

**P 8. AN OVERVIEW OF SOIL REMEDIATION TECHNOLOGIES**

Müge Balkaya<sup>1</sup>, Nilgün Balkaya<sup>2\*</sup>

<sup>1</sup>*Department of Geotechnical Engineering, Istanbul Technical University, 34469. Maslak-Istanbul, Turkey*

<sup>2</sup>*Department of Environmental Engineering, Istanbul University-Cerrahpasa, 34320, Avcilar-Istanbul, Turkey*

*E-mail: akarakas@selcuk.edu.tr, mkarakayafizik@hotmail.com*

**ABSTRACT:** Soil pollution is one of the most important environmental problems the world is facing nowadays. The impacts of soil pollution are definitely very important because the pollutants pass through the food chain, the ground water is polluted by these contaminants, humans may be subjected to adverse health effects, and the remediation of a contaminated land generally has a high cost and this process is mostly time consuming. In fact, pollutants directly and indirectly affect the three environments, namely air, water and soil. Soils can be contaminated as a result of air pollution and contaminated surface water used as irrigation water. Improper waste disposal, the excessive use of chemical fertilizers and pesticides in agriculture are among the other reasons for soil pollution. Contaminated soils can be remediated and there are various methods for the remediation of contaminated soils. However, it should be kept in mind that the priority is to protect the soils from contamination and to take the necessary precautions to prevent soil pollution. The technologies used for soil remediation can be divided into three categories as physical/chemical, biological and thermal methods. This review includes an assessment of soil remediation technologies considering geotechnical aspects. In this review, the recent studies on soil remediation are also overviewed.

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