

(51) International Patent Classification:  
*G06F 15/16* (2006.01)(21) International Application Number:  
PCT/US2012/030972(22) International Filing Date:  
28 March 2012 (28.03.2012)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:  
13/074,998 29 March 2011 (29.03.2011) US(71) Applicant (for all designated States except US):  
**AMAZON TECHNOLOGIES, INC.** [US/US]; PO Box 8102, Reno, Nevada 89507 (US).

(72) Inventors; and

(75) Inventors/Applicants (for US only): **JUDGE, Alan M.** [IE/IE]; 410 Terry Ave North, Seattle, Washington 98109-5210 (US). **KELLY, Mark N.** [IE/IE]; 410 Terry Ave North, Seattle, Washington 98109-5210 (US). **BRAR, Jagwinder Singh** [CA/US]; 410 Terry Ave North, Seattle, Washington 98109-5210 (US). **MARR, Michael David** [US/US]; 410 Terry Ave North, Seattle, Washington 98109-5210 (US). **COHN, Daniel T.** [US/US]; 410 Terry Ave North, Seattle, Washington 98109-5210 (US).(74) Agent: **LOHR, Jason D.**; Novak Druce + Quigg LLP, 555 Mission Street, 34th Floor, San Francisco, California 94105 (US).

(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PE, PG, PH, PL, PT, QA, RO, RS, RU, RW, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW.

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LR, LS, MW, MZ, NA, RW, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV, MC, MK, MT, NL, NO, PL, PT, RO, RS, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

**Declarations under Rule 4.17:**

— as to applicant's entitlement to apply for and be granted a patent (Rule 4.17(ii))

**Published:**

— with international search report (Art. 21(3))

(54) Title: NETWORK TRANSPOSE BOX AND SWITCH OPERATION BASED ON BACKPLANE ETHERNET

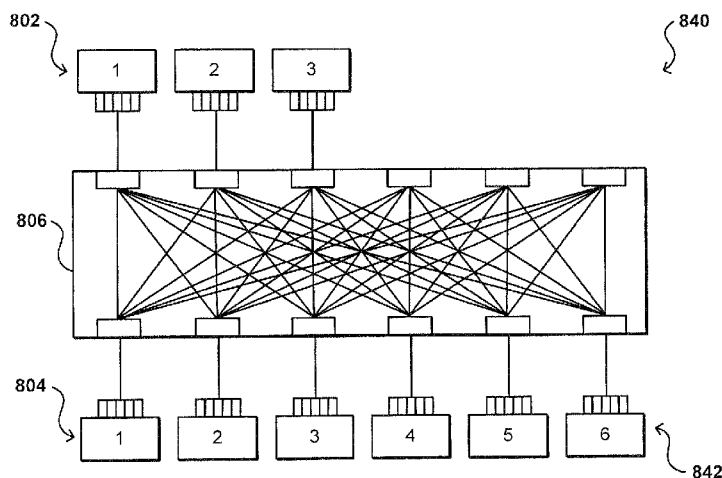


FIG. 8(c)

(57) Abstract: The deployment and scaling of a network of electronic devices can be improved by utilizing one or more network transpose boxes. Each transpose box can include a number of connectors and a meshing useful for implementing a specific network topology. When connecting devices of different tiers in the network, each device need only be connected to at least one of the connectors on the transpose box. One or more of the deployed electronic devices (e.g., switches, transpose boxes) in the network can transmit data based on a backplane Ethernet standard, such as 10GBASE-KR, 10GBASE-KX4, or 40GBASE-KR4.