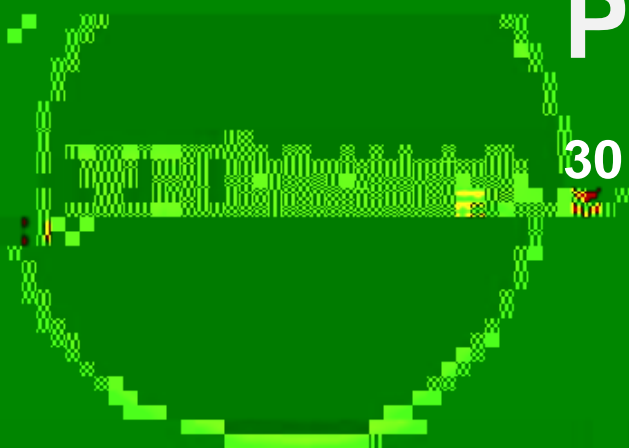




# Principles of Fermentation Processes

30 September - 2 October 2024



# MBI Training Programme

## Principles of Fermentation Processes

30 September - 2 October 2024

---

Welcome to the UCL MBI Principles of Fermentation Processes module.

This module is designed to create a foundation in fermentation processes. The underlying principles of fermentation are introduced through a series of lectures, which are supported by case studies. This module provides the basis for the material presented in later modules on fermentation process design and operation and mammalian stem cell processes. This module is suitable for scientists and engineers who wish to familiarise themselves with fermentation processes and those who wish to build underlying principles into their operational expertise.

---

### Module Coverage:

Modes of fermentation and their application



# MBI Training Agenda

**Monday, 30 September 2024**

Design Suite, Bernard Katz Building

---

**10.45am**  
**Registration**

**11.00am**  
**Introduction to MBI Training Programme and Module**  
Frank Baganz, UCL and Olivia Festy, UCL

This session will cover the objectives of:

- (i) Lectures
- (ii) Case Studies

**11.30am**  
**Evaluation of Different Expression Systems**  
Darren Nesbeth, UCL

In this lecture we will consider several expression systems for the production of recombinant proteins. Many different expression systems are available to the fermentation scientist, all with distinct advantages and disadvantages. In particular we will discuss mammalian cell, insect cell, fungal cell (Pichia and Aspergillus) and bacterial cell (E. coli) systems. Mechanisms of operation, processing methods, examples and comparisons between these systems will be made and a summary showing the trade-offs between the different systems will highlight the challenges involved in final selection.

**12.15pm**



# MBI Training Agenda

**Tuesday, 1 October 2024**

---

**9.30am**



media are highlighted with reference to the areas of application.

11



[ucl.ac.uk/mbi](https://ucl.ac.uk/mbi)

