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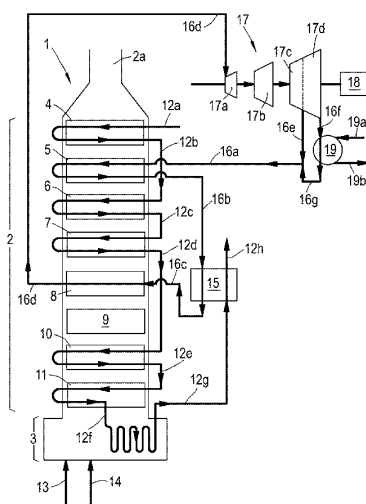
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(54) Title: OLEFINS PRODUCTION PROCESS

Fig.1



(57) Abstract: The invention relates to a process for producing olefins from a feed stream containing hydrocarbons by pyrolytic cracking of the hydrocarbons in a cracker furnace, said process comprising : pre-heating the feed stream outside the cracker furnace; feeding the pre-heated feed stream to a tube in the convection section of the cracker furnace; further pre-heating the feed stream in the convection section; feeding the further pre-heated feed stream to a tube in the radiant section of the cracker furnace; pre-heating an oxygen containing stream; contacting the pre-heated oxygen containing stream with a fuel gas in a burner in the radiant section; and pyrolytic cracking the feed stream in the radiant section resulting in an effluent containing olefins.

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