

9/29/99

FORM PTO-1594  
1-31-92

10-12-1999



U.S. Department of Commerce  
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Attorney Docket No. 04329.2174

To the Honorable Commissioner of Patents and  
Please record the attached original documents

101169457

BOX ASSIGNMENTS

1530 U.S. PTO  
09/408177  
09/29/99

1. Name of conveying parties:  
Hiroshi TOMITA and Soichi NADAHARA  
Additional name(s) of conveying party(ies) attached?  Yes  No

2. Name and address of receiving party:  
Name: Kabushiki Kaisha Toshiba  
Internal Address:

3. Nature of conveyance:  
 Assignment  Merger  
 Security Agreement  Change of Name

Street Address: 72 Horikawa-cho, Saiwai-ku  
Kawasaki-shi, Japan  
City:  
State: Zip Code:

Other  
Execution Date: September 14, 1999

Additional name(s) & Address(es) attached?  
 Yes  No

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: September 14, 1999  
A. Patent Application Number(s): 09/408177  
B. Patent Number(s):  
Additional numbers attached?  Yes  No

5. Name and address of party to whom correspondence concerning document should be mailed:  
Name: Mr. Ernest F. Chapman  
Internal Address: FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER, L.L.P.

6. Total number of applications and registrations involved: 1  
7. Total fee (37 CFR 3.41): \$40  
  
Enclosed (Please charge deficiency to deposit account)   
Authorized to be charged to deposit account

10/07/1999 IARTIS 00000046 09408177  
03 10:381  
Street Address: 1300 I Street, N.W.  
City: Washington  
State: DC Zip: 20005-3315

8. Deposit account number: 06-0916 E

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.

Richard V. Burgujian \_\_\_\_\_ September 29, 1999  
Registration No. 31,744 Signature Date

Total number of pages including cover sheet, attachments and documents: 2

In consideration of value received, I, having a residence as stated below above my name, the sole inventor (if only one name is listed below) or a joint inventor (if plural inventors are listed below) of an invention described in an application for United States patent entitled:

ETCHING METHOD AND ETCHING APPARATUS, METHOD FOR  
MANUFACTURING SEMICONDUCTOR DEVICE, AND SEMICONDUCTOR  
DEVICE

sell and assign to

KABUSHIKI KAISHA TOSHIBA, a Japanese corporation, having a place of business at  
72 Horikawa-cho, Saiwai-ku, Kawasaki-shi, Japan

its successors, and assigns or nominees, hereinafter referred to as "Assignee", my entire right, title and interest in and to said invention as disclosed, shown and described in said United States patent application:

(check one)  executed concurrently herewith;  
 executed on \_\_\_\_\_ ;  
 Application No. \_\_\_\_\_ , filed \_\_\_\_\_ ;

and in and to all applications for patent and patents for invention, in all countries of the world, including all divisions, reissues, continuations, substitutes and extensions thereof and all rights arising under or pursuant to any and all international agreements, treaties or laws relating to the protection of industrial property, including rights of priority, resulting from the filing of any of said applications; and I authorize and request any official whose duty is to issue patents, to issue any patent on said invention or resulting therefrom to said Assignee, and I agree that on request and without further consideration, but at the expense of said Assignee, I will communicate to said Assignee or its representatives all facts known to me respecting said invention and testify in any legal proceedings, sign all lawful papers, execute all divisional, continuing, reissue, or other applications, make all rightful oaths and declarations, and generally do everything possible to aid said Assignee to obtain and enforce proper patent protection for said invention in all countries.

I hereby grant the following law firm the power to insert on this Assignment any further identification which may be necessary or desirable in order to comply with the Rules of the U.S. Patent and Trademark Office for recordation of this document.

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