

Biosciences

The Application of Biology

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What is Bioscience?

- Any branch of science dealing with living organisms
- Often related to food (production/processing/safety/nutrition)
- Degrees related to
 - Farm to Fork
 - Production to Populations
 - Impacts of Intervention

What are Bioscience Degrees?

- Applied Biology/Biotechnology
- Plant & Crop Sciences
- Agriculture
- Animal Sciences
- Environmental Sciences
- Food Sciences/Microbiology
- Nutritional Sciences/Dietetics



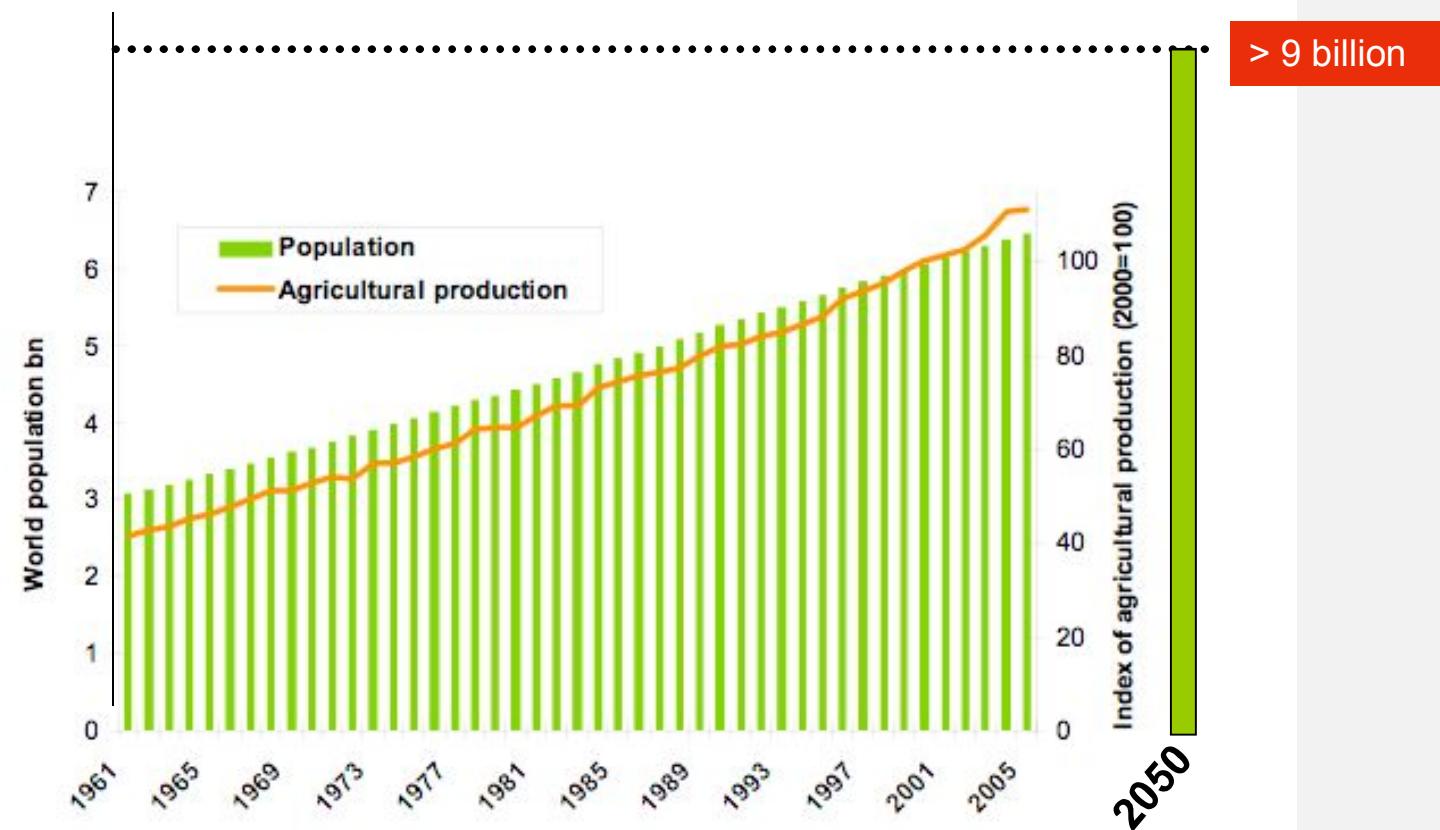
Where is Bioscience?

- Sutton Bonington Campus



Why Bioscience?

- We need food



Source: FAO

Tuesday, March 04, 2014

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World population and agricultural production (2000 = 100), 1961- 2005

Why Bioscience?

