Advantages in using remote monitoring to assess effectiveness of Cathodic Protection in stray current affected areas I.MAGNIFICO

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ABSTRACT:

Remote monitoring introduces the possibility of performing a detailed investigation on cathodic protection, obtaining measurement every second during the whole days and the whole weeks, catching information that manually taken measurement could lose due to their punctual characteristic.

Particularly in areas affected by stray currents, it becomes fundamental monitoring more signals at a time (DC and AC On potential, Eirfree potential) to can verify the respect of the thresholds indicated by the standards, and to check the efficiency of all that devices that are installed to reduce interferences effects (DC and AC dischargers, drainages, etc...).

This work is focused on showing real field experiences where remote monitoring helped to evaluate correctly the cathodic protection effectiveness and highlighting promptly failure conditions before they could cause serious corrosion issues.