

Title (en)
SPAD-BASED LIDAR SYSTEM

Title (de)
SPAD-BASIERTES LIDAR-SYSTEM

Title (fr)
SYSTÈME LIDAR À BASE DE SPAD (PHOTODIODES AVALANCHE À PHOTON UNIQUE)

Publication
EP 3602124 A1 20200205 (DE)

Application
EP 18712567 A 20180319

Priority

- DE 102017204586 A 20170320
- EP 2018056843 W 20180319

Abstract (en)
[origin: WO2018172258A1] The invention relates to a LIDAR system comprising a transmitting device for light; a receiving device for light, having a first and a second photon detector; and an evaluation device, which is configured to determine a time period between the emission of light by means of the transmitting device and the incidence of the light reflected at an object on the receiving device. The transmitting device is configured to emit superimposed horizontally and vertically polarized light; the first photon detector is configured for the detection of only horizontally polarized light, and the second photon detector is configured for the detection of only vertically polarized light; in addition, the evaluation device is configured to determine the time period on the basis of light which is incident on both photon detectors within a predetermined interval.

IPC 8 full level
G01S 17/42 (2006.01); **G01S 7/4861** (2020.01); **G01S 7/4865** (2020.01); **G01S 7/487** (2006.01); **G01S 7/493** (2006.01); **G01S 7/499** (2006.01);
G01S 17/18 (2020.01); **G01S 17/931** (2020.01)

CPC (source: EP US)
G01S 7/4861 (2013.01 - EP); **G01S 7/4865** (2013.01 - EP); **G01S 7/4876** (2013.01 - EP); **G01S 7/493** (2013.01 - EP);
G01S 7/499 (2013.01 - EP US); **G01S 17/18** (2020.01 - US); **G01S 17/42** (2013.01 - EP US); **G01S 17/931** (2020.01 - EP)

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)
DE 102017204586 A1 20180920; CN 110446944 A 20191112; CN 110446944 B 20240426; EP 3602124 A1 20200205;
JP 2020511658 A 20200416; US 11567202 B2 20230131; US 2020064479 A1 20200227; WO 2018172258 A1 20180927

DOCDB simple family (application)
DE 102017204586 A 20170320; CN 201880019731 A 20180319; EP 18712567 A 20180319; EP 2018056843 W 20180319;
JP 2019551546 A 20180319; US 201816494986 A 20180319