**Should governments be doing more to encourage sustainable agricultural practices across the world?**

Agriculture is the practice of cultivating plants and livestock; agricultural products can be broadly grouped into foods, fibres, fuels, and raw materials. Sustainable agriculture practices are practices that meet the needs of today’s generation without compromising the needs of future generations.

Before moving onto the key questions to whether the government should be doing more to encourage sustainable agricultural practices across the world. We should consider the two main types of agricultural methods around the world. One of these are subsistence agriculture which is when farmers grow crops to meet the needs of themselves and their families. Two billion people around the world depend upon this ancient agricultural practice. In addition, the other main type of agricultural practice is industrial agriculture which is where massive quantities of crop are produced for the purpose of sale. (Study.com, n.d.)

Now I shall move on to weigh up both sides of the argument before making my conclusion on this topic. However, before we must acknowledge the arguments for people on either side of this argument, we should know what aspects their arguments could be about. Some people will argue that governments need to be doing more to encourage sustainable agricultural practices across the world to protect the ecology and biodiversity of our planet and to tackle global issues such as global warming. As there are still many unsustainable farming practices around the world such as slash and burn and **using lots of chemicals. In contrast other people could argue that following even more sustainable practices could endanger the food security and welfare of people around the world as some are very dependent upon these unsustainable practices as they currently produce higher yields of crop.** 2.6 billion people depend directly on agriculture and between two hundred million to five hundred million people worldwide use slash-and-burn because of problem with location as they are in dense forest regions. In addition, people could argue that sustainable agriculture does have its drawbacks such as less crop yield and longevity. (Wikipedia, n.d.)

The first article I looked at was from the World Wildlife talking about sustainable agriculture and its effect on nature. I deduced that this is a reliable source as it is an international NGO. This article argues the need for sustainable agriculture and how many current agricultural methods threaten wildlife and species. It describes that with the world population due to increase by almost two billion people by 2050 , people must start paying more for their food to encourage sustainable approaches to agriculture. Now great deal of chemicals and pesticides are being used when cultivating crops which eventually poison the soil and poison fresh water sources. Furthermore, it talks about how unsustainable agriculture is done more in areas with poverty as European governments encourage overproduction heavily. Therefore, farmers do not look at the effect on nature as they need this for their livelihood. As a result, a lot of deforestation and ecological destruction is following. This source suggests that the government are not doing enough as unsustainable practices are causing widespread damage to farmland across the world. (WWF, n.d.)

The second article I considered was from Green Tumble talking about why we need sustainable agriculture. One of the points within the article is how sustainable agriculture values diversity as it incorporates growing a variety of crops and avoiding the prospect of monoculture which eventually lead to soil degradation which is where soil health is damaged. In addition, it talks about how this method of growing multiple varieties leads the soil to being more resilient to extreme weather conditions. Furthermore, it elaborates on how a sustainable farm incorporates livestock and crop production together. This source elaborates how governments are not doing enough to bring together important ideas on how to get a good crop yield without risking the health of soil . Another key point mentioned within the article is how sustainable agriculture will save energy by using less energy-intensive farming methods and decrease the impact on the environment by eliminating the need for fossil fuels so less greenhouse gases are being emitted from the farming industry in turn reducing the effect on climate change. I conclude from this article that we need to reform the food system and introduce these sustainable techniques to maintain the health of the planet and sustain the livelihoods of everyone on it also elaborates how governments are not doing enough to bring together important ideas on how to get a good crop yield without risking the health of soil. (GreenTumble, n.d.)

The third source that I contemplated for this side of the argument was the GOV.UK website where it was talking about the incentives of sustainable agriculture and the environmental benefits and how the standards the UK have placed help encourage sustainable agriculture. One of the key takeaways from this article was that hedgerows are an important part of sustainable agriculture and are something that should be implemented to help protect land. This is because they provide food, shelter and some protection for birds and insects which allow the agriculture in that area to be more resilient to climate change and reduce soil erosion in the area to reduce soil degradation. An additional aspect talked about is the Sustainable Farming Incentive (SFI) due to be rolled out in 2022. The people who are currently eligible for the Basic Payment Scheme (BPS) are automatically eligible for the SFI. This scheme is meant to be flexible so farmers can choose how many fields they would like to enrol for the SFI. Some of the main criteria is that the land is either part or fully arable land and is not in any existing agreements, so no overlapping takes place. The agreements created will last for 3 years and will allow farmers to adjust every 12 months on how much they are paid according to the the Arable and Horticultural Soils standard, the Improved Grassland Soils standard and the Moorland and Rough Grazing standard (introductory level). The most important insight gained from the pilot scheme of this scheme was to see what works for most farmers and what does not this allowed them to adjust future policies. The takeaway point from this article is that governments should be doing more towards a sustainable future which includes the likes of sustainable agriculture. They be investing more of their budgets into it to safeguard our planet as this policy was only introduced this year. (agriculture, n.d.) (pilot, n.d.)

