

Name: Sam-sedi oshiolene Presley

Matrix no: 18/SCI05/012

Title: Microbial colonization and succession on human hair

Aim: To understand microbial colonization and succession on human hair

Materials: PDA, nutrient agar, blood agar, hand gloves, plastic bags, petri dish, spirit lamp, inoculating loop

Procedure: The sample was placed in a plastic bag and transferred to the laboratory and kept in a cool place until fungal assay is performed (freezer) for two to three days. Then the agar was prepared and were properly weighted and mixed with 100ml of distilled water in a conical flask and was then placed in an autoclave for 15mins at a temperature of 121°C, the agar was distributed into the petri dish and allow to solidify

Using hand gloves the hair sample was taken from the plastic bag and sprinkled on the medium and were placed in the incubator at a temperature of 37°C and was observed.

Result:

Day one: no observable change

Day two: presence of fungi but were not in large population

Day three: doubling of the fungi population

Day four: bacteria growth occurred even though fungi was still present in the media

Day five: doubling of bacteria growth

Day six: fungi was not present

Each organism (both fungi and bacteria) found was sub-cultured so as to enable us identify the organism

*fungi- *Aspergillus niger*, *pencillum spp*

*bacteria- *Staphylococcus haemolyticus* which is gram positive and micrococcus spp which is gram negative

In conclusion : A variety of keratinolytic fungi and pathogenic bacteria are found in human hair.