on, exactly what events they date, roughly how accurate they are, etc.

dendrochronology, tree-ring dating

radiocarbon dating

potassium-argon dating

obsidian hydration dating

trapped charge dating methods

thermoluminescence (TL) dating

optically stimulated luminescence

electron-spin resonance dating

dosimeter

accelerator mass spectrometry (AMS)

photosynthetic pathways, isotopic fractionation

reservoir effects: marine vs. terrestrial samples, northern vs. southern hemisphere

radiocarbon date calibration

uncertainty

old wood problem

the importance of ensuring a good association between a date and an event of interest

Example questions:

You are an archaeologist starting a project at a Native American village site on the shore of San Francisco Bay. You want to know what the inhabitants ate. Describe the steps of the scientific method you might go through to figure that out, explaining the reasoning and using the appropriate terms for each step.

What is a stratified random sampling strategy, and why might you use it?

Based on the map shown (with locations and sizes of sites), draw some conclusions about the subsistence practices and social organization of inhabitants of the sites. Explain your reasoning.

What causes the archaeological record to be incomplete and biased?

A coin dated 1827 was found at point A in the profile shown; what can you say about when wall B was built?

Mrs. Smith brings you an archaeological axe head that she found on her property, made from a river cobble. She is willing to pay to find out how old it is. What do you tell her?

A piece of charcoal from the floor of an excavated house in the highlands of Peru was radiocarbon dated to  $1533 \pm 35$  cal AD. Was the house occupied when the Spanish took over Peru in 1533? What else would you like to know to help you answer? Explain.