

10-30-2000

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Atty Ref/Docket No.: 1376.000001



6-28-00

To the Honorable Commissioner of Patents and Trad

101499181

or copy thereof.

1. Name of conveying party(ies):

Cray Research, L.L.C.

6/28/00

2. Name and address of receiving party(ies):

Name: Tera Computer Company

Additional name(s) of conveying party(ies) attached? [] Yes [X] No

Street Address: 411 1st Avenue South

3. Nature of conveyance:

- [X] Assignment [] Merger
[] Security Agreement [] Change of Name
[] Other

City: Seattle State: WA ZIP: 98104-2860

Additional name(s) & address(es) attached? [] Yes [X] No

Execution Date: May 24, 2000

4. Application number(s) or patent number(s):

If this document is being filed together with a new application, the execution date of the application is: _____

A. Patent Application No.(s)

B. Patent No.(s)

SEE ATTACHED APPENDIX A (3 PAGES)

Additional numbers attached? [] Yes [X] No

5. Name and address of party to whom correspondence concerning document should be mailed:

Name: Thomas F. Brennan

Address: Schwegman, Lundberg, Woessner & Kluth, P.A.
P.O. Box 2938
Minneapolis, MN 55402

6. Total number of applications and patents involved: 79

7. Total fee (37 CFR 3.41): \$3,160.00

[X] Enclosed
[] Authorized to be charged to deposit account

8. Please charge any additional fees or credit any overpayments to our
Deposit account number: 19-0743

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9. Statement and signature.

To the best of my knowledge and belief, the foregoing information is true and correct and any attached copy is a true copy of the original document.

Thomas F. Brennan/Reg. No. 35,075
Name of Person Signing

Thomas F. Brennan
Signature

June 26, 2000
Date

Total number of pages including cover sheet: 12

OMB No. 0651-0011 (exp. 4/94)

07/24/2000 ASCOTT 00000179 05701017

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PATENT
REEL: 011231 FRAME: 0132

Serial Number	Filing Date	Patent Number	Issue Date	Title	SLWK Dkt. No.
05/701,017	06/30/1976	4,120,021	10/10/1978	Cooling System for Electronic Assembly	00200.003US1
05/701,119	06/30/1976	4,128,880	12/05/1978	Computer Vector Register Processing	00200.004US1
701,077	06/30/1976	247,361	02/28/1978	Computer Cabinet	00200.005US1
06/442,569	11/18/1982	4,590,538	05/20/1986	Immersion Cooled High Density Electronic Assembly	00200.015US1
414,448	09/02/1982	4,466,255	08/21/1984	Cooling System for Electronic Assembly	00200.016US1
487,515	04/22/1983	4,514,784	04/30/1985	INTERCONNECTED MULTIPLE CIRCUIT MODULE	00200.030001
487,516	04/22/1983	4,535,385	08/13/1985	CIRCUIT MODULE WITH ENHANCED HEAT TRANSFER AND DISTRIBUTION	00200.031US1
06/488,114	04/25/1983	4,630,230	12/16/1986	SOLID STATE STORAGE DEVICE	00200.033US1
