

(19) World Intellectual Property Organization
International Bureau



(43) International Publication Date
9 October 2003 (09.10.2003)

PCT

(10) International Publication Number
WO 03/084022 A1

(51) International Patent Classification⁷: **H02J 1/00**,
F23N 5/20

(21) International Application Number: PCT/US03/09925

(22) International Filing Date: 28 March 2003 (28.03.2003)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
60/368,963 28 March 2002 (28.03.2002) US
60/383,027 24 May 2002 (24.05.2002) US

(71) Applicant (for all designated States except US):
ROBERTSHAW CONTROLS COMPANY [US/US];
1701 Byrd Avenue, Richmond, VA 23230-3011 (US).

(72) Inventors; and

(75) Inventors/Applicants (for US only): **TURNER, James, H.** [US/US]; 14037 Princess Mary Road, Chesterfield, VA 23838 (US). **PEACHEY, David** [US/US]; 3508 East Jaeger Circle, Mesa, AZ 85213-3234 (US). **BEAUDET, Joseph** [US/US]; 7516 Springlake Drive, Prince George, VA 23875 (US). **LOUGHMILLER, George, E., Jr.** [US/US]; 12623 North 113 Way, Scottsdale, AZ 85259 (US). **STRICH, Ron** [US/US]; 8344 Aplebrook Terrace,

Apt. 206, Raleigh, NC 27617 (US). **EHLERS, Gregory, A.** [US/US]; 1000 1st Ave. W., Bradenton, FL 34205-7852 (US).

(74) Agents: **YEE, James, R.** et al.; Howard and Howard Attorneys, P.C., Suite 101, 39400 Woodward Avenue, Bloomfield Hills, MI 48304 (US).

(81) Designated States (*national*): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

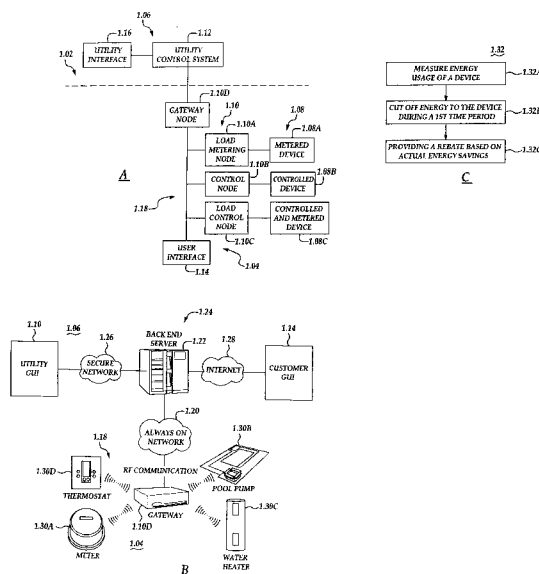
(84) Designated States (*regional*): ARIPO patent (GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

— with international search report

[Continued on next page]

(54) Title: ENERGY MANAGEMENT SYSTEM AND METHOD



(57) Abstract: A system and method manage delivery of energy from a distribution network (1.02) to one or more sites (1.04). Each site has at least one device (1.08) coupled to the distribution network. The at least one device controllably consumes energy. The system includes a node (1.10) and a control system. The node is coupled to at least one device (1.106) for sensing and controlling system. The node is coupled to the at least one device (1.10C) for sensing and controlling energy delivered to the device. A control system (1.12) is coupled to the node and distribution network for delivering to the node at least one characteristic of the distribution network. The node for controls the supply of energy to the device as a function of the at least one characteristic.



WO 03/084022 A1



— *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments*

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.