

# [Importance of microbiology assignment](https://assignbuster.com/importance-of-microbiology-assignment/)

While microbes are often viewed negatively due to their association with many human illnesses, microbes are also responsible for many beneficial processes such as industrial fermentation (e. G. The production of alcohol and dairy products), antibiotic production and as vehicles for cloning in higher organisms such as plants. Scientists have also exploited their knowledge of microbes to produce biotechnological important enzymes such as Tag polymerase, reporter genes for use in other genetic systems and novel molecular biology techniques such as the east two-hybrid system.

Bacteria can be used for the industrial production of amino acids. Crematoriums glutamine is one of the most important bacterial species with an annual production of more than two million tons of amino acids, mainly L-glutamate and L-lysine. A variety of polymers, such as polysaccharides, polyesters, and polypeptides, are produced by microorganisms. Microorganisms are used for the biotechnological production of polymers with tailored properties suitable for high-value medical application such as tissue engineering and drug delivery.

Microorganisms are used for the biosynthesize of Jonathan, alginate, cellulose, canopying, poly(gamma- glutamate acid), eleven, hallucinatory acid, organic acids, electrocardiographs and polysaccharide, and polyhydroxyalkanoates. Microorganisms are beneficial for microbial biodegrading or premeditation of domestic, agricultural and industrial wastes and subsurface pollution in soils, sediments and marine environments. The ability of each microorganism to degrade toxic waste depends on the nature of each contaminant.

Since most sites are typically impressed of multiple pollutant types, the most effective approach to microbial biodegrading is to use a mixture of bacterial species and strains, each specific to the biodegrading of one or more types of contaminants. There are also various claims concerning the contributions to human and animal health by consuming proboscis (bacteria potentially beneficial to the digestive system) and/or properties (substances consumed to promote the growth of proportion microorganisms) Thus microbiology has vast applications by which human beings are benefited. Importance of Microbiology By Panorama