06/644,249	08/27/1984	4,638,188	01/20/1987	PHASE MODULATED PULSE LOGIC FOR GALLIUM ARSENIDE	00200.035US1
06/622,066	06/19/1984	4,771,378	09/13/1988	Electrical Interface System	00200.037US1
06/599,688	04/17/1984	4,628,407	12/09/1986	High Cooling Efficiency Circuit Module	00200.043US1
06/750,099	06/28/1985	4,745,545	05/17/1988	Memory Reference Control in a Multiprocessor	00200.045US1
07/284,992	12/14/1988	4,884,168	11/28/1989	Cooling Plate With Internal Coolant Passages	00200.064US1
07/622,325	11/28/1990	5,151,995	09/29/1992	High-Speed Computer Functional Unit Using Low-Speed VLSI Components	00200.078US1
06/925,283	10/31/1986	4,800,374	01/24/1989	Personnel Antistatic Test Device	00200.079US1
06/935,338	11/26/1986	4,772,980	09/20/1988	Immersion Cooling Safety Monitoring System	00200.082US1
07/143,572	01/13/1988	4,813,128	03/21/1989	High Density Disposable Printed Circuit Inter-Board Connector	00200.094US1
07/143,511	01/13/1988	H,663	08/01/1989	Statutory Invention Registration for Low-Cost Disposable Probe Head for Chip Testing.	00200.097US1
07/556,024	07/20/1990	5,123,848	06/23/1992	MP Assembly Pressure Connector (Electrical Backplane Connector)	00200.116US1
07/234,818	08/19/1988	4,962,356	10/09/1990	Pneumatic Integrated Circuit Test Socket	00200.142US1
07/297,967	01/17/1989	5,127,093	06/30/1992	COMPUTER LOOK-AHEAD INSTRUCTION ISSUE CONTROL	00200.155US1
07/366,604	06/15/1989	4,949,453	08/21/1990	Chip Carrier with Terminating Resistive Elements	00200.170US1
07/722,364	06/25/1991	5,122,620	06/16/1992	Chip Carrier with Terminating Resistive Elements (Divisional Application)	00200.170US2
07/804,958	12/11/1991	Re. E. 34,395	10/05/1993	Chip Carrier with Terminating Resistive Elements	00200.170USR
07/284,912	12/14/1988	4,939,624	07/03/1990	Interconnected Multiple Circuit Module	00200.173US1
07/324,906	03/17/1989	5,098,305	03/24/1992	Memory Metal Connector Pin for Connecting Circuit Boards to Circuit Boards	00200.201US1
07/464,909	01/16/1990	5,014,904	05/14/1991	Board-Mounted Thermal Path Connector and Cooling Plate	00200.202US1
07/927,874	08/10/1992	5,262,675	11/16/1993	Light Emitting Diode (LED) Cooling Technique	00200.215US1
07/480,580	02/15/1990	D. 333,127	02/09/1993	Computer Cabinet Design Patent Application for the Cray-3	00200.220US1
07/303,581	02/06/1989	315,147	03/05/1991	Computer Cabinet Design for the Y-MP.	00200.222US1
07/427,328	10/25/1989	D. 314,949	02/26/1991	Computer Cabinet Design for the Y-MP/2.	00200.228US1
07/391,229	08/08/1989	4,951,246	08/21/1990	Improved Solid State Storage Device.	00200.229US1
07/400,071	08/30/1989	H1,176	04/06/1993	Bit Dispersement Method For Enhanced SECEDED Error Detection and Correction in Multi-Bit Memory Devices	00200.234US1
07/867,282	04/09/1992	5,177,380	01/05/1993	Latch Circuit with Enable and Differential Clock Inputs	00200.249US1

