

*ABSTRACT*

The Reheat Furnace is part of the Iron and Steel Complex and it is a Walking Beam type furnace for reheating the billets before they are rolled into wire rods. During operation of the reheat furnace temperatures, pressures, flow-rates, air-to-gas ratios and the energy balance of the system has to be monitored and controlled in order to maintain the quality of the final product. With a Data Acquisition or Direct Digital Control System, the measured values for the above named parameters can be obtained at any point during production. This data could be used for the generation of different reports, for comparing different operating techniques and in the monitoring of the billets used in the Reheat Furnace. This can lead to the development of an optimal solution to the operating practices problem, efficient material handling and improved production of the Reheat Furnace at I.S.C.O.T.T.