Title (en)

METHOD AND FACILITY FOR COMPOSING A BATCH OF PARTS FROM PARTS SITUATED IN DIFFERENT STORAGE AREAS

Title (de

VÉRFAHREN UND ANLAGE ZUR ZUSAMMENSTELLUNG EINES CHARGE VON TEILEN AUS TEILEN IN VERSCHIEDENEN LAGERBEREICHEN

Title (fr)

PROCEDE ET INSTALLATION PERMETTANT DE CONSTITUER UN LOT DE PIECES A PARTIR DE PIECES SITUEES DANS DES ZONES DE STOCKAGE DIFFERENTES

Publication

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Application

EP 16819347 A 20161202

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Abstract (en)

[origin: WO2017093683A1] Method for automatically composing, by means of a polyarticulated system (7) subject to at least one vision system (2), at least one batch of parts (6) in a receiving area (10) from parts situated in at least two different storage areas (5, 13), said polyarticulated system comprising at least two distinct gripping members, each able to grasp a part (6) by at least one specific grip area. According to the invention, the method comprises at least the stages consisting of: - automatically moving the polyarticulated system (7) to a first storage area (5, 13) and of: (i) capturing an image of the storage area (5, 13) by means of the vision system (2); (ii) processing the resulting information from the image and identifying all the grip areas of the parts (6) that are compatible with the gripping members; (iii) locating, in position and orientation, the identified grip areas; (iv) selecting the grip area which has the greatest chance of being grasped by a gripping member and which has no collision constraint, and automatically calculating, for said corresponding gripping member, a path for gripping the part by the selected grip area; (v) grasping the corresponding part (6) following the calculated path, and automatically moving the polyarticulated system (7) to the receiving area (10) to deposit said part (6) there; - automatically moving the polyarticulated system (7) to a second storage area (5, 13) and repeating steps (i) to (v).

IPC 8 full level

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CPC (source: EP)

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Citation (examination)

R. DETRY ET AL: "Abstract", PALADYN, JOURNAL OF BEHAVIORAL ROBOTICS, vol. 2, no. 1, 1 January 2011 (2011-01-01), pages 1 - 17, XP055692969, DOI: 10.2478/s13230-011-0012-x

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