

Examining the Arguments of Climate Change Skeptics

The claims of climate change skeptics have played an important role in shaping public debate over climate change. Please draw on the documentary, *The Great Global Warming Swindle*, course materials, and the resources below to analyze the arguments of climate change skeptics. There are three steps to this assignment:

Step 1. **An argument.** Choose **one specific scientific** (not moral, ethical, or economic) argument advanced in documentary. Summarize that argument in one or two paragraphs, explaining the argument and the evidence presented to support it. (Include a graph or illustration, if this would be useful, which you can use screen capture to acquire.)

Step 2. **The assumptions and claims:** Identify the most important assumptions or claims the skeptics are making in their argument (aim for 3 such claims). For each claim answer these questions: How plausible is each assumption or claim? Do you agree with the assumption or claim? At what point do you stop agreeing with, or stop understanding, the argument they are making?

Step 3. **What you'd like to know.** If you wanted to form a final judgment about the skeptic's argument, what additional information would you want to have?

Your final assignment should be 1-2 pages in length (1-1/2 spaced).

Useful resources:

1. *The Great Global Warming Swindle* is available as a video e-reserve.
2. The producers of the documentary, wag.tv, maintain a website which elaborates (briefly) on some of the arguments from the documentary:
<http://www.greatglobalwarmingswindle.co.uk/>
3. *The New Scientist*, a British science magazine, has compiled a useful list of points in response to the claims made in the documentary.
<http://www.newscientist.com/article/dn11462>
4. The sample assignment on the following page.

Here is a sample assignment #4, based on Bjorn Lomborg's skeptical argument regarding the biodiversity crisis advanced in his book *The Skeptical Environmentalist*. Notice the distinction between the argument (which focuses on the specific argument he is making) and the assumptions (which are the underlying assumptions which inform his argument).

1. **The argument:** The biodiversity crisis is based on false assumptions about the rate of species extinction. Scientists have given extinction rates on the order of 40,000 to 250,000 species per year. At that rate, scientists warn that more than half the species in the world will go extinct over the next century. But Lomborg claims these arguments are not supported by available evidence. According to Lomborg, the natural rate of extinction is two species per decade over biological history. His research indicates that 25 species have gone extinct every decade since 1600, which reflects an increased rate of extinction due to human activities. In part, this increased rate of extinction is due to hunting, habitat development, and anthropogenic causes. Despite the increase in research, he claims there is no concrete evidence showing a rate of extinction on the order of 10,000 species per year. Such high rates of extinction are exaggerations, in his view. Yet, he argues, it is that false information which has precipitated current concerns about a biodiversity crisis and mislead the public.

2. **Assumption #1:** Our concerns about biodiversity should be grounded in the best available science regarding the number of species in the world and the rate of extinction. I agree with this claim. There is a clear role for scientific research to play in determining the number of species in the world and the rate at which they are disappearing. **Assumption #2:** Biodiversity is most important for its value to people. I disagree with this claim. Lomborg's grounds his value system in human interests, and I think that in the case of biodiversity, while there are clear human interests at stake — such as potential medicinal values and ecosystem services — not all people value biodiversity the same way and biodiversity has its own intrinsic value. **Assumption #3:** Biological scientists have exaggerated the rate of extinction. This point is particularly controversial. If Lomborg is right, then there are genuine problems with how scientists and environmentalists have described the biodiversity crisis. If he is wrong, then his argument fails.

3. **What I'd like to know.** Lomborg's argument rests on the third assumption: has the rate of extinction has been misrepresented? To test Lomborg's argument, I would conduct research into the current knowledge about the total number of species in the world, the rate at which they are disappearing, and reasons why that rate of extinction might be changing. It seems that he focuses solely on the numerical rate of extinction, but that considering other factors which might exacerbate the biodiversity crisis, such as habitat fragmentation, climate change, and tropical deforestation, would all be important too and might explain why many scientists' higher estimates of the rate of extinction.