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Recommendations for Potential Further Site Works at Site #42; Donnybrook - Pembroke

Dear ,

RSK submitted a Preliminary Environmental Site Assessment (PSA) report for site# 42 Donnybrook - Pembroke (Report ref: 602749 R03 (01) dated December 2019). The site is the location of a leakage of cable fluid from a high voltage (HV) underground cable which occurred in February 2008. It is RSKs understanding that the fluid contained Linear Alkyl Benzene (LAB) and that the total fluid loss was approximately 460 litres.

Following the completion of a risk evaluation for the identified potential pollutant linkages, a potential pollutant linkage with a risk class of moderate/low for risks to the River Dodder from lateral migration in groundwater has been identified. In the report RSK concluded that it would be prudent to recommend further assessment to fully assess potential risks to the River Dodder. This letter outlines recommendations for further works to assess these potential risks.

It is recommended that surface water samples should be taken from the River Dodder at a sampling point in close proximity to the leak location. The objectives of the assessment would be as follows:

- Collect surface water samples for subsequent laboratory analysis;
- Surface water analytical results should be compared to Generic Assessment Criteria (GAC) considered protective of the water environment;
- Complete a Generic Quantitative Risk Assessment (GQRA), as per EPA guidance, to determine the potential for unacceptable risks;
- Provide additional recommendations for further investigation or remediation works if required.

The purpose of the surface water sampling and subsequent laboratory analysis would be to test for the potential presence of linear alkyl benzene and / or the degradation products of linear alkyl benzene.









It is recommended that water samples are analysed for Contaminants of Potential Concern (CoPC) to include;

- speciated Total Petroleum Hydrocarbons (TPH);
- speciated Poly Aromatic Hydrocarbons (PAH);
- Semi Volatile Organic Compounds (SVOC); and
- Polychlorinated Biphenyls (PCBs)

The results of the QRA will inform as to the requirement for any further assessment works.

Due to the low risks identified for all other potential pollutant linkages, there is no recommendation for an intrusive investigation. However, should any works be planned in the vicinity of the leak location which requires excavation of soils, RSK would recommend assigning an engineer to observe soil and groundwater conditions; and to collect soil and groundwater samples for laboratory analysis.

Yours sincerely

For RSK Ireland Limited

Graduate Consultant

Principal Consultant