The fourth source I considered from this side of the argument is Document 2 (Pre-release booklet) talking about how agriculture is at risk. The focus of this article is around the points made by the UN Food and Agriculture Organisation(FAO). One key point from this article is that food security including the opportunity for agriculture is at risk due to the reducing biodiversity. The article further goes on to describe how this is done one the main ways biodiversity is important because pollination is a vital part of agriculture as ¾ of crop depend on this practice. The article goes on to describe unsustainable practices could impact the welfare of pollinators such as bees. Another key argument within this article is that government policies have a negative impact on biodiversity as they either harm it or don’t consider the wider impacts when still funding research on unsustainable practices which include the effect on biodiversity, the climate, and the food security of everyone depending on agriculture. I deduce from this article that policies and implementation currently in place are insufficient and the FAO is calling for more research into agriculture to help secure our livelihood.

Now I shall move onto the opposing side of the argument where people could argue about the drawbacks of sustainable agriculture on people living in developing countries but some circumstances in developed countries too.

The first source I found talking about the challenges of implementing sustainable agriculture in developing countries was from the NADLC NAL USDA which is the National Agricultural Library Digital Collections . There were five key points in relation to the implementation of sustainable agriculture in developing countries. These root from the fact that research within agriculture has led to outstanding results as research centres have been able to find ways to increase the yield and productivity of farming. The first key point is that they feel government will not be able to give enough economic incentives to promote farmers to be sustainable. In addition, farmers will be able to make a lot more money using fertilizers to boost crop yield. The second key point is that in developing countries there is a lack of awareness within the population of developing countries and this means these sustainable methods cannot be implemented very easily. The third key point is that many developing countries are unindustrialized and there is lack of training within communities so implementation of these methods will be down to specific projects and will be scarce. The fourth key point is that there is not much information about the difference between sustainable and unsustainable farming methods so without the knowledge it is extremely hard to implement these methods within developing countries. In recent times there has been research by donors in developing countries but all of it was on boosting crop yield and productivity and lots of people think developing sustainable techniques is a waste of time. The last point is that not enough money is being put into researching sustainable agricultural techniques as it means less yield and productivity. I infer from this article that sustainable agriculture techniques are in their initial stages and need solutions to help them mature and be more feasible around the world. (USDA, n.d.)

The second source I considered for this side of the argument was from ICRAF and was called sustainable agriculture and its obstacles. The article called How to feed our planet without destroying the environment outlined four key points. Talking about the lack of urgency from governmental organisations to deal with prominent issues with food and water security., the threats posed by the high consumer base, the threat of pesticides and finally the how innovation is dependent upon adopting available techniques. The point about the lack of urgency from governmental organisations talk about how they ignore such prominent issues especially within developing countries as these can lead to huge repercussions within the community. A key example mentioned was the drought in the Horn of Africa from 2011-2012. Therefore, in these situations these communities need to turn to small horticultures to try and deal with increasing risk of food security and unable to think about sustainable practices. The point about the threat of the high consumer base talks about how high demands for certain products e.g., meat in China has meant that more focus during agriculture has been put towards productivity and the sight of organic farming as it is much less productive and does not meet the need of people as practices such as GMOs and genetic engineering have proved far too productive. The point about the need of pesticides have been more prevalent as farmers in developing countries need these to manage the pest damage and balancing the effect on the environment so for them, they are necessary to maintain a good crop yield. Even though the EU banned neonics the last point talks about how farmers expect agriculture to show a positive result through crop yield and productivity. It would not be fair to expect a farmer to use organic farming practices if they are unable to get the same yield and get lower than they are inorganic practices. Therefore, governments need to give monetary incentives to tackle this and give a fair deal to farmers which is only prevalent in developed countries which only hold a small proportion of the world’s population. I conclude from this article that sustainable practices are not as productive as other practices so mean farmers make less of a profit and could risk their family’s livelihood. (ICRAF, n.d.) (Cheney, n.d.)

