

Title (en)
PIPE

Title (de)
ROHR

Title (fr)
TUYAU

Publication
EP 2611999 A1 20130710 (DE)

Application
EP 11743782 A 20110810

Priority
• DE 102010044399 A 20100904
• EP 2011003990 W 20110810

Abstract (en)
[origin: WO2012028250A1] A pipe, in particular in the air supply system of internal combustion engines which are provided, in particular, with an intake system and/or control electronics, is described, wherein the internal pipe and/or the internal pipe surface (1) have/has at least one element (1, 5, 6) which changes the diameter (2) of the internal pipe and/or the cross-sectional area of the internal pipe.

IPC 8 full level
F01N 3/025 (2006.01); **F01N 3/20** (2006.01); **F16K 15/14** (2006.01)

CPC (source: EP US)
F01N 3/025 (2013.01 - EP US); **F01N 3/2033** (2013.01 - EP US); **F16L 55/02754** (2013.01 - US); **F16L 55/134** (2013.01 - EP US); **F23L 3/00** (2013.01 - EP US); **F23N 5/245** (2013.01 - EP US); **F01N 2240/14** (2013.01 - EP US); **F23N 2225/20** (2020.01 - EP US); **F23N 2231/28** (2020.01 - EP US); **F23N 2235/06** (2020.01 - EP US); **Y02T 10/12** (2013.01 - EP US); **Y10T 29/49826** (2015.01 - EP US)

Citation (search report)
See references of WO 2012028250A1

Citation (examination)
• DE 4135271 A1 19930429 - FREUDENBERG CARL FA [DE]
• EP 0724110 A1 19960731 - MANN & HUMMEL FILTER [DE]
• DE 10004261 A1 20000817 - AVL LIST GMBH [AT]

Designated contracting state (EPC)
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

DOCDB simple family (publication)
DE 102010044399 A1 20120308; EP 2611999 A1 20130710; US 2013180613 A1 20130718; US 8985155 B2 20150324; WO 2012028250 A1 20120308

DOCDB simple family (application)
DE 102010044399 A 20100904; EP 11743782 A 20110810; EP 2011003990 W 20110810; US 201113820727 A 20110810