

Frankenburger

Have scientific advancements enabled us to stop farming animals for food? Dr. Mark Post at Maastricht University in the Netherlands has created a five-ounce burger in the laboratory. The synthetic meat is formed from stem cells using tissue-engineering techniques and consists of about 20,000 thin strips of cultured muscle tissue. Dr. Post claims that the burger “tastes reasonably good,” but it costs \$325,000 to produce.¹

If we can safely and affordably develop meat in a lab, some argue, we should stop farming animals for food. Not only will animals not be harmed, they claim, but synthetic meat may also be healthier for us and can be produced more efficiently than farm-grown meat. A journal study published in *Environmental Science and Technology* claims that synthetic meat reduces greenhouse gas emissions and requires less use of land, water, and energy.²

Others, however, argue that if synthetic meat replaces farm-grown meat, this would negatively impact the animal farming industry that depends on raising animals as income. In addition, the idea of “test-tube” meat may turn off many meat-eaters, who may view synthetic meat as unnatural. In addition, there is no evidence that the test-tube meat is safe for consumption. Since synthetic meat can be genetically engineered to enhance desirable traits, synthetic meat is subject to the same criticisms as other genetically modified foods.

Animal rights activists are split on this issue. People for the Ethical Treatment of Animals (PETA), for example, is offering a \$1 million dollar prize to the first scientist to bring synthetic chicken to the market because its “primary interest is in replacing *chicken* factories, transport, and slaughter [since] more than 1 million chickens are eaten every hour in the U.S. alone.”³ Other activists argue that those who support synthetic meat “...are supporting the use of animals in research, the continued (reduced or not) exploitation of animals, and are ignoring the use of animals for other purposes.”⁴

STUDY QUESTIONS

1. Should we support the research and development of synthetic, genetically-engineered meat?
2. If test-tube meat can be safely mass-produced and kept affordable, would it be ethically permissible to kill animals for food?

¹ http://www.nytimes.com/2013/05/14/science/engineering-the-325000-in-vitro-burger.html?_r=0

² Tupmisto, H. L. and Teixeira de Mattos, M. J. (2011). Environmental Impacts of Cultured Meat Production. *Environmental Science & Technology*, 45 (14), 6117-6123.

³ <http://www.peta.org/features/In-Vitro-Meat-Contest.aspx>

⁴ <http://www.examiner.com/article/in-vitro-meat-has-no-place-animal-rights-campaigns>