

Title (en)

SYSTEMS AND METHODS USING ELECTRICAL RECEPTACLES FOR INTEGRATED POWER CONTROL, COMMUNICATION AND MONITORING OVER AT LEAST ONE POWER LINE

Title (de)

SYSTEME UND VERFAHREN MIT VERWENDUNG VON STECKDOSEN FÜR INTEGRIERTE STROMSTEUERUNG, -KOMMUNIKATION UND -ÜBERWACHUNG ÜBER MINDESTENS EINE STROMLEITUNG

Title (fr)

SYSTÈMES ET PROCÉDÉS UTILISANT DES RÉCEPTACLES ÉLECTRIQUES POUR UNE COMMANDE DE PUISSANCE INTÉGRÉE, COMMUNICATION ET SURVEILLANCE SUR AU MOINS UNE LIGNE ÉLECTRIQUE

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Application

EP 17852041 A 20170922

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- US 201615274469 A 20160923
- US 201762490527 P 20170426
- US 201762505434 P 20170512
- CA 2017050893 W 20170725
- US 201715659382 A 20170725
- CA 2017051121 W 20170922

Abstract (en)

[origin: WO2018053644A1] An example embodiment is a voice appliance including: a plurality of user interface devices comprising at least a microphone and a speaker; a plug for receiving power to the appliance or load; and a communication subsystem configured for wired communication with an electrical receptacle through the plug when plugged into the electrical receptacle. An electrical receptacle for connection to power lines comprises: at least one plug outlet configured to provide DC output, wherein the at least one plug outlet is configured to provide access to a wired communication network defined by at least one of the power lines. The plug outlet can be a Universal Serial Bus (USB) plug outlet to connect to a mobile device or are movable USB memory device. An intelligent junction box at the circuit breaker panel is configured to perform dynamic power allocation and power line communication.

IPC 8 full level

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CPC (source: EP)

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Citation (search report)

- [X1] US 9172233 B2 20151027 - VASQUEZ HECTOR M [US], et al
- [X1] US 9160168 B2 20151013 - CHAPEL STEVE [US], et al
- [XA] US 8289664 B2 20121016 - HAINES JOSHUA P [US], et al
- See references of WO 2018053644A1

Cited by

CN112448922A

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