

Title (en)
Gas turbine combustor

Title (de)
Gasturbinenbrennkammer

Title (fr)
Chambre de combustion de turbine à gaz

Publication
EP 2735797 B1 20190109 (EN)

Application
EP 12194022 A 20121123

Priority
EP 12194022 A 20121123

Abstract (en)
[origin: EP2735797A1] A gas turbine combustor (1) includes a combustion cylinder (2), a premixing tube (3), and a pressure injection unit (4). Holes (8) are formed in a peripheral wall (6) of the premixing tube in a tangential direction. An inner wall 9 is provided in the peripheral wall while having a gap (S) therefrom. The compressed air in the gap forms a swirl flow. The compressed air and injected fuel supplied into the inner wall form straight flows each with a predetermined cross-section area in the inner wall under no influence of the swirl flow. They are combusted in the combustion cylinder via a protruding wall (7). The flame is stably retained at an appropriate position apart from the top portion of the combustion cylinder to improve durability without being excessively heated. This may prevent deterioration in durability of the combustion cylinder by the heat by retaining the flame at the appropriate position in the combustion cylinder.

IPC 8 full level
F23R 3/12 (2006.01); **F23R 3/28** (2006.01); **F23R 3/46** (2006.01)

CPC (source: EP)
F23R 3/12 (2013.01); **F23R 3/286** (2013.01); **F23R 3/46** (2013.01)

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