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| **What will we be learning?**  **Year 12 Communicable Diseases** | **Why this? Why now?**  Previous Learning  Future Learning  Enquiry Processes  Analyse Patterns, Draw conclusions, Present data, Justify opinions, Collect data, Present data, Plan variables | **Key Words:**  **Active immunity**  **Allergen**  **Antibody**  **Antibody:antigen complex**  **Antigen**  **Antigen binding site**  **Antigenic variability**  **B cell (B lymphocyte)**  **Cellular immunity**  **Clone**  **Constant region**  **Cytotoxic T cell**  **Helper T cell**  **Herd immunity**  **Humoral immunity**  **Immunity**  **Memory cell**  **Non-specific immunity**  **Passive immunity**  **Pathogen**  **Phagocyte**  **Phagocytosis**  **Phagosome**  **Plasma cell**  **Receptor**  **Specific immunity**  **T cell (T lymphocyte**  **Vaccination**  **Variable region** |
| **What will we learn?**   * About the different types of pathogen that can cause communicable diseases in plants and animals and how they are transmitted * How plants defend against pathogens * The primary non-specific defences against pathogens in animals * The structure and mode of action of phagocytes and how to draw cells observed in blood smears * The structure, different roles and modes of action of B and T lymphocytes in the specific immune response * The structure and general functions of antibodies and an outline of the action of opsonins, agglutinins and anti-toxins * The differences between active and passive immunity, and between natural and artificial immunity * Autoimmune diseases * The principles of vaccination and the role of vaccination programmes in the prevention of epidemics * Possible sources of medicines and the benefits and risks of using antibiotics to manage bacterial infection.   **Misconceptions in this topic** | |
| **What opportunities are there for wider study?**  Careers  Horticulture Biochemistry Fisheries Work Nursing Medicine Laboratory Work Teaching Dentistry Pharmacology Biotechnology Veterinary Work Paramedical Science  STE(A)M  https://highcliffe.sharepoint.com/sites/LearnSTEM | |
| **How will I be assessed?**  End of topic assessment  PAG 7.1 | |