

02-24-2003

FORM PTO-1595

(Rev. 6-93)

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

M&amp;G- 50019.155US01/P05333

U.S. DEPARTMENT OF COMMERCE  
Patent and Trademark Office

102370794

To the Commissioner of Patents and Trademarks: Please record the attached original documents or copy thereof.

## 1. Name of conveying party(ies):

- 1) Marshall J. Bell  
2) Christopher A. Ludden  
3) Richard Alexander Erhart

2-20-03

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

National Semiconductor Corporation  
2900 Semiconductor Drive  
Santa Clara, California 95051-8090

Additional name(s) of conveying party(ies) attached? ☐ Yes ☒ NoAdditional name(s) & address(es) attached? ☐ Yes ☒ No

## 3. Nature of conveyance:

- ☒ Assignment ☐ Merger  
☐ Security Agreement ☐ Change of Name  
☐ Other:

Execution Date: 1) January 24, 2003; 2) February 10, 2003;  
3) January 27, 2003

## 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)

10/287,900

## B. Patent No.(s)

Additional numbers attached? ☐ Yes ☒ No

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

Name: Brett A. Hertzberg  
Address: Merchant & Gould P.C.  
P.O. Box 2903  
Minneapolis, MN 55402-0903

## 6. Total number of applications and patents involved: 1

7. Total fee (37 CFR 3.41): \$40.00

- ☒ Enclosed  
☐ Authorized to be charged to deposit account

8. Please charge any additional fees or credit any  
overpayments to our Deposit account number: 13-2725

DO NOT USE THIS SPACE

## 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.

Brett A. Hertzberg, Reg. No. 42,660

Name of Person Signing

Signature

February 13, 2003

Date

Total number of pages including cover sheet, attachments, and document: 10

Do not detach this portion

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

Box Assignments  
Director - U.S. Patent and Trademark Office  
Washington, D.C. 20231

Public burden reporting for this sample cover sheet is estimated to average about 30 minutes per document to be recorded, including time for reviewing the document and gathering the data needed, and completing and reviewing the sample cover sheet. Send comments regarding this burden estimate to the U.S. Patent and Trademark Office, Office of information systems, PK2-1000C, Washington, D.C. 20231, and to the Office of Management and Budget, Paperwork Reduction Project (0651-0011), Washington, D.C. 20503.

02/25/2003 ECOOPER 00000010 10287900

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PATENT  
REEL: 013765 FRAME: 0878

## ASSIGNMENT

WHEREAS, we, Marshall J. Bell, residing at 2343 E. San Tan Street, Chandler, Arizona 85225, Christopher A. Ludden, residing at 30 Widewaters Lane, Pittsford, New York, 14534 and Richard Alexander Erhart, residing at 1747 E. Carver Road, Tempe, Arizona 85284 made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States on November 5, 2002, Application No. 10/287,900, which is entitled STACKED AMPLIFIER ARRANGEMENT FOR GRAPHICS DISPLAYS.

AND WHEREAS, National Semiconductor Corporation, a corporation organized and existing under and by virtue of the laws of the State of Delaware, and having an office and place of business at 2900 Semiconductor Drive, Santa Clara, California 95051-8090 (hereinafter "Assignee") is desirous of acquiring the entire right, title and interest in and to said inventions, improvements and application and in and to the Letters Patent to be obtained therefor;

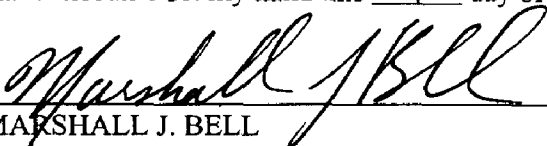
NOW THEREFORE, to all whom it may concern, be it known that for and in consideration of the sum of One Dollar and other good and valuable considerations, the receipt and sufficiency whereof is hereby acknowledged, we have sold, assigned, and transferred, and by these presents do sell, assign and transfer 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 application, all divisions, continuations, 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 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 Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the 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 improvements, inventions,

applications, Letters Patent, rights, titles, benefits, privileges and advantages hereby sold, assigned and conveyed, or intended so to be.