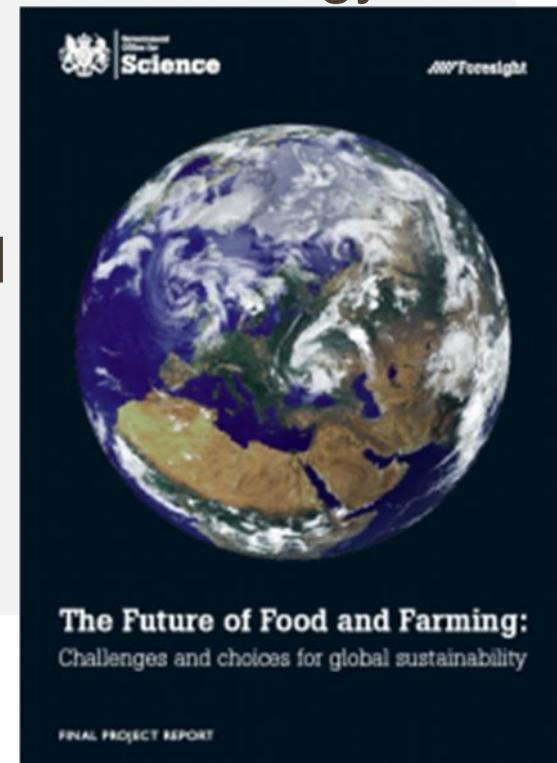
Global Food Security....meeting the demand

- World population predicted to reach **9Bn** by **2050**.
 - **1Bn** people are **chronically undernourished**;
- In Africa, per capita food intake is 20% less than it was in 1960 and average crop yields are 1 tonne per hectare – the same as estimated in the UK 2000 years ago.
- Food demand is **projected to increase by 50%** by **2030** and **double by 2050**"
- **WE ARE NOT MAKING MORE LAND**
 - **Graduates are needed to meet this challenge**

Why Bioscience?

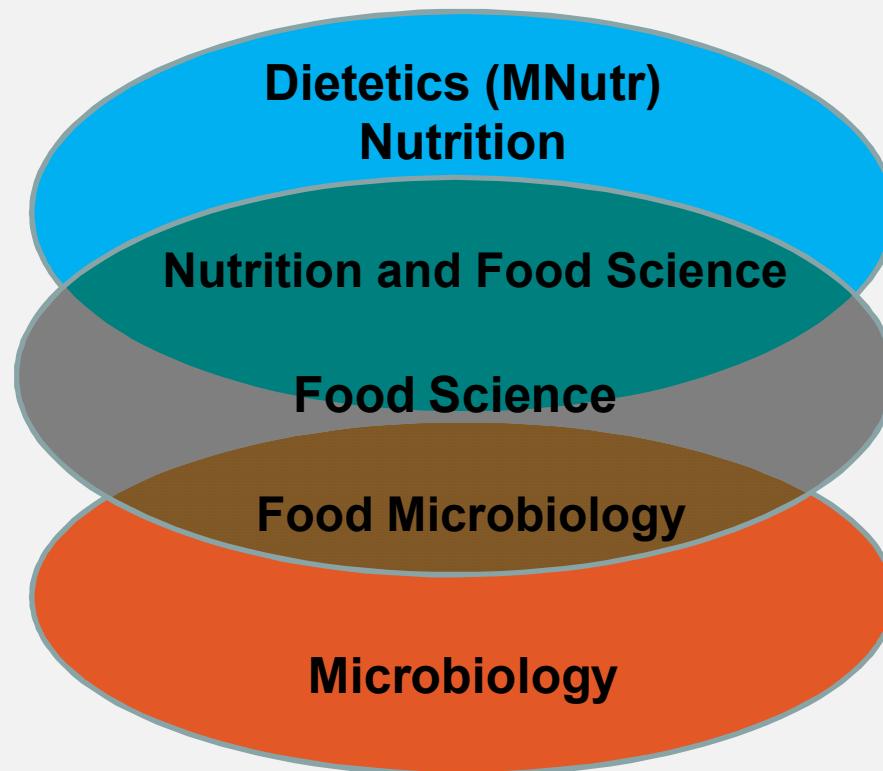
Global Food Security....meeting the demand

- “Sustainable intensification”
 - Application and utilisation of sustainable technology
 - Mitigating impact
- Management of waste
 - 30-50% of all food produced is wasted
- Ensuring Adequate Nutrition
 - Combating under- and over- nutrition



