

Title (en)
CYCLONE SEPARATOR

Title (de)
FLIEHKRAFTABSCHNEIDER

Title (fr)
SÉPARATEUR CENTRIFUGE

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Application
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Abstract (en)
[origin: WO2018234539A2] The present invention relates to a cyclone separator for separating at least two phases of a fluid, the separator comprising: a main housing, through which the fluid can flow substantially in a spiral, said housing comprising a separation chamber with an upper and a lower end, the upper and lower end each having a wall; a central axis extending between the two ends; and in addition, a central separation pipe in the conical separation chamber, arranged concentrically with the central axis of the main housing, the pipe having a substantially cylindrical wall with a surface that faces the inner cross-section and that has a first surface profile and with a surface that faces away from the inner cross-section and that has a second surface profile. The cyclone separator according to the invention is characterised in that the upper end of the main housing is provided with: a head section with an inner radius and at least one inlet opening for the fluid, attached substantially tangentially; and at least one light-fraction outlet opening with a cross-section, and in that the lower end is provided with at least one expansion chamber and at least one heavy-fraction outlet opening. The cyclone separator according to the invention is also characterised in that at least some portions of the separation chamber taper conically towards the lower end, preferably in graduated succession with a constant taper angle α .

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