

Title (en)

ELECTROCHEMICAL SENSOR TO DETERMINE THE OXYGEN CONCENTRATION IN GAZ MIXTURES

Title (de)

ELEKTROCHEMISCHER SENSOR ZUR BESTIMMUNG DER SAUERSTOFFKONZENTRATION IN GASGEMISCHEN

Title (fr)

CAPTEUR ELECTROCHIMIQUE PERMETTANT DE DETERMINER LA CONCENTRATION D'OXYGENE DANS DES MELANGE GAZEUX

Publication

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Application

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Abstract (en)

[origin: US5630920A] PCT No. PCT/DE95/00253 Sec. 371 Date Jan. 19, 1996 Sec. 102(e) Date Jan. 19, 1996 PCT Filed Feb. 28, 1995 PCT Pub. No. WO95/25276 PCT Pub. Date Sep. 21, 1995An electrochemical sensor for determining the oxygen concentration in gas mixtures is proposed. The sensor has a solid electrolyte (10) with oxygen ionic conductivity, which has a measuring electrode (11) that does not catalyze establishment of equilibrium of the gas mixture and is exposed to the gas mixture. The measuring electrode (11) contains platinum and bismuth. The effect of these materials is that the free oxygen contained in the gas mixture is preferentially adsorbed, without reacting with the other gas components such as CO and HC.

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