

# Analysis of Strategic Approaches: A “Sliding Scale” of Options to Modify an Existing Pump-and-Treat Remedy

OPTION	1 Switch off all pumps	2 Same as Option 1, but with Fe gate added.	3 Option 2 + buy impacted land.	4 Option 2 + <i>in situ</i> S/S.	5 Option 4 + excavate and T&D of soils to <i>x</i> ft.	6 Option 4 + excavate and T&D of soils to <i>y</i> ft.
GRAPHICAL DESCRIPTION						
COSTS	<p>• Expect \$100K in transactional costs to manage situation</p> <p><b>Spend</b></p> <p><b>Savings</b></p> <p>\$100K</p> <p>\$1MM/yr</p>	<p>• Could be additional transactional costs</p> <p>• \$50K?</p> <p><b>Spend</b></p> <p><b>Savings</b></p> <p>\$100K</p> <p>“Treatment Gate”</p> <p>\$1MM/yr</p>	<p><b>Spend</b></p> <p>\$500K Land</p> <p>\$100K Gate</p> <p><b>Savings</b></p> <p>\$1MM/yr</p>	<p><b>Spend</b></p> <p>\$600K <i>in situ</i> S/S</p> <p>\$100K Gate</p> <p><b>Savings</b></p> <p>\$1MM/yr</p>	<p><b>Spend</b></p> <p>\$850K Excavation T&amp;D</p> <p>\$500K S/S</p> <p>\$100K Gate</p> <p><b>Savings</b></p> <p>\$1MM/yr</p>	<p><b>Spend</b></p> <p>\$1.23M Excavation T&amp;D</p> <p>\$500K S/S</p> <p>\$100K Gate</p> <p><b>Savings</b></p> <p>\$1MM/yr</p>
OPPORTUNITIES	<p>• Savings immediately realized with minimal effort.</p>	<p>• Gate concept is comfortable to Regulator.</p> <p>• Extremely cost effective treatment.</p>	<p>• Low cost approach to engage adjacent property stakeholder.</p> <p>• Early “ping” of adjacent property stakeholder demeanor</p>	<p>• Small scale pilot for S/S work on S-W site.</p>	<p>• Pilots exactly what might be final approach.</p>	<p>• Maximal interim work that could be “offered” to adjacent property owner.</p>
RISKS	<p>• Ability to obtain regulatory concurrence</p> <p>• Fines</p> <p>• Litigation risk</p>	<p>• May be seen as approach reversal.</p> <p>• Litigation risk</p>	<p>• Very few!</p> <p>• Be prepared to fall back to Options 4 to 6</p>	<p>• Same as 3</p>	<p>• If a scope is clearly spec'd should be little cost growth</p>	<p>• Only issue could be metal impacted groundwater migration</p>