## THE ELECTROCHEMICAL CORROSION OF NIQUEL IN SODIUM CHLORIDESULFURIC ACID SOLUTIONS AT DIFFERENT CONCENTRATION RATIOS USING THE POLARIZATION RESISTENCE METHOD

baldemar martinez,<sup>1</sup> oscar molina<sup>1</sup> and oropeza amador<sup>1</sup> <sup>1</sup>Department of Cheminal Engineering ESIQIE-IPN Av. Instituto Politecnico Nacional Mxico, D.F 75876 Mxico

Specimens of Ni were conditioned in the test piece with a work area of 0.2 cm2, each one of them was polished and ising as work electrode, graphite electrode and platinum electrode were using as reference electrode and counter electrode respectively. The electrode was changing each test. The concentration ratios were 1N NaCl (pH=4.29), 1N NaCl: 0.8N H2SO4 (pH=2.01) and 1N NaCl: 1N H2SO4 (pH=1.61) with the volume ratio 1:1 in all cases. The presence of H2SO4 increase the corrotion rate while the pH in modify also. The corrosion intensity was determinate using a potenciometer (BAS CV-27). The scanning rate was 2mV per second. Due to the medium acid provides favorable conditions to the oxide film became in a no resistance film, wich is broke out, consequently exist a pitting surface. The calculation showed a considerable increasing corrosion rate with the presence of H2SO4 solution.