

Title (en)  
METHANE CONVERSION APPARATUS AND PROCESS USING A SUPERSONIC FLOW REACTOR

Title (de)  
METHANUMWANDLUNGSVORRICHTUNG UND -VERFAHREN UNTER VERWENDUNG EINES ULTRASCHALLSTRÖMUNGSREAKTORS

Title (fr)  
APPAREIL DE CONVERSION DE MÉTHANE ET PROCÉDÉ UTILISANT UN RÉACTEUR À FLUX SUPERSONIQUE

Publication  
**EP 3641926 A1 20200429 (EN)**

Application  
**EP 18821165 A 20180619**

Priority  
• US 201715629447 A 20170621  
• US 2018038171 W 20180619

Abstract (en)  
[origin: WO2018236790A1] Apparatus and methods are provided for converting methane in a feed stream to acetylene. A hydrocarbon stream is introduced into a supersonic reactor and pyrolyzed to convert at least a portion of the methane to acetylene. The reactor effluent stream may be treated to convert acetylene to another hydrocarbon process.

IPC 8 full level  
**B01J 3/00** (2006.01); **B01J 19/02** (2006.01); **B01J 19/24** (2006.01); **B01J 19/26** (2006.01); **C07C 2/76** (2006.01); **C07C 11/24** (2006.01)

CPC (source: EP RU)  
**B01J 3/00** (2013.01 - RU); **B01J 4/002** (2013.01 - EP); **B01J 19/0013** (2013.01 - EP); **B01J 19/002** (2013.01 - EP); **B01J 19/02** (2013.01 - EP); **B01J 19/2405** (2013.01 - EP); **B01J 19/26** (2013.01 - EP); **C07C 2/78** (2013.01 - EP); **B01J 2219/00063** (2013.01 - EP); **B01J 2219/00076** (2013.01 - EP); **B01J 2219/00078** (2013.01 - EP); **B01J 2219/00081** (2013.01 - EP); **B01J 2219/00083** (2013.01 - EP); **B01J 2219/00092** (2013.01 - EP); **B01J 2219/00094** (2013.01 - EP); **B01J 2219/00119** (2013.01 - EP); **B01J 2219/00121** (2013.01 - EP); **B01J 2219/0027** (2013.01 - EP); **B01J 2219/0218** (2013.01 - EP); **B01J 2219/0236** (2013.01 - EP)

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**WO 2018236790 A1 20181227**; CA 3067826 A1 20181227; CN 110769926 A 20200207; CN 110769926 B 20220624; EP 3641926 A1 20200429; EP 3641926 A4 20210414; RU 2019142726 A 20210621; RU 2019142726 A3 20210930; RU 2767113 C2 20220316

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