

Title (en)

METHOD AND DEVICE FOR SEPARATING MULTILAYER COMPOSITE MATERIALS

Title (de)

VERFAHREN UND VORRICHTUNG ZUM TRENNEN VON MULTISCHICHTVERBUNDMATERIALIEN

Title (fr)

PROCÉDÉ ET DISPOSITIF POUR SÉPARER DES MATÉRIAUX COMPOSITES MULTICOUCHE

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Application

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Abstract (en)

[origin: WO2022218481A1] The invention relates to a method and a device for separating multilayer composite material in which valuable material is located between two layers of the multilayer composite material, in particular in the form of photovoltaic modules (PV), TFT, OLED, or LCD displays, consisting of at least one lower hard layer (1) and at least one soft layer (2, 3) located thereon, wherein one or more layers of the multilayer composite material to be separated is cut in layers or as a whole using at least one high-pressure water jet and is then raised and individualized, and one or more nozzles which discharge the high-pressure water jet are rotated by means of a rotatable nozzle head (DK) about a rotational axis (L) of the nozzle head (DK) while at the same time the nozzle head (DK) and the multilayer composite material are moved relative to each other such that the valuable materials lie freely individually or on the separated layers after the separation process. The device has at least one nozzle (D1, D2) for discharging at least one respective high-pressure water jet, and at least one nozzle head (DK) has a nozzle (DK) arranged outside of the rotational axis of the nozzle head (DK).

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