07-15-2002



U.S. DEPARTMENT OF COMMERCE

OMB No. 0651-0027 (exp. 5/31/2002)	
Tab settings	Patents and Trademarks: Please record the attached original documents or copy thereof.
	2. Name and address of receiving party(ies)
Name of conveying party(ies): Lan Zhang	Name: Dell Products L.P.
Abeye Teshome	Internal Address:
Additional name(s) of conveying party(ies) atta	ached? 📮 Yes 🎽 No
3. Nature of conveyance:	
🖾 Assignment 🗔	Merger Street Address: One Dell Way
🖫 Security Agreement 📮	Change of Name
☐ Other	
	City: Round Rock State: Texas Zip: 78682
Execution Date: 7/2/02, 7/2/02	Additional name(s) & address(es) attached?
	B. Patent No.(s)
Name and address of party to who concerning document should be many and the many and the many arranged to the	Additional numbers attached? Yes No m correspondence 6. Total number of applications and patents involved:
concerning document should be ma	Additional numbers attached? Yes No m correspondence 6. Total number of applications and patents involved: 7. Total fee (37 CFR 3.41) \$40.00
concerning document should be ma	Additional numbers attached? Yes No m correspondence ailed: 7. Total fee (37 CFR 3.41)
concerning document should be many Name: David L. McCombs Internal Address: Haynes and Boone	Additional numbers attached? Yes No m correspondence ailed: 7. Total fee (37 CFR 3.41)\$40.00
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concerning document should be many Name: David L. McCombs Internal Address: Haynes and Boone 2 HLE333 00000017 10187927 40.00 DP Street Address: 901 Main Street, Suit City: Dallas State: Texas 9. Statement and signature. To the best of my knowledge and best of my knowledge.	Additional numbers attached? Yes No m correspondence 6. Total number of applications and patents involved: 7. Total fee (37 CFR 3.41)
concerning document should be many Name: David L. McCombs Internal Address: Haynes and Boone 2 HLE333 00000017 10187927 40.00 DP Street Address: 901 Main Street, Suit City: Dallas State: Texas 9. Statement and signature.	Additional numbers attached? Yes No m correspondence 6. Total number of applications and patents involved: 7. Total fee (37 CFR 3.41)

Mail documents to be recorded with required cover sheet information to:

Commissioner of Patents & Trademarks, Box Assignments Washington, D.C. 20231

PATENT

DOCKET NUMBER: 16356.707 CLIENT REFERENCE NUMBER: DC-03554

CUSTOMER NO.: 000027683

ASSIGNMENT

WHEREAS, WE,

(1) Lan Zhang City of Austin

State of Texas

(2)Abeye Teshome City of Austin State of Texas

have invented certain improvements in a

SYSTEM AND METHOD FOR MINIMIZING A LOADING EFFECT OF A VIA BY TUNING A CUTOUT RATIO

and executed a United States patent application filed herewith.

WHEREAS, DELL PRODUCTS L.P., a Texas limited partnership having a place of business at One Dell Way, Round Rock, TX 78682-2244 (hereinafter called DELL), desires to acquire the entire right, title and interest in the application and invention, and to any United States and foreign patents to be obtained therefor;

NOW, THEREFORE, for a valuable consideration, receipt whereof is hereby acknowledged, we, the above named, hereby acknowledge our prior existing obligation and hereby sell, assign, and transfer to DELL, its successors and assigns, the entire right, title, and interest in the application and invention therein disclosed for the United States and foreign countries, to and under the said improvements, and the said application and all divisional, renewals, continuing applications thereof, and all Letters Patent of the United States which may be granted thereon and all reissues and extensions thereof, and all rights of priority under International Conventions and applications for Letters Patent which may hereafter be filed for said improvements in any country or countries foreign to the United States, and all Letters Patent which may be granted for said improvements in any country or countries foreign to the United States and all extensions, renewals and reissues thereof; and all prior patents and patent applications from which a filing priority of the above-described patent application may be obtained, including the right to collect past damages; and we request the Commissioner of Patents to issue any Letters Patent granted upon the invention set forth in the application to DELL its successors and assigns; and we hereby agree that DELL may apply for foreign Letters Patent on the invention and we will execute all papers necessary in connection with the United States and foreign applications when called upon to do so by DELL.

Signed By: Date

Witnessed By: Library Date

Witnessed By: RAVINDRA REPDY Date

PATENT REEL: 013074 FRAME: 0002

PATENT

DOCKET NUMBER: 16356.707 CLIENT REFERENCE NUMBER: DC-03554

CUSTOMER NO.: 000027683

(2)

Signed By: Abeye Teshome

Abeye Teshome

Witnessed By: A. Kwatra,
Name: AJAY KWATRA

A-133809.1

PATENT REEL: 013074 FRAME: 0003

RECORDED: 07/02/2002