

CASI/ASTR 279 – Reaching for the Red Planet

Class Project

Report Due: Last day of class

The primary goal of this class is the establishment of a human-occupied base on Mars. While our journey to the Red Planet will be hazardous enough, the real challenge will be surviving on the surface of our new home (or new home-to-be). Once there, each of you will be the base expert on some aspect of our survival.

You should now start to think about what that area of expertise will be. During the last few days of class, you will have an opportunity to tell the rest of the class about your chosen topic in the form of a ten-minute presentation. You (or your team) may use any form of presentation style you wish, including (but not limited to) slides, posters and PowerPoint presentations.

The presentation will be based on the contents of a 10-page double-spaced paper (5 page single-spaced) paper. This paper should be carefully researched and written, and should include a bibliography containing at least 5 primary sources. Only two of these primary sources should be web based (without prior permission), and Wikipedia may not be one of them! Note that your bibliography is not to be included in your page count. While the presentation is a team effort, your paper should be your own.

A successful paper and presentation will include answers to the following questions:

Why is <insert topic here> important to human survival on Mars?

What advances have been made to date in this area?

Are there any new technologies or techniques that need to be developed in this area before we arrive on Mars?

How difficult will it be to implement on Mars?

Etc.

Your topic may have other important questions that should be answered. Feel free to include them.

Your presentation makes up 20% of your final grade, and the paper is worth 20% of your final grade. I strongly recommend that you submit a draft of your paper in advance. I will provide comments and feedback on the draft.