This will be a very participation-oriented course. Your level of understanding and interest in a particular topic will largely determine how long we spend discussing the issue. I will begin each category with a lecture or two concerning traditional anthropological studies or biological guidelines for understanding the issue. Then we will draw upon your readings, knowledge from other classes in the sciences and humanities, and personal experiences to explore the topic in depth, and with a modern perspective. Along the way, we will introduce certain themes for debate.

**GRADING**

In-class activities (labs, discussions, quizzes, etc.) ........ 25%

**SUMMARY:**

Journal (summary, questions, presentations, articles) ....... 25%

Debate (presentation and paper) ................................ 25%

Research Papers ....................................................... 25%

---

**JOURNAL:** Each week you will be responsible for an article published in the popular press or scientific literature dealing with the topic we are currently covering. The article must be of substantial detail, and must be current (published within the last year).

You will be keeping a journal of your readings, and discussion questions related to those readings. The journal will consist of a series of short summaries of each article and an evaluation of the scientific merit of the article based on information from class. Each entry should include a complete bibliographic reference at the top, the summary, and 2 discussion questions related to the topic that may be used in class. Be sure to keep the articles with/in your journal, I'll need to see the articles and summaries together. **Summaries must be typed.** Your summary should address the following questions for each article:

- what is the purpose of this paper?
- what is the subject matter covered?
- what are the author's conclusions?
- how does this relate to questions/issues of human adaptability?

You will be expected to discuss your article at least 2 times during the semester. **I will not accept late journals articles unless you have a University-sanctioned excuse.**

**DEBATES:** We will have several debates in class on a variety of ethics questions related to the above topics. Your grade on each debate is divided in two parts: half for your presentation, half for the paper. You may work together as a group on the presentation, but each person will have to make a separate presentation, and each will be responsible for his/her own paper.

Your typed summary should be approximately 5 pages long (typed, 1-1.5 spacing, 1 inch margins all around). Find research to support your topic. Each of these debates is potentially emotionally charged; however, you will be expected to argue from your head not your heart. Have FACTS to support your view. Your paper is due the day of your debate.

Also, please get to class on time (if not early) on debate days. Everyone is required to attend each debate -- attendance is mandatory, as though it were an exam day.

**IN-CLASS ACTIVITIES:** Finally, you will be given a series of in-class or take-home activities to complete during the semester. These will include a series of "labs", as well as readings. You cannot make-up missed in-class assignments given the participatory nature of the activities.
This course explores questions related to the evolution of modern Homo sapiens sapiens from a biocultural perspective. We will examine the stressors shaping human adaptation such as diet, disease, and environment during the first half of the class. Issues of human variation related to sex, gender, race, and intelligence will be analyzed during the later half, as will a variety of ethical ramifications.

**Part I: Human Adaptability**

Introduction to the Course -- We'll begin with a discussion of the format of the course, requirements, grading, pick debate topics, and assign group projects.

"The New Biology" -- In 1971, Leon Kass published "The New Biology: What Price Relieving Man's Estate." Although 30+ years old, this article speaks to issues pertinent today, perhaps more so than when it was published. We will begin an in-depth review of the issues addressed in this paper, to drive home many of the ethical considerations implicit in the topics to be covered during the course of the semester. These include the control of life, death, genetic potential, and human achievement. Current "hot topics" in these areas are abortion, doctor-assisted suicide, the use of fetal tissues in research, organ donations, infectious disease, access to medical records, in vitro fertilization, steroids, "cosmetic endrochronology", etc.

The Genetics of Human Variation -- We will very briefly review some of the genetic mechanisms necessary to discuss human variation. However, it is assumed that you have received most of this information in the prerequisite "Introduction to Human Evolution;" therefore, this will only be a review. We will cover the basics of cell structure and function, patterns of inheritance, and evolutionary mechanisms from natural selection to molecular genetics.

Nutrition -- One of the traditional categories of adaptive stress studied by biological anthropologists is diet. We will look at some of the nutrition-related mechanisms that have shaped human populations and discuss their influence on modern human phenotypes, as well as their social ramifications. Topics to consider in this section include anorexia, bulimia, starvation, obesity, alcoholism, 'natural' sugar and fat requirements, and lactose intolerance.

Disease -- We will survey the evolution of disease stress in human populations, and discuss the effects of past 'scourges' on the modern human genome. We'll explore the possible adaptive advantage of certain genetic disorders in a particular disease environment, and look at current stressors shaping human adaptation. Topics to consider include the end of the antibiotic age, venereal disease, HIV, Ebola, blood types, malaria, TB, cystic fibrosis, Tay-Sachs syndrome, and the plague.

Environment -- A major 'shaper' of human variation is the environment. Traditionally, this has been used to describe adaptation to climates such as desert, high altitude, arctic, tropical, and temperate systems. We will explore the biological and cultural mechanisms used by indigenous groups to live in a variety of settings. In addition, we will consider modern concerns such as reduction in the ozone layer, rainforest depletion, pesticides, radiation, sun-tanning, pollution, city dwelling, and global warming.
Part II: Human Variation

Sex and Gender -- The vast majority of the human race can be classified into the biological categories of male and female. However, gender as a social construct occurs along a much less quantifiable continuum. We will discuss the developmental and chemical aspects of sex, the role of sexuality in *Homo sapiens sapiens*, and the social aspects of gender. Topics to consider include homosexuality, hermaphrodites, gender roles, and cognitive differences between the sexes.

Race -- The field of Biological Anthropology was founded to 'quantify' the races. Our charter was to determine a way to measure racial difference, determine the number and origin of the races, and presumably, rank them. After 150 years, we still can't do it. We will discuss whether race is a biologically real construct, examine past attempts to classify races, and explore the implications of this on-going debate in light of the Human Genome Project. Topics to consider include categories used to describe races in the past and today, the Human Genome Diversity project, the Holocaust, and socio-economic ramifications of racial classification.

Intelligence -- And finally, we will look at intelligence as a measure of diversity in modern humans. Do males and females differ in intelligence? What is smart? Do different ethnic groups possess different intelligence levels? We will look at the history of this topic, how it has been measured in the past, its implications on immigration laws, the validity of IQ tests, and types of intelligence. We'll discuss the implications of books like "The Bell Curve" on shaping modern legislation and the biological foundations for such claims.

This will be a very participation-oriented course. Your level of understanding and interest in a particular topic will largely determine how long we spend discussing the issue. I will begin each category with a lecture or two concerning traditional anthropological studies or biological guidelines for understanding the issue. Then we will draw upon your readings, knowledge from other classes in the sciences and humanities, and personal experiences to explore the topic in depth, and with a modern perspective.