05-27-2005

Form PTO-1595 (Rev. 09/04) U.S. DEPARTMENT OF COMMERCE OMB No. 0651-0027 (exp. 6/30/2005) United States Patent and Trademark Office 103011236 To the Director of the U.S. Patent and Trademark Office: Please record the attached documents or the new address(es) below. 2. Name and address of receiving party(ies) 1. Name of conveying party(ies)/Execution Date(s): Nicholas J. Krebs (11/12/2004) and Joseph P. The General Hospital Corporation Vacanti (11/18/2004) Internal Address: Execution Date(s): in parentheses after inventor name Street Address: x No Additional name(s) of conveying party(ies) attached? 55 Fruit Street 3. Nature of Conveyance: x Assignment Merger Security Agreement Change of Name **Boston** City: Government Interest Assignment Massachusetts State: Executive Order 9424, Confirmatory License Country: United States of America Zip: 02114 Additional name(s) & address(es) Other Yes x No 4. Application or patent number(s): This document is being filed together with a new application. A. Patent Application No.(s) B. Patent No.(s) 10/983,213 Additional numbers attached? 5. Name and address to whom correspondence 6. Total number of applications and concerning document should be mailed: patents involved: Name: Amy Leahy **EDWARDS & ANGELL, LLP** 7. Total fee (37 CFR 1.21(h) & 3.41) \$ 40.00 Internal Address: Atty. Dkt.: 62017CIP2(51588) Authorized to be charged by credit card Street Address: P.O. Box 55874 Authorized to be charged to deposit account Х **Enclosed** None required (government interest not affecting title) City: 8. Payment Information State: Zip: 02205 a. Credit Card Last 4 Numbers (203) 975-7505 **Expiration Date** Phone Number: (203) 975-7180 Fax Number: b. Deposit Account Number 04-1105 Authorized User Name Amy M. Leahy Email Address: aleahy@edwardsangell.com

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Amy M. Leahy - 47.739

Name of Person Signing

9. Signature:

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May 23, 2005

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

## **ASSIGNMENT BY INVENTORS**

THIS ASSIGNMENT, made this 12, 18 day of November, 2004, by Nicholas J. Krebs and Joseph P. Vacanti (hereinafter referred to as Assignors), residing at Laboratory for Tissue Engineering and Organ Fabrication, Massachusetts General Hospital, 55 Fruit Street, Boston, Massachusetts 02114; and 14 Woodside Road, Winchester, Massachusetts 01890, respectively;

WHEREAS, Assignors have invented certain new and useful improvements in MICROMACHINED BILAYER UNIT OF ENGINEERED TISSUES, set forth in a Patent application for Letters Patent of the United States, filed on already filed on November 5, 2004 as U.S. application No. Not Yet Assigned; and

WHEREAS, THE GENERAL HOSPITAL CORPORATION, a Non-profit Corporation organized under and pursuant to the laws of Massachusetts having its principal place of business at 55 Fruit Street, Boston, Massachusetts 02114 (hereinafter referred to as Assignee), is desirous of acquiring the entire right, title and interest in and to said inventions and said Application for Letters Patent of the United States, and in and to any Letters Patent of the United States to be obtained therefore and thereon.

NOW, THEREFORE, in consideration of One Dollar (\$1.00) and other good and sufficient consideration, the receipt of which is hereby acknowledged, Assignors have sold, assigned, transferred and set over, and by these presents do sell, assign, transfer and set over, unto Assignee, its successors, legal representatives and assigns, the entire right, title and interest in and to the above-mentioned inventions and application for Letters Patent, and in and to any and all direct and indirect divisions, continuations and continuations-in-part of said application, and any and all Letters Patent in the United States and all foreign countries which may be granted therefore and thereon, and reissues, reexaminations and extensions of said Letters Patent, and all rights under the International Convention for the Protection of Industrial Property, the same to be held and enjoyed by Assignee, for its own use and benefit and the use and benefit of its successors, legal representatives and assigns, to the full

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end of the term or terms for which Letters Patent may be granted and/or extended, as fully and entirely as the same would have been held and enjoyed by Assignors, had this sale and assignment not been made.

AND for the same consideration, Assignors hereby represent and warrant to Assignee, its successors, legal representatives and assigns, that, at the time of execution and delivery of these presents, except for any rights, titles and/or interests that have arisen to Assignee under law or that have already been transferred to Assignee, Assignors are the sole and lawful owners of the entire right, title and interest in and to the said inventions and application for Letters Patent above-mentioned, and that the same are unencumbered and that Assignors have good and full right and lawful authority to sell and convey the same in the manner herein set forth.

AND for the same consideration, Assignors hereby covenant and agree to and with Assignee, its successors, legal representatives and assigns, that Assignors will sign all papers and documents, take all lawful oaths and do all acts necessary or required to be done for the procurement, maintenance, enforcement and defense of any Letters Patent and applications for Letters Patent for said inventions, without charge to Assignee, its successors, legal representatives and assigns, whenever counsel of Assignee, or counsel of its successors, legal representatives and assigns, shall advise: that any proceeding in connection with said inventions, or said Patent application for Letters Patent, or any proceeding in connection with any Letters Patent or applications for Letters Patent for said inventions in any country, including but not limited to interference proceedings, is lawful and desirable; or, that any division, continuation or continuation-in-part of any application for Letters Patent, or any reissue, reexamination or extension of any Letters Patent, to be obtained thereon, is lawful and desirable.

AND Assignors hereby request the Commissioner of Patent and Trademarks to issue said Letters Patent of the United States to Assignee, as Assignee of said inventions and the Letters Patent to be issued thereon, for the sole use and benefit of Assignee, its successors, legal representatives and assigns.

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AND Assignors hereby grant the following individuals 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 United States Patent and Trademark Office for recordation of this document:

**EDWARDS & ANGELL, LLP** 

All practitioners at Customer Number 21874

AND Assignors acknowledge an obligation of assignment of this invention to Assignee at the time the invention was made.

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Nicholas J. Krebs

United States of America
State of Massachusetts ) ss.:

County of Suffolk

On this \_\_\_\_\_\_ day of November, \_\_\_\_\_\_\_\_\_\_, before me personally came \_\_\_\_\_\_ Nicholas J. Krebs \_\_\_\_\_, to me known to be the individual described in and who executed the foregoing instrument, and acknowledged execution of the same.

LINDA A. GULLA
Notary Public
Commonwealth of Massachusetts
My Commission Expires Mar 31, 2006

PATENT REEL: 016594 FRAME: 0753 Joseph P. Vacanti

Date: November 18, 2004	
United States of America ) State of <u>MNSSAUNSETTS</u> ) s County of <u>SUFFULL</u> )	s.:
On this day of NormBer personally came Joseph P. Vacanti described in and who executed the foregoing of the same.	, to me known to be the individual instrument, and acknowledged execution
	Notary Public

**RECORDED: 05/25/2005** 

PATENT REEL: 016594 FRAME: 0754