

Title (en)
VAPOR PLASMA BURNER

Title (de)
WASSERDAMPFPLASMA Brenner

Title (fr)
CHALUMEAU A PLASMA A VAPEUR D'EAU

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Application
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Abstract (en)
[origin: WO2007028183A2] The invention relates to a vapor plasma burner (6) comprising a burner handle (6a) and a burner base (6b). Inside the burner base (6b), a liquid feed line (32), a heating device (26), a burner chamber (27), a cathode (22), connected to a cathode support (28), and an anode (24) which is configured as a nozzle (23) and has an exit opening (25) are arranged. The invention also relates to a cathode (22) and to a nozzle (23) for such a vapor plasma burner (6). The aim of the invention is to provide a vapor plasma burner (6) that can be optimally ignited and the wearing parts of which can be easily removed. For this purpose, the cathode support (28) is configured together with the cathode (22) as an axially displaceable piston and is connected to a spring element (30) in such a manner that the cathode (22), in the rest position, is forced against the nozzle (23) and that the cathode support (28) communicates with the liquid feed line (32) in such a manner that during operation, the cathode (22) is lifted off the nozzle (23) when water is supplied so that an electric arc can be ignited between the cathode (22) and the anode (24).

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