## O 84. THE BIODEGRADATION PROCESSES OF OIL LEAKAGE, REVIEW STUDY

Mosstfa Maaroof<sup>1</sup>, Worod Al-Hajar<sup>2</sup>

<sup>1</sup>Environmental Engineering Department, Engineering Faculty, Selçuk University, Konya, Turkey <sup>2</sup> Collage of Environment, University of Mosul, Mosul, Iraq

E-mail mmaaroof@selcuk.edu.tr ,sanarya.flowrs@gmail.com

**ABSTRACT:** All the Bioremediation processes have become the main method utilized in restoration of oil-polluted environments that make use of natural microbial bio degradative activities. The generalization of Bioremediation for petroleum pollutants overcomes the factors limiting rates of microbial hydrocarbon biodegradation. Regularly this includes utilizing the enzymatic capacities of the indigenous hydrocarbon-degrading microbial populaces and adjusting natural components, specific convergences of molecular oxygen, fixed forms of nitrogen, and phosphate to achieve enhanced rates of hydrocarbon biodegradation. Biodegradation of sleek slop and bioremediation of oil-contaminated locales has been accomplished by oxygen option e.g., by working soils inland cultivating and by including hydrogen peroxide or directing oxygen into oiled aquifers alongside the expansion of nitrogenand phosphorus-containing composts. The achievement of seeding oil slicks with microbial arrangements is questionable. Fruitful bioremediation of a noteworthy marine oil slick has been accomplished in view of the expansion of nitrogen and phosphorus composts. In-situ bioremediation processes of crude oil Leakage and spills rely on either the indigenous microbes at the polluted site, whose degradative abilities are accelerated by adding such agents as fertilizers or dispersants, or on introducing pollutant-degrading microbes into the site (possibly accompanied by stimulatory chemicals). The bioremediation technique to be utilized at a particular site must be chosen to be reasonable for that site and its natural conditions. The essential parts of bioremediation are laid out and the foundation data expected to comprehend the synthetic and organic confinements of the method are displayed. In particular, the microbial group, the raw petroleum substrate synthesis, and natural restricting components are talked about. Summed up cases of bioremediation applications are delineated

Keyword: Bioremediation, Petroleum pollution, oil Leakage, Spills Water contamination.