

Title (en)
APPARATUS AND METHOD FOR COMPRESSING AND/OR COOLING AND PURIFYING A CARBON DIOXIDE RICH GAS CONTAINING WATER

Title (de)
VORRICHTUNG UND VERFAHREN ZUR KOMPRIMIERUNG UND/ODER KÜHLUNG UND REINIGUNG EINES KOHLENDIOXIDREICHEN GASES MIT WASSER

Title (fr)
APPAREIL ET PROCÉDÉ DE COMPRESSION ET/OU REFROIDISSEMENT AINSI QUE DE PURIFICATION D'UN GAZ RICHE EN DIOXYDE DE CARBONE CONTENANT DE L'EAU

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Application
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Abstract (en)
[origin: WO2015067897A1] The invention relates to an apparatus for compressing and/or cooling and purifying a feed gas that is rich in carbon dioxide and contains water and impurities and at least one other component, wherein said apparatus includes a compressor (C) and/or a cooler, means for delivering the feed gas into the compressor, means for recovering the water (H), contained in the feed gas, condensed during the compression, a unit (E) for purification by adsorption containing adsorbent beds (E1, E2), means for delivering the compressed feed gas to the purification unit in order to produce a compressed and dried feed gas, a unit for purification at sub-ambient temperature (CPU), means for delivering the compressed and dried feed gas (7) to the purification unit, means for extracting a fluid enriched with carbon dioxide (10) from the purification unit and means for mixing a gas (13) that has been used as a regeneration gas of an adsorption bed with at least one portion of the condensed water.

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