PATENT

Serial Number	Filing Date	Patent Number	Issue Date	Title	SLWK Dkt. No.
07/692,814	04/25/1991	5,086,334	02/04/1992	Improved Reduced Capacitance Chip Carrier	00200.252US1
07/865,675	04/08/1992	5,369,059	11/29/1994	METHOD FOR CONSTRUCTING A REDUCED CAPACITANCE CHIP CARRIER	00200.252US2
07/606,577	10/31/1990	5,106,310	04/21/1992	Z-Axis Jumper Connectors for Connecting Stacks of Circuit Boards (Divisional)	00200.257US2
07/606,168	10/31/1990	5,129,830	07/14/1992	Z-Axis Jumper Connectors for Connecting Stacks of Circuit Boards (Divisional)	00200.257US3
07/556,032	07/20/1990	D. 331,392	12/01/1992	Computer Cabinet Design Patent Application for the MP	00200.258US1
07/391,371	08/08/1989	D. 314,948	02/26/1991	Computer Cabinet Design Patent Application for the Y-MP with the IOS-E/SSD-E.	00200.259US1
07/649,945	02/04/1991	D. 332,779	01/26/1993	Computer Cabinet Design Patent Application for the Y-MP with the IOS-E/SSD-E.	00200.259US2
07/611,899	11/09/1990	5,162,743	11/10/1992	Method and Apparatus for Automatic Cutting of Twisted Pair Wire to an Electrical Length	00200.266US1
07/570,120	08/17/1990	5,276,854	01/04/1994	METHOD OF MULTIPLE CPU LOGIC SIMULATION	00200.274US1
07/646,834	01/28/1991	H1,153	03/02/1993	Patent Application for Non-Metalized Chip Carrier	00200.281US1
08/113,724	08/27/1993	5,438,673	08/01/1995	AUTOMATIC INTERFACE FOR CPU REAL MACHINE AND LOGIC SIMULATOR	00200.289US1
				DIAGNOSTICS	
08/250,375	05/27/1994	5,420,583	05/30/1995	NIBBLE ORIENTED RUN LENGTH LIMITED ENCODER-DECODER	00200.293US2
08/128,050	09/28/1993	5,332,463	07/26/1994	SELF-ALIGNED SEALING FIXTURE FOR USE IN ASSEMBLY OF MICROELECTRONIC PACKAGES	00200.306US1
07/826,214	01/22/1992	5,182,473	01/26/1993	Emitter Emitter Logic (EEL) and Emitter Collector Dotted Logic (ECDL) Families.	00200.315US1
07/618,685	11/27/1990	5,327,550	07/05/1994	Disabled Memory Sections for Degraded Operation of a Vector Supercomputer Processor	00200.325US1
07/666,356	03/08/1991	5,131,859	07/21/1992	Quick Disconnect System for Power and Coolant Lines for the C-90 Modules	00200.331US1
07/631,379	12/20/1990	D. 336,285	06/08/1993	Design Patent Application for a Computer Cabinet (C-90)	00200.358US1
07/908,029	06/29/1992	D. 337,572	07/20/1993	Design Patent Application for a Computer Cabinet (C-90)	00200.358US2
07/618,603	11/27/1990	5,167,511	12/01/1992	High Density Interconnect Apparatus	00200.362US1
07/854,312	03/19/1992	5,211,565	05/18/1993	High Density Interconnect Apparatus for a Completely-Connected Multiprocessor Computer (Memory Boards)	00200.362US2
07/755,067	09/04/1991	5,180,093	01/19/1993	Method and Apparatus for Deep Axis Bonding	00200.369US1
07/722,110	06/27/1991	5,178,549	01/12/1993	Shielded Connector Block and Method of Manufacture	00200.370US1
07/963,813	10/20/1992	5,224,918	07/06/1993	Shielded Connector Block and Method of Manufacture	00200.370US2
07/679,653	04/02/1991	5,152,696	10/06/1992	Z-Axis Connectors for Stacked Printed Circuit Board Assemblies	00200.375US1
07/855,384	03/20/1992	5,321,581	06/14/1994	Air Distribution System and Manifold for Cooling Electronic Components	00200.376US1
07/853,983	03/20/1992	5,230,564	07/27/1993	Temperature Monitoring System for Air Cooled Electronic Components	00200.377US1
07/741,802	08/06/1991	D. 342,485	12/21/1993	COMPUTER CABINET	00200.386US1
07/773,148	10/08/1991	5,114,448	05/19/1992	High Reliability Non-Blocking Filter	00200.399US1
08/062,995	05/17/1993	5,400,504	03/28/1995	METHOD OF MANUFACTURING METALLIZED CONNECTOR BLOCK	00200.401US2
08/104,794	08/11/1993	5,403,684	04/04/1995	PCB TOOLING APPARATUS AND METHOD FOR FORMING PATTERNS IN REGISTRATION ON BOTH SIDES OF A SUBSTRATE	00200.415US1
08/342,258	11/18/1994	5,548,372	08/20/1996	PCB TOOLING APPARATUS FOR FORMING PATTERNS ON BOTH SIDES OF A SUBSTRATE	00200.415US2

