

Title (en)
CURRENT CONTROL APPARATUS WITH HIGH PRECISION CONTROL

Title (de)
STROMREGELUNGSVORRICHTUNG MIT HOCHPRÄZISER STEUERUNG

Title (fr)
APPAREIL DE COMMANDE DE COURANT À COMMANDE HAUTE PRÉCISION

Publication
EP 3905852 A1 20211103 (EN)

Application
EP 20187030 A 20200721

Priority
CN 202020664452 U 20200427

Abstract (en)
A current control apparatus with high precision control is configured to provide a current control for an LED light string (LED_1). The current control apparatus includes a light string switch (Q1), a plurality of resistor branches (Br_1-Br_n), and a controller (100). The light string switch (Q1) is coupled in series to the LED light string (LED_1). The resistor branches (Br_1-Br_n) are electrically coupled to the LED light string (LED_1). Each of the resistor branches (Br_1-Br_n) includes a resistor (Rset_1-Rset_n) and a branch switch (Qr1-Qrn) coupled in series to the resistor (Rset_1-Rset_n). The controller (100) provides a light string control signal (LED_1_EN) and a plurality of branch control signals (LED_CTRL_1-LED_CTRL_n). The light string control signal (LED_1_EN) turns on and turns off the LED light string (LED_1), and the branch control signals (LED_CTRL_1-LED_CTRL_n) respectively turn on and turn off the branch switches (Qr1-Qrn).

IPC 8 full level
H05B 45/10 (2020.01); **H05B 45/40** (2020.01)

CPC (source: EP)
H05B 45/10 (2020.01); **H05B 45/40** (2020.01)

Citation (search report)
• [Y] US 2006083011 A1 20060420 - BUHR CHRISTOPH [DE], et al
• [Y] EP 3636491 A1 20200415 - ODELO GMBH [DE]
• [Y] EP 2385749 A1 20111109 - ADVANCED CONNECTEK INC [TW]
• [Y] WO 2019135202 A2 20190711 - KAERTECH [FR]
• [A] WO 2016070150 A1 20160506 - SAGEM AVIIONICS LLC [US]

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

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DOCDB simple family (application)
EP 20187030 A 20200721; CN 202020664452 U 20200427; JP 2020003137 U 20200728