

Title (en)

Automatic apparatus for loading cones on a creel

Title (de)

Vorrichtung zum Bestücken der Spulendorne eines Spulengatters

Title (fr)

Dispositif pour garnir les broches d'un cantre

Publication

**EP 1600536 A1 20051130 (EN)**

Application

**EP 05011013 A 20050520**

Priority

IT MI20041037 A 20040524

Abstract (en)

An automatic apparatus for loading cones on a creel comprises accumulating means (2) for accumulating cones on pallets, depalletizing means (3) for removing the cones, and means (6) for determining the position of the cones and means (4) for loading the cones on the creel (5). <??>The system (1) allows to perform the steps of accumulating, depalletizing, determining the position and loading the cones on the creel (5), through an anthropomorph robot (3) which, by other electropneumatic and electronic devices, takes the pieces or cones (9) arranged in an ordered manner on pallets. <IMAGE>

IPC 1-7

**D02H 1/00**; B65H 67/06

IPC 8 full level

**B65H 67/06** (2006.01); **D02H 1/00** (2006.01)

CPC (source: EP)

**B65H 67/064** (2013.01); **D02H 1/00** (2013.01)

Citation (search report)

- [XY] US 2002098065 A1 20020725 - WOLF JORG [DE], et al
- [XA] DE 4036128 A1 19910529 - STAEUBLI AG [CH]
- [Y] DE 3630904 A1 19870430 - BARMAG BARMER MASCHF [DE]
- [X] PATENT ABSTRACTS OF JAPAN vol. 018, no. 107 (C - 1169) 22 February 1994 (1994-02-22)
- [X] PATENT ABSTRACTS OF JAPAN vol. 009, no. 213 (M - 408) 30 August 1985 (1985-08-30)
- [Y] PATENT ABSTRACTS OF JAPAN vol. 016, no. 063 (C - 0911) 18 February 1992 (1992-02-18)
- [A] PATENT ABSTRACTS OF JAPAN vol. 018, no. 533 (C - 1259) 11 October 1994 (1994-10-11)
- [A] PATENT ABSTRACTS OF JAPAN vol. 018, no. 533 (C - 1259) 11 October 1994 (1994-10-11)
- [A] PATENT ABSTRACTS OF JAPAN vol. 015, no. 235 (M - 1125) 17 June 1991 (1991-06-17)

Cited by

EP2045380A3; US2020031608A1; US11738966B2

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 MC NL PL PT RO SE SI SK TR

DOCDB simple family (publication)

**EP 1600536 A1 20051130**; IT MI20041037 A1 20040824

DOCDB simple family (application)

**EP 05011013 A 20050520**; IT MI20041037 A 20040524