

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization
International Bureau



162162

(43) International Publication Date
4 July 2002 (04.07.2002)

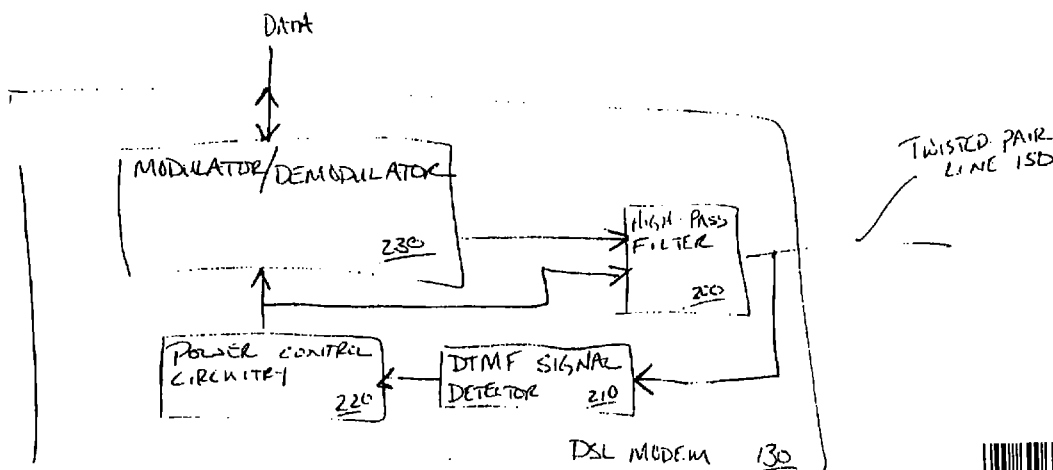
PCT

(10) International Publication Number
WO 02/052805 A3

- (51) International Patent Classification⁷: **H04M 11/06**, **H04B 3/04**, **H04L 27/26**
- (21) International Application Number: **PCT/US01/43923**
- (22) International Filing Date:
19 November 2001 (19.11.2001)
- (25) Filing Language: English
- (26) Publication Language: English
- (30) Priority Data:
09/745,938 21 December 2000 (21.12.2000) US
- (71) Applicant (for all designated States except US): **INTEL CORPORATION** [US/US]; 2200 Mission College Boulevard, Santa Clara, CA 95052 (US).
- (72) Inventor; and
- (75) Inventor/Applicant (for US only): **HANSEN, Carl, C.** [US/US]; 19504 SW Ruth Court, Aloha, OR 97007 (US).
- (74) Agents: **MALLIE, Michael, J.** et al.; Blakely Sokoloff Taylor & Zafman 7th Floor, 12400 Wilshire Boulevard, Los Angeles, CA 90025 (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, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, 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, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, 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: POWER CUTBACK CONFIGURATION OF DIGITAL SUBSCRIBER LINE TRANSCEIVERS USING PUBLIC SWITCHED TELEPHONE NETWORK SIGNALING



G00002

(57) Abstract: The invention provides a technique for power cutback of DSL transceivers (e.g., modems) using public switched telephone network (PSTN) signaling. For example, one or more dual-tone/multiple frequency (DTMF) signals generated by a touch-tone telephone, or other device, can cause a DSL transceiver to reduce the power of upstream data communications. A user of a DSL modem can cause the modem to transmit upstream data while listening to the microphone of a telephone coupled to the same twisted-pair line. Data transmission power can be adjusted by use of one or more buttons on the telephone. The DSL transceiver, in response to one or more predetermined DTMF signals, can adjust transmission power. Thus, the power cutback of the DSL transceiver can be controlled using PSTN signaling.

WO 02/052805 A3

— 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.

(88) Date of publication of the international search report:

29 August 2002