

Title (en)

LOW RISE VEHICLE LIFT AND METHOD OF OPERATION

Title (de)

NIEDERAUFSTIEG-FAHRZEUGHEBEBÜHNE UND BETRIEBSVERFAHREN

Title (fr)

PONT ÉLÉVATEUR DE VÉHICULE À FAIBLE MONTÉE ET PROCÉDÉ DE FONCTIONNEMENT

Publication

EP 4188863 A1 20230607 (EN)

Application

EP 21849810 A 20210729

Priority

- US 202063058434 P 20200729
- US 2021043800 W 20210729

Abstract (en)

[origin: WO2022026776A1] An apparatus, system and methods for operating an automatic computer vision based low rise vehicle lift. The system and methods involve performing computer vision processes to identify lifting points on the underside of a vehicle based on captured images. Based on the position of the lifting points in a common coordinate system, a lift control system calculates a displacement required to position swing arms and lifting blocks housed in each swing arm under the identified lifting points. The system may then actuate the swing arms and lifting blocks based on these calculations as well as actuate hydraulic cylinders to lift the lifting blocks into contact with the vehicle. The vehicle may then be lifted to a predetermined height where locking link assemblies may engage the locking racks in the base plate to lock the lift in place and transfer the load away from the hydraulic cylinders.

IPC 8 full level

B66F 7/08 (2006.01); **B60S 9/12** (2006.01); **B66F 1/00** (2006.01); **B66F 7/06** (2006.01); **B66F 7/26** (2006.01); **B66F 7/28** (2006.01)

CPC (source: EP)

B66F 7/0658 (2013.01); **B66F 7/28** (2013.01)

Citation (search report)

See references of WO 2022026776A1

Cited by

US11986947B2; US12090626B2

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

Designated extension state (EPC)

BA ME

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

WO 2022026776 A1 20220203; CA 3186687 A1 20220203; EP 4188863 A1 20230607

DOCDB simple family (application)

US 2021043800 W 20210729; CA 3186687 A 20210729; EP 21849810 A 20210729