AND, furthermore we covenant and agree 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 us and that full right to convey the same as herein expressed is possessed by us.

IN TESTIMONY WHEREOF, I have hereunto set my hand this 24 day of January, 2003.

  
MARSHALL J. BELL

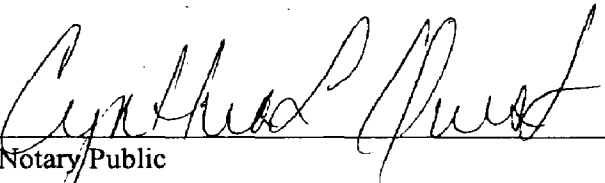
STATE OF Arizona )  
COUNTY OF Maricopa ) ss.



Notary Public State of Arizona  
Maricopa County  
Cynthia L. Quest  
Expires May 20, 2003

On this 24<sup>th</sup> day of January, 2003, before me personally appeared MARSHALL J. BELL to me known and known to me to be the person described in and who executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the uses and purposes therein set forth.

[SEAL]

  
Notary Public



Notary Public State of Arizona  
Maricopa County  
Cynthia L. Quest  
Expires May 20, 2003

IN TESTIMONY WHEREOF, I have hereunto set my hand this \_\_\_\_\_ day of

\_\_\_\_\_, 2003.

\_\_\_\_\_  
CHRISTOPHER A. LUDDEN

STATE OF \_\_\_\_\_ )  
 ) ss.  
COUNTY OF \_\_\_\_\_ )

On this \_\_\_\_\_ day of \_\_\_\_\_, 2003, before me personally appeared  
CHRISTOPHER A. LUDDEN to me known and known to me to be the person described in and who  
executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the  
uses and purposes therein set forth.

[SEAL]

\_\_\_\_\_  
Notary Public

IN TESTIMONY WHEREOF, I have hereunto set my hand this \_\_\_\_\_ day of

\_\_\_\_\_, 2003.

\_\_\_\_\_  
RICHARD ALEXANDER ERHART

STATE OF \_\_\_\_\_ )  
 ) ss.  
COUNTY OF \_\_\_\_\_ )

On this \_\_\_\_\_ day of \_\_\_\_\_, 2003, before me personally appeared.  
RICHARD ALEXANDER ERHART to me known and known to me to be the person described in  
and who executed the foregoing instrument, and he duly acknowledged to me that he executed the  
same for the uses and purposes therein set forth.

[SEAL]

\_\_\_\_\_  
Notary Public

## ASSIGNMENT

WHEREAS, we, Marshall J. Bell, residing at 2343 E. San Tan Street, Chandler, Arizona 85225, Christopher A. Ludden, residing at 30 Widewaters Lane, Pittsford, New York, 14534 and Richard Alexander Erhart, residing at 1747 E. Carver Road, Tempe, Arizona 85284 made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States on November 5, 2002, Application No. 10/287,900, which is entitled STACKED AMPLIFIER ARRANGEMENT FOR GRAPHICS DISPLAYS.

AND WHEREAS, National Semiconductor Corporation, a corporation organized and existing under and by virtue of the laws of the State of Delaware, and having an office and place of business at 2900 Semiconductor Drive, Santa Clara, California 95051-8090 (hereinafter "Assignee") is desirous of acquiring the entire right, title and interest in and to said inventions, improvements and application and in and to the Letters Patent to be obtained therefor;

NOW THEREFORE, to all whom it may concern, be it known that for and in consideration of the sum of One Dollar and other good and valuable considerations, 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 application, all divisions, continuations, 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 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 Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the 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 improvements, inventions,

AND, furthermore we covenant and agree 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 us and that full right to convey the same as herein expressed is possessed by us.

IN TESTIMONY WHEREOF, I have hereunto set my hand this \_\_\_\_\_ day of \_\_\_\_\_, 2003.