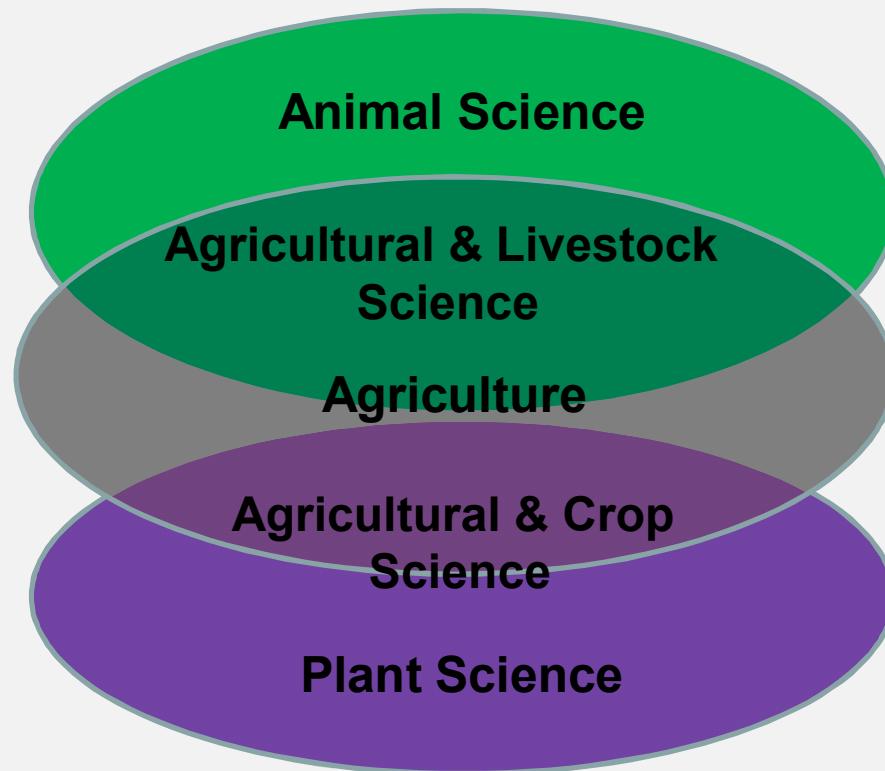
What should I study?

Interested in Food, Nutrition & Health?



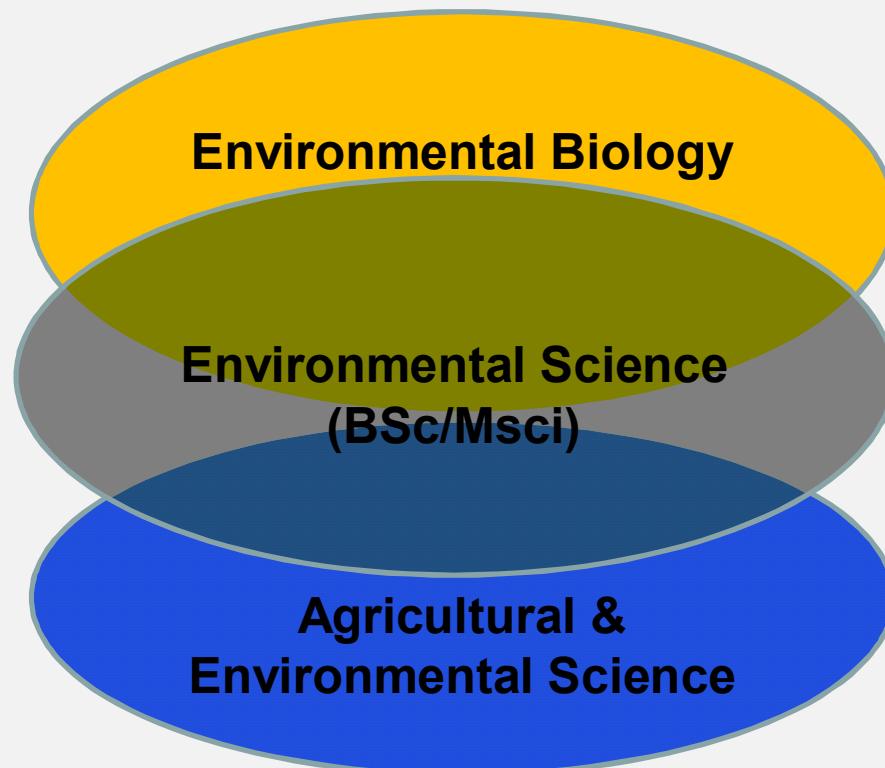
What should I study?

Interested in Agriculture, Plants & Animals?



What should I study?

Interested in Environment?



How can I do Bioscience degree?

- A-levels - need at least 2 science A-levels + 1 other
 - Often Biology & Chemistry preferred
 - Other subjects accepted, but dependent on the degree
 - Grades AAB – BBC dependent on degree
- We accept a range of qualifications
 - IB, BTEC, Access, Foundation courses



What do I do with a Bioscience degree?

- Food manufacturing is the UK's single largest manufacturing sector.
 - 7% of GDP,
 - 3.7M people
 - generating £80Bn per year
- Agri-food made up ~13% of UK national employment



What do I do with a Bioscience degree?

Career Statistics

- 2011/12 graduates (latest figures)
 - 93% who were available for work or study, found employment or further study within six months of graduation.
- The average starting salary was £20,089.

**Please see our careers booklet or visit our Website:
<http://www.nottingham.ac.uk/biosciences/study-with-us/undergraduate/careers-success.aspx>**

What do I do with a Bioscience degree?

Food related areas....

Food producers and supermarkets



Animal related areas....

Agricultural and medical industry



Plant related areas

Agricultural and Agronomy



Nutrition related areas

Food and medical industry as well as Dietetics



Questions?

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