Serial Number	Filing Date	Patent Number	Issue Date	Title	SLW/K Dkt. No.
08/350,648	12/07/1994	5,692,123	11/25/1997	MAINTENANCE CHANNEL FOR MODULAR, HIGHLY INTERCONNECTED COMPUTER SYSTEMS	00200.422US1
08/347,953	12/01/1994	5,623,685	04/22/1997	VECTOR REGISTER VALIDITY INDICATION TO HANDLE OUT-OF-ORDER ELEMENT ARRIVAL FOR A VECTOR COMPUTER WITH VARIABLE MEMORY LATENCY	00200.426US1
08/055,814	04/30/1993	5,623,698	04/22/1997	A MEMORY INTERCONNECT NETWORK HAVING SEPARATE ROUTING NETWORKS FOR INPUTS AND OUTPUTS USING SWITCHES WITH FIFO QUEUES AND MESSAGE STEERING BITS	00200.436US1
08/347,964	12/01/1994	6,012,135	01/04/2000	COMPUTER HAVING MULTIPLE ADDRESS PORTS, EACH HAVING LOGICAL-ADDRESS TRANSLATION WITH BASE AND LIMIT MEMORY MANAGEMENT	00200.437US1
08/007,100	01/21/1993	5,315,479	05/24/1994	Improved Air Manifold for Cooling Electronic Components	00200.469US1
08/165,156	12/10/1993	5,424,658	06/13/1995	BIPOLAR ECL TO INVERTED CMOS LEVEL TRANSLATOR	00200.541US1
08/706,806	09/03/1996	5,895,501	04/20/1999	VIRTUAL MEMORY SYSTEM FOR VECTOR BASED COMPUTER SYSTEMS	00200.594US1
29/048,129	12/21/1995	D. 375,944	11/26/1996	COMPUTER CABINET	00200.603US1
08/681,944	07/29/1996	5,737,194	04/07/1998	INPUT/OUTPUT MODULE ASSEMBLY	00200.607US1
08/605,356	02/22/1996	5,726,857	03/10/1998	APPARATUS AND METHOD FOR MOUNTING EDGE CONNECTORS WITHIN A CIRCUIT MODULE	00200.613US1
09/132,205	08/11/1998	/ /	/ /	APPARATUS AND METHOD FOR IMPROVED VECTOR PROCESSING TO SUPPORT EXTENDED-LENGTH INTEGER ARITHMETIC	00200.657US1
09/223,853	12/31/1998	/ /	/ /	VECTOR AND SCALAR DATA CACHE FOR A VECTOR MULTIPROCESSOR	00200.669US1
09/211,118	12/14/1998	/ /	/ /	OVERLAPPED INSTRUCTION EXECUTION WITH VIRTUAL MEMORY IN A VECTOR PROCESSOR	00200.679US1
09/211,221	12/14/1998	/ /	/ /	DIGITAL COMPUTING SYSTEM HAVING ADAPTIVE COMMUNICATION COMPONENTS	00200.683US1

ASSIGNMENT

WHEREAS, WE, Cray Research, L.L.C., a limited liability corporation organized and existing under and by virtue of the State of Delaware, and having an office and place of business at 655-A Lone Oak Drive, Eagan, Minnesota 55121, (hereinafter "Assignor"), is the owner of the entire right, title and interest in and to the applications attached hereto as Appendix A.

AND WHEREAS, Tera Computer Company, a corporation organized and existing under and by virtue of the laws of the State of Washington, and having an office and place of business at 411 1st Avenue South, Seattle, Washington 98104-2860, (hereinafter "Assignee") is desirous of acquiring the entire right, title and interest in said inventions, improvements and application and in the Letters Patent to be obtained therefor;

NOW, THEREFORE, to all whom it may concern, be it known that for good and valuable consideration, the receipt and sufficiency whereof is hereby acknowledged, we have sold, assigned, and transferred, and by these presents do sell, assign and transfer unto said Assignee, its successors or assigns, the entire right, title and interest for all countries in and to all inventions and improvements disclosed in the aforesaid application, and in and to the said application, all divisions, continuations, continuations-in-part, or renewals thereof, all Letters Patent which may be granted therefrom, and all reissues or extensions of such patents, and in and to any and all applications which have been or shall be filed in any foreign countries for Letters Patent on the said inventions and improvements, including an assignment of all rights under the provisions of the International Convention, and all Letters Patent of foreign countries which may be granted therefrom; and we do hereby authorize and request the Commissioner of Patents and Trademarks to issue any and all United States Letters Patent for the aforesaid inventions and improvements to the said Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the said Assignee, its successors and assigns.

AND, for the consideration aforesaid, we do hereby agree that we and our executors and legal representatives will make, execute and deliver any and all other instruments in writing including any and all further application papers, affidavits, assignments and other documents, and will communicate to said Assignee, its successors and representatives all facts known to us relating to said improvements and the history thereof and will testify in all legal proceedings and generally do all things which may be necessary or desirable more effectually to secure to and vest in said Assignee, its successors or assigns the entire right, title and interest in and to the said improvements, inventions, applications, Letters Patent, rights, titles, benefits, privileges and advantages hereby sold, assigned and conveyed, or intended so to be.

AND, furthermore Assignor covenants and agrees with said Assignee, its successors and assigns, that no assignment, grant, mortgage, license or other agreement affecting the rights and property herein conveyed has been made to others by it and that full right to convey the same herein expressed is possessed by it.

IN TESTIMONY WHEREOF, I have hereunto set my hand this 24 day of May, 2000.

Name:
Title:

STATE OF California)ss.
COUNTY OF San Joaquin

On this 24 day of May, 2000 before me personally appeared Cathryn Bystro
me known and known to me to be the person described in and who executed the foregoing
instrument, and he/she duly acknowledged to me that he/she executed the same for the uses and
purposes therein set forth.

[SEAL]

Notary Public

