

RISK ASSESSMENT IN ITALY

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Abstract

In the ENI Group, Syndial S.p.A. has the mission of managing environmental activities necessary to restore and re-develop industrial sites that has collected from various companies and carrying on the residual production plants.

Starting from the '80s, financial resources for the remediation activities have been incremented and the passing of remediation law in 1999 marked an important increase of the clean-up activities.

In 1999 Italy adopted a legislation with very low target levels, compared to the other industrialized countries, in order to obtain the “*certificate of remediation*” and with the risk analysis performed only at the end of the remediation process. Not only this law was extremely conservative but moreover the Public Authorities has often adopted a very restrictive interpretation of it, with the consequence to privilege the expensive *dig & disposal* solution in the selection of the remediation technology.

With the new remediation law (D.Lgs. 152/06), Italy has formally filled in the gap with the other industrialized countries concerning the guidelines for environmental activities, fixed by European Directive (Polluter pay principle, Cleanups target level based on risk analysis, Protection of natural resources in general and water in particular, etc) but this law has still problems for its application.

In Italy A.P.A.T., now called I.S.P.R.A. (Italian EPA), published a manual in order to define the guidelines to perform site-specific risk analysis. The manual fixes very conservative figures for those parameters that directly influence the final results (e.g.: Risk index, compliance point, etc.). This conservative approach is causing difficulties on defining realistic remediation target levels, mainly for groundwater remediation.

In order to increase the remediation process and then the re-industrialization of the sites is necessary to perform Risk Analysis as a tool to manage the remediation activities with realistic objectives in comparison to those deriving from a rigid tabular approach. Syndial experience shows that forcing the site-specific level with values of parameters typical of level 1 gives almost the same results of the rigid tabular approach.