

FOULING AND CORROSION OF HEAT TRANSFER SURFACES OF FB BOILERS BURNING ESTONIAN OIL SHALE

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The question of replacing oil shale pulverized firing (PF) boilers with fluidized-bed (FB) boilers arose due to the need to renew Estonian power plants. The data needed for designing FB boilers for oil shale were obtained at test facilities of different companies and by additional laboratory investigations. The results of the investigations demonstrated that combustion of oil shale in circulating fluidized bed is the best way to burn oil shale under atmospheric pressure. This paper deals with the problems of fouling and corrosion of heating surfaces under conditions of FB technology.