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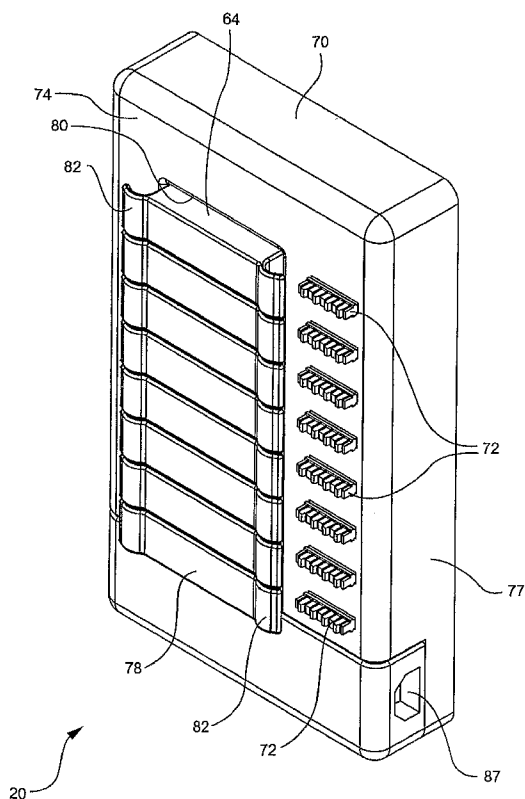
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[Continued on next page]

(54) Title: PROTECTED MIDSPAN POWER SOURCING EQUIPMENT FOR POWER OVER ETHERNET APPLICATIONS



(57) Abstract: A protected mid-span power sourcing equipment for a local network communication system includes a network connection subsystem that is connectable to a first network cable having a plurality of electrical wires, and a power equipment connection subsystem that is connectable to at least a second network cable also having a plurality of electrical wires. The second network cable is communicable with a powered end station of the LAN communication system and provides power signals and voice and data signals to the powered end station. A power source is connected to the second network cable in the powered equipment connection subsystem and generates the power signal that is provided on at least one second network cable to the powered end station. Electrical surge protectors in the mid-span power sourcing equipment are connected to the powered equipment connection subsystem and the second network cable and provide electrical surge protection for the powered end station.



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

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A. CLASSIFICATION OF SUBJECT MATTER

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USPC - 340/693.2

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC(8) - G08B 23/00 (2006.01)

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Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched
USPC: 340/506, 507, 509, 510, 693.1, 693.2, 693.3; 307/38; 700/293; 714/14; 361/90, 91.1, 600

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

Electronic data base: USPTO WEST (PGPB, USPT, EPAB, JPAB); DIALOG PRO (Engineering)

Search Terms Used: network or LAN or local area network power, surge protection or protectors, midspan or span or or PSE power source or equipment, electrical wires or cables, POE or power over ethernet, data or voice or power signal etc.

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 2005/0085212 A1 (Peker et al.) 21 April 2005 (21.04.2005)	1-18
A	US 2004/0264087 A1 (Bishop) 30 December 2004 (30.12.2004)	1-18
A	US 2003/0099076 A1 (Elkayam et al.) 29 May 2003 (29.05.2003)	1-18
A	US 6,448,899 B1 (Thompson) 10 September 2002 (10.09.2002)	1-18
A	US 2001/0053207 A1 (Jeon et al.) 20 December 2001 (20.12.2001)	1-18

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