

Title (en)
METHOD FOR DETERMINING A RESPECTIVE BOUNDARY OF AT LEAST ONE OBJECT, SENSOR DEVICE, DRIVER ASSISTANCE DEVICE
AND MOTOR VEHICLE

Title (de)
VERFAHREN ZUR BESTIMMUNG EINER JEWEILIGEN GRENZE VON MINDESTENS EINEM OBJEKT, SENSORVORRICHTUNG,
FAHRERASSISTENZVORRICHTUNG UND KRAFTFAHRZEUG

Title (fr)
PROCÉDÉ POUR DÉTERMINER UNE LIMITE RESPECTIVE D'AU MOINS UN OBJET, DISPOSITIF DE CAPTEUR, DISPOSITIF D'ASSISTANCE
AU CONDUCTEUR ET VÉHICULE AUTOMOBILE

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EP 15722677 A 20150429

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Abstract (en)
[origin: WO2015176933A1] The invention relates to a method for determining a respective boundary (8) of at least one object (7) in an environmental region (5) of a motor vehicle (1) based on sensor data of an optical sensor (3) of a sensor device (2) of the motor vehicle (1), wherein the following steps are performed by means of an image processing device (4) of the sensor device (2). A point cloud (11) with a plurality of points (10) is determined based on the sensor data and the point cloud (11) is transformed into a plan view image (13), which represents the environmental region (5) of the motor vehicle (1). With the image processing device (4), the following steps are performed in the plan view image (13). A reference point (14) is determined in the plan view image (13), which describes a position of the optical sensor (3), and the plan view image (13) is divided into a plurality of segments (15) starting from the reference point (14). Furthermore, a respective selection point (9) from the points (10) of the point cloud (11) is determined in the respective segment (15), wherein the respective selection point (9) in the segment (15) has the lowest distance to the reference point (14) compared to the other points (10) of the point cloud (11) in the segment (15). The respective boundary (8) of the at least one object (7) is determined based on the respectively determined selection points (9).

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