

Title (en)
Guided lifting device with damped emergency braking device

Title (de)
Geführte Hebeeinrichtung mit gedämpfter Fangvorrichtung

Title (fr)
Installation de levage guidée avec parachute amorti

Publication
EP 1657203 A3 20080213 (DE)

Application
EP 05024622 A 20051111

Priority
DE 202004017587 U 20041112

Abstract (en)
[origin: EP1657203A2] A safety brake system for a lift cabin operates automatically when the downwards acceleration exceeds a set safety level. The spring loaded brakes apply brake pads to the guide and brake rail fitted to the lift shaft. A pneumatic/hydraulic servo system holds off the spring loaded brakes and the servo pressure is released to apply the brakes in an emergency. The brake release control includes a telescopic damping element with a release valve (14) which applies the safety braking force in a progressive ramp type control. This ensures that a lightly loaded lift cabin is stopped before the maximum pressure is applied. The applied brake pressure is proportional to the distance travelled by the cabin following application of the brakes.

IPC 8 full level
B66B 5/04 (2006.01); **B66D 5/00** (2006.01)

CPC (source: EP)
B66B 5/04 (2013.01); **B66B 5/18** (2013.01); **B66D 5/00** (2013.01)

Citation (search report)

- [DA] EP 0648703 A1 19950419 - INVENTIO AG [CH]
- [A] DE 2932485 A1 19810326 - RUHRKOHLE AG, et al
- [A] DE 1002933 B 19570221 - BBC BROWN BOVERI & CIE

Cited by
DE102016217790A1; CN107207203A; US9738491B2; WO2016120227A3; WO2020115304A1; WO2018050577A1; US11117782B2

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)
AL BA HR MK YU

DOCDB simple family (publication)
DE 202004017587 U1 20050120; EP 1657203 A2 20060517; EP 1657203 A3 20080213

DOCDB simple family (application)
DE 202004017587 U 20041112; EP 05024622 A 20051111