SKPS
Sap & Kaps Petroleum Services l.l.c

Case Study

36” Carbon Steel “Sump Pile” Leak Repair using Clock Spring® Contour Wrap

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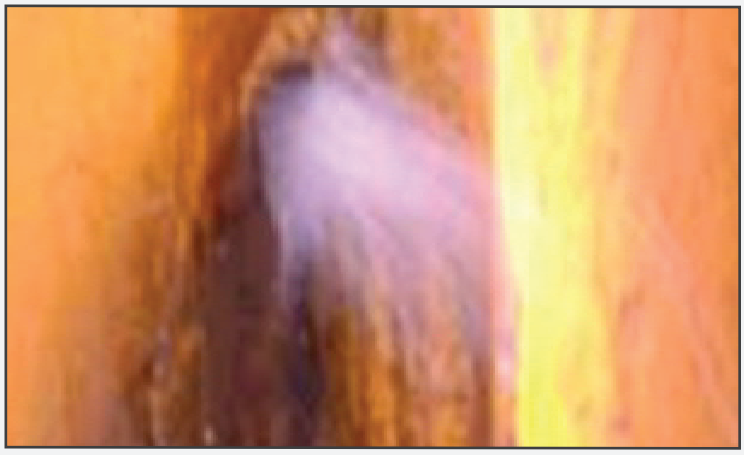
1 Surface Preparation

During a routine inspection, it was noticed that a leak (that eventually ended up being approximately 1” in diameter) had started on the “Sump Pile” as a result of internal corrosion.



2 Patch Plate & Putty Application

Engineers onsite had requested SKPS to design a Clock Spring® Contour repair to ensure the safe operation of the “Sump Pile” without the need for any shutdown due to “hot work”. The leak was temporarily sealed using a patch and leak sealing putty.

3 Clock Spring® Contour Application

SKPS designed a repair in accordance to ISO 24817 to apply a “Clock Spring® Contour” repair. The photo of the “Sump Pile” after the “Clock Spring® Contour reinforcement”.

4 Design Criteria

Operating Pressure	:	5 psi
Operating Temperature	:	62º C
Defect Type	:	Through wall metal loss.
Size	:	36”
Material	:	Carbon Steel
Defect Analysis	:	Pin hole leak and it has been arrested using patch plate with steel putty.