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**Operational approach of the valorization of dredged sediments:
European project USAR**

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ABSTRACT

For several years now there has been a strong increase in world consumption of materials used in the field of civil engineering and in particular materials for public works. Recovery of sediments from marine and river dredging may constitute a significant alternative. This paper examines the issue of treating dredged sediments which is often problematic in all recovery operations because of ever stricter regulatory and economic constraints. The problem consists in finding the optimum set of treatments (solutions) while respecting these constraints. This optimum solution is obtained with a non-linear mathematical model expressed in binary numbers. The method of resolving the problem is based on linearising non-linear constraints to resolve a simpler problem with the aid of a solver. This work comes within the framework of the European Interreg project USAR.