

Title (en)

Device for moving a bow ramp and bow ramp module

Title (de)

Vorrichtung zum Verschwenken einer Bugklappe sowie Bugklappenmodul

Title (fr)

Dispositif de basculement d'une porte d'étrave et module de porte d'étrave

Publication

EP 2394879 B1 20161214 (DE)

Application

EP 10165279 A 20100608

Priority

EP 10165279 A 20100608

Abstract (en)

[origin: EP2394879A1] The device has a primary and secondary pivot levers connected to a front hatch (1). Primary and secondary actuating elements are connected to a chassis which are connected to interact with primary and secondary pivot levers. A synchronization element is extended along the common rotational axis and connected to the pivot levers. The front hatch is connected to the vehicle chassis through the quadruple joint. Each of the primary and secondary actuating elements comprises an actuating cylinder which has an extendable and retractable piston.

IPC 8 full level

B61D 17/06 (2006.01)

CPC (source: EP KR US)

B61D 15/06 (2013.01 - KR); **B61D 17/06** (2013.01 - EP KR US); **B61F 19/02** (2013.01 - KR); **B61F 19/04** (2013.01 - KR)

Cited by

US10279819B2; CN105109503A; CN112969624A; EP2949538A1; US8607713B2; WO2015180838A1; WO2013024142A1; WO2020094426A1; WO2016174070A1

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 SE SI SK SM TR

DOCDB simple family (publication)

EP 2394879 A1 20111214; EP 2394879 B1 20161214; AU 2011202010 A1 20111222; AU 2011202010 B2 20140130; CN 102310865 A 20120111; CN 102310865 B 20141008; JP 2011255886 A 20111222; KR 101290452 B1 20130726; KR 20110134267 A 20111214; RU 2011122905 A 20121220; US 2011296762 A1 20111208; US 8468953 B2 20130625

DOCDB simple family (application)

EP 10165279 A 20100608; AU 2011202010 A 20110502; CN 201110136540 A 20110524; JP 2011125120 A 20110603; KR 20110047330 A 20110519; RU 2011122905 A 20110606; US 201113155886 A 20110608