Title (en)

METHOD AND DEVICE FOR DETECTING CONTAINERS WHICH HAVE FALLEN OVER AND/OR ARE DAMAGED IN A CONTAINER MASS FLOW

Title (de)

VERFAHREN UND VORRICHTUNG ZUR ERKENNUNG VON UMGEFALLENEN UND/ODER BESCHÄDIGTEN BEHÄLTERN IN EINEM BEHÄLTERMASSENSTROM

Title (fr)

PROCÉDÉ ET DISPOSITIF DE DÉTECTION DE CONTENEURS QUI SONT TOMBÉS ET/OU SONT ENDOMMAGÉS DANS UN FLUX MASSIQUE DE CONTENEURS

Publication

EP 4069440 A1 20221012 (DE)

Application

EP 20808055 A 20201116

Priority
- DE 102019132830 A 20191203
- EP 2020082172 W 20201116

Abstract (en)

[origin: WO2021110392A1] Method for detecting containers (3) which have fallen over and/or are damaged in a container mass flow, wherein the containers (2, 3) in the container mass flow are transported vertically on a transporter, wherein the container mass flow is captured as an image data stream using at least one camera, and wherein the image data stream is evaluated by an image processing unit, wherein the image data stream is evaluated by the image processing unit using a deep neural network in order to detect and locate the containers (3) which have fallen over and/or are damaged.

IPC 8 full level

B07C 5/12 (2006.01); **G05B 13/02** (2006.01)

CPC (source: EP US)

B07C 5/3408 (2013.01 - EP US); **G05B 13/027** (2013.01 - EP); **G06F 18/24133** (2023.01 - EP); **G06T 7/0004** (2013.01 - US); **G06T 7/70** (2016.12 - US); **G06V 20/10** (2022.01 - EP US); B07C 2501/0063 (2013.01 - EP US); G06T 2207/10144 (2013.01 - US); G06T 2207/10152 (2013.01 - US); G06T 2207/20081 (2013.01 - US); G06T 2207/20084 (2013.01 - US); G06T 2207/30108 (2013.01 - US)

Citation (search report)

See references of WO 2021110392A1

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

DOCDB simple family (publication)

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DOCDB simple family (application)

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