The final source I considered from this side of the argument is from an article talking about the threats and challenges to sustainable agriculture in Egypt. The article talks about how agriculture contributes to 14% of the country’s total GDP and almost a third of the population are employed into this sector. One of the main limitations of sustainable agriculture is that 53% of the population live in the rural areas of the country and are heavily dependent on monoculture and multi harvest crop to be able to feed their families and get enough crop to sell as exports to make a living. Another limitation to them being able to implement sustainable agricultural practices is the lack of modernisation and knowledge. Especially within the rural areas there has been little focus and money put to how the crops are being grown as currently ancient agricultural practices that have been practices for centuries are still in place. In addition, a lack of knowledge from farmers about sustainable practices mean they are unable to look at alternative options. Finally, there is an increasing shortage of water supplies and land therefore the people are trying to get the maximum yield crop they can in any way. I deduce from this article that a lot of modernisations must be done to agriculture in a lot of emerging countries across the world like Egypt. (Shalaby, n.d.)

In weighing up both sides of an argument and concluding, I will consider the takeaway points from each article and source I have referred to in this presentation before making my own conclusion. The first reason to why governments should be doing more to encourage sustainable agricultural practices across the world it that unsustainable practices are doing lots of unnecessary damage to the farmland and could risk the welfare of future generations. The next point was that governments need to invest more in these sustainable practices but being fair to farmers as well by giving necessary incentives to preserve the farmland future generations. The next point was that even within a well-developed country like the UK a major sustainable agricultural push was only passed in 2022 showing that even developed countries have they are part to do in conserving the planet.

On the other side of the argument there are valid points to why governments should not encourage practices just yet. The key takeaway point from the first article was that these practices are still not developed yet and lots of investment must be done before they become feasible for everyone across the globe. The key takeaway point from the second article was that current sustainable practices mean less profit for farmers and mean they make less of a living and require more development. The final article emphasises how lack of opportunity and knowledge leave farmer no choice but to rely on traditional farming methods that have been run through the generations.

After acknowledging the conclusions from each article and source on either side of the essay. I agreed with takeaway point from the first article as it vividly describes the damage done to the welfare of farmland by unsustainable techniques like using harmful farm chemicals. In addition, I believed that the second source provided a compelling argument as it had given evidence for this in the modern day for prevalent issues such as climate change. In addition, I also believe the fourth article provided a compelling argument as it was backed by the UN whose purpose is for the international security of people. Furthermore, the article had talked about feasible ways of tackling the problems with agriculture In contrast even though the third source had credible arguments I feel it did not give a compelling enough argument about the advantages of sustainable agriculture towards the health of the planet but only focused on the incentives of it on farmers. In contrast on the other side of the argument I felt like they were informative and detailed however the articles didn’t seem to provide a compelling enough argument that convinced me sustainable practices should not be encouraged at this moment in time.

In conclusion after weighing up both sides of the argument I feel like governments should first invest more into developing sustainable practices across the globe before encouraging farmers to move towards these practices.

# Bibliography

agriculture, I. o. S., n.d. [Online]   
Available at: https://www.gov.uk/government/publications/sustainable-farming-incentive-how-the-scheme-will-work-in-2022/sustainable-farming-incentive-how-the-scheme-will-work-in-2022

Cheney, C., n.d. [Online]   
Available at: https://www.devex.com/news/how-to-feed-our-planet-without-devastating-the-environment-83799

GreenTumble, n.d. [Online]   
Available at: https://greentumble.com/why-do-we-need-sustainable-agriculture/

ICRAF, n.d. [Online]   
Available at: https://www.worldagroforestry.org/news/sustainable-agriculture-and-its-obstacles

pilot, S. a. i., n.d. [Online]   
Available at: https://www.gov.uk/guidance/sustainable-farming-incentive-pilot#:~:text=The%20Sustainable%20Farming%20Incentive%20scheme%20will%20reward%20farmers%20for%20managing,Basic%20Payment%20Scheme%20(%20BPS%20).

Shalaby, Y., n.d. *Threats and challenges to sustainable agriculture and rural development in Egypt: Implications for agricultural extension.* [Online]   
Available at: https://www.researchgate.net/publication/266090181\_Threats\_and\_challenges\_to\_sustainable\_agriculture\_and\_rural\_development\_in\_Egypt\_Implications\_for\_agricultural\_extension

Study.com, n.d. *Agriculture Practcies.* [Online]   
Available at: https://study.com/academy/lesson/types-of-agriculture-industrialized-and-subsistence-agriculture.html

USDA, N. N., n.d. *Sustainable Agriculture in Developing Countries.* [Online]   
Available at: https://naldc.nal.usda.gov/download/IND20394137/PDF

Wikipedia, n.d. *Wikipedia Slash and Burn.* [Online]   
Available at: https://en.wikipedia.org/wiki/Slash-and-burn

WWF, n.d. *WWF.* [Online]   
Available at: https://www.worldwildlife.org/industries/sustainable-agriculture