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DEVELOPMENT OF BURNERS FOR HIGH-PERFORMANCE COMBUSTION OF COAL-WATER FUEL

The paper focuses on the results of investigations in the development, creation and experimental development work of burners for the high-performance flame combustion of coal-water fuel for thermal power plants. Designs and basic operational aspects of burners are examined. The experimental results for burners of boilers of the E-series commonly used for Ukraine's municipal power engineering are presented. Conclusions are drawn that the burners proposed help providing the direct combustion of coal-water fuel in boilers and convert fuel oil- or gas-designed boilers in coal-water boilers.

Keywords: *boiler, burner, coal-water fuel, flame combustion, cavitation and pulse technology, level of dispersion, granulometric composition.*

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