STATE OF \_\_\_\_\_ )  
 ) ss.  
COUNTY OF \_\_\_\_\_ )

On this \_\_\_\_\_ day of \_\_\_\_\_, 2003, before me personally appeared MARSHALL J. BELL to me known and known to me to be the person described in and who executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the uses and purposes therein set forth.

**Notary Public**

IN TESTIMONY WHEREOF, I have hereunto set my hand this 10<sup>th</sup> day of February, 2003.

Christopher A. Ludden  
CHRISTOPHER A. LUDDEN

STATE OF NEW YORK )  
 ) ss.  
COUNTY OF MONROE )

On this 10<sup>th</sup> day of FEBRUARY, 2003, before me personally appeared CHRISTOPHER A. LUDDEN to me known and known to me to be the person described in and who executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the uses and purposes therein set forth.

[SEAL] **JULIE M. MCDONALD**  
Notary Public, State of New York  
No. 01MC8076701  
Qualified In Ontario County  
Commission Expires July 1, 2006

Julie McDonald  
Notary Public

IN TESTIMONY WHEREOF, I have hereunto set my hand this \_\_\_\_\_ day of \_\_\_\_\_, 2003.

\_\_\_\_\_  
RICHARD ALEXANDER ERHART

STATE OF \_\_\_\_\_ )  
 ) ss.  
COUNTY OF \_\_\_\_\_ )

On this \_\_\_\_\_ day of \_\_\_\_\_, 2003, before me personally appeared. RICHARD ALEXANDER ERHART to me known and known to me to be the person described in and who executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the uses and purposes therein set forth.

[SEAL] \_\_\_\_\_  
Notary Public

## ASSIGNMENT

WHEREAS, we, Marshall J. Bell, residing at 2343 E. San Tan Street, Chandler, Arizona 85225, Christopher A. Ludden, residing at 30 Widewaters Lane, Pittsford, New York, 14534 and Richard Alexander Erhart, residing at 1747 E. Carver Road, Tempe, Arizona 85284 made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States on November 5, 2002, Application No. 10/287,900, which is entitled STACKED AMPLIFIER ARRANGEMENT FOR GRAPHICS DISPLAYS.

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NOW THEREFORE, to all whom it may concern, be it known that for and in consideration of the sum of One Dollar and other good and valuable considerations, 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 application, all divisions, continuations, 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 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 Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the Assignee, its successors and assigns.

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AND, furthermore we covenant and agree 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 us and that full right to convey the same as herein expressed is possessed by us.

MARSHALL J. BELL

On this \_\_\_\_\_ day of \_\_\_\_\_, 2003, before me personally appeared MARSHALL J. BELL to me known and known to me to be the person described in and who executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the uses and purposes therein set forth.

**Notary Public**

IN TESTIMONY WHEREOF, I have hereunto set my hand this \_\_\_\_\_ day of

\_\_\_\_\_, 2003.

\_\_\_\_\_  
CHRISTOPHER A. LUDDEN

STATE OF \_\_\_\_\_ )  
 ) ss.  
COUNTY OF \_\_\_\_\_ )

On this \_\_\_\_\_ day of \_\_\_\_\_, 2003, before me personally appeared  
CHRISTOPHER A. LUDDEN to me known and known to me to be the person described in and who  
executed the foregoing instrument, and he duly acknowledged to me that he executed the same for the  
uses and purposes therein set forth.

[SEAL]

\_\_\_\_\_  
Notary Public

IN TESTIMONY WHEREOF, I have hereunto set my hand this 27<sup>th</sup> day of

January, 2003.

Richard Alexander Erhart  
RICHARD ALEXANDER ERHART

STATE OF ARIZONA )  
 ) ss.  
COUNTY OF Maricopa )

On this 27<sup>th</sup> day of JANUARY, 2003, before me personally appeared.  
RICHARD ALEXANDER ERHART to me known and known to me to be the person described in  
and who executed the foregoing instrument, and he duly acknowledged to me that he executed the  
same for the uses and purposes therein set forth.

[SEAL]

Cynthia L. Quest  
Notary Public



Notary Public State of Arizona  
Maricopa County  
Cynthia L. Quest  
Expires May 20, 2003