ESSAYS MNSES9100

Structure

- 6-9 pages
- 1.5 line spacing
- 12 cpi

Deadlines

- Submission of max one page outline (to be approved by your group leader) at the latest 24hr before essay seminar.
- Submission of essay, by email as a word or pdf file to your group leader
- It is possible to submit a draft earlier to get comments
- Students needing to make revisions/re-write will be advised at the latest four weeks after submission and given 2 weeks to rewrite.

Referencing and Citation

1. Proper referencing. Internet and newspapers are fine as sources, but include the year (or date accessed) author and title of the article/work. For newspapers, include the article author, the newspaper name and full dates.
2. For other journal or book publications use standard scientific referencing. Either as numbers or (Smith, 2004).
3. If you copy whole sentences or paragraphs, these need to be put in quotation marks, or as indented paragraphs with the original author cited. Such material should make up no more than 15% of the essay, and the essay must include your own evaluation.
4. If you refer to another author's idea, work, or results, but put it in your own words, then the original source should still be referenced.

Structure

5. Make the theme of the essay clear, and why it is relevant, within the first page.
6. Break up the essay with sub-headings. This will help you to structure your arguments.
7. Pure background material of "factual" or technological description of your case should not exceed 2 pages.
8. Avoid passive tense. (e.g., the book was written… it is claimed….). Use active tense and be clear who said and did what (e.g., Peter Singer claims,..). It is acceptable to use "I" and "my" in philosophical essays.
9. Make your opinion clear – even if you are unsure. For example, if you think that there is a real ethical dilemma as to whether a particular technology should be permitted, it is OK to say so. But you could also consider under what conditions you would consider the technology acceptable/not acceptable.
10. Make sure to back up your arguments or claims.

Four Alternative Approaches

A. Defend or oppose a position or point of view (e.g., X represents a satisfactory definition of science; X is/is not a good example of a paradigm shift; Y is/is not acceptable; Z hinders the progress of science)

It is important to present both arguments against and arguments in support of your point of view.

B. Compare two cases (e.g., a discovery or scientific breakthrough in the light of two different theories of science; two different scientific theories/disciplines according to one theory of science; attitudes to modern vs traditional biotechnology; deontological vs utilitarian assessment of a case) and examine the philosophical, ethical, and/or social differences.

The essay should consider the factual differences/similarities between the cases, but make sure that the essay doesn't only compare facts, but also examines philosophical or value aspects as well.

C. Evaluate the philosophical, ethical, and/or social issues associated with a particular case or application of science or technology.

Make sure to include a thorough assessment of the source of conflicts and debates related to the case.

A case having little controversy, and where everybody is in agreement, is not a good source of material. Unless of course YOU are in disagreement with majority opinion!

D: Use science fiction to illustrate some of the ethical dilemmas with a particular technological application (e.g. the "Futures" section in Nature)

Example themes

Take a breakthrough in your area and discuss whether it fits the Kuhnian paradigm shift model
Consider whether any of the theories of science apply to your field.
Use an example from your field to discuss whether science and technology can be separated (or pure and applied science)
Is inductivism really dead?
Does anybody reject their hypothesis?
Under what conditions is data rejection statistically justified; when is it data manipulation?
Can research on animals be justified?
Should patenting of X be allowed?
Under what conditions can model validation meet the requirements for good science?
Does model testing fit the hypothetico-deductive method?
Can a non-anthropocentric system of environmental management work?
Are all environmental regulations simply for human benefits?
Are the benefits of research unfairly distributed?
Do patent laws help or hinder research progress
Do Merton's CUDOS rules apply today or are they outdated and archaic, and have no role in modern science.
Why do some scientists cheat?
How can universities combat fraud?
Why is fraud more prevalent in some scientific disciplines?
Is genetic manipulation worse than selective breeding?
Are the risks of modern (bio)technology worse than traditional (bio)technology?
Is the increase in number of co-authors on papers a problem, or does it simply reflect the more multidisciplinary approach to research?
Does the media aggravate irrational risk-perception in the public?

Example titles

Are there scientific revolutions in mathematics?
The origin of life – outside the realms of science?
Computer crime – the case of Norway
Image editing or image manipulation - A thin line
Bruk av statistikk i dataanalyse: etiske dilemmaer i en forskningshverdag.
Parapsychology in relation to science
Patents with R-groups and other variables in organic chemistry
The role of thought experiments in development of scientific theory
Do scientists have a duty to popularise their research?
Should fish come under the regulations for animal experiments?
Aloa vera research: biopiracy or co-benefits?
Nanoparticles – in need of nanoethics?
The price and reward of evolutionary studies: paid by animals, achieved by human
Radioactivity - a friend or a foe?
Is the killing and collection of insects for scientific purpose morally defendable?
Genetisk forbedring av menneskets arvestoff – Transhumanisme vs. Biokonservatisme
Pseudovitenskapen vender tilbake
Is evolutionary psychology a threat to achieving gender equality in society?
Can research on harmful materials be justified? – the case of CdZnO
Alfred Wegener and the Origin of Continents and Oceans – aspects of a scientific revolution?
Can Students Be Induced to Choose a Field for Their Future Education or Is It a Wrong Social Assumption?
Skrevet i stjernene?
“Where does the researchers’ responsibility end, and society’s responsibility start? A discussion based on examples from international climate research
Grønn kjemi, et paradigmeskifte innen kjemisk industri
Object Oriented Design and Development - Paradigm shift in Software Science
Fysikk på stedet hvil
The financial crisis and mathematics