02-08-2002



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CORDATION FORM COVER SHEET

morable Commissioner of Patents and Trademarks: ord the attached original documents or copy thereof.

1. Name of conveying party(ies):	2. Name and address of receiving party(ies)
Peter D. HRYCAK O//30/02	Name: NORTHROP GRUMMAN CORPORATION
Additional name(s) of conveying party(ies) attached?	1840 Century Park East
Yes No	Los Angeles CA 90067
3. Nature of conveyance:	U.S.A.
Security Agreement Change of Name	Additional name(s) & address(es) attached? Yes No
Other:	
Execution Dates: January 21, 2002	
4. Application number(s) or patent number(s):	
If this document is being filed together with a new application, the execution dates of the application are: January 21, 2002	
A. Patent Application No(s).	B. Patent No.(s).
10/058336	
Additional numbers attached? Yes No	
5. Name and address of party to whom correspondence	6. Total No. of applications/patents involved: One (1)
concerning document should be mailed:	7. Total fee (37 C.F.R. § 3.41): \$40.00
BIRCH, STEWART, KOLASCH & BIRCH, LLP	□ Enclosed
8110 Gatehouse Road, Suite 500 East	Authorized to be charged to deposit account
Falls Church, VA 22042-1210	8. Deposit account number: 02-2448 - if necessary
U.S.A.	
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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.	
O ₄ .	
William L. Gates, Reg. No. 20,848 Abllions	L. Late 1/30/02
Name of Person Signing/Reg. No.	Signature Date
Total number of pages including cover sheet, attachments, and document: two (2)	

Mail documents to be recorded with required cover sheet information to: Commissioner of Patents & Trademarks, Box Assignments Washington, DC 20231

WLG/mpe

02/04/2002 EHAILE1 00000010 10058336 02 FC:581 40.00 DF

> PATENT REEL: 012545 FRAME: 0085

ASSIGNMENT SOLE

In accordance with existing Employee Intellectual property Agreement(s) and/or other undertaking(s) entered into for good and valuable consideration, receipt of which is hereby acknowledged, I, Peter D. HRYCAK, of Severna Park, Maryland 21146, hereby sell and assign to NORTHROP GRUMMAN CORPORATION, Corporation organized and existing under the laws of Delaware, U.S.A., having its principal place of business at 1840 Century Park East, Los Angeles, California 90067-2199, U.S.A., its successors, assigns, nominees, or other legal representatives, the entire right, title and interest in and to the invention in Phased array antenna system Generating Multiple beams having a COMMON PHASE CENTER, invented by me and the application for United States patent therefor, executed on the same day as the assignment is executed and all original and reissued patents granted therefor, and all divisions and continuations thereof, including the subjects-matter of any and all claims which may be obtained in every such patent, and the right to apply for and obtain patents and Utility Model Registrations in countries foreign to the United States, and in and to any Letters Patent or Utility Model Registration which may be granted thereon in such foreign countries, and authorize and request the Commissioner of Patents and Trademarks of the United States, and any official of any country or countries foreign to the United States whose duty it is to issue patents on applications as aforesaid, to issue the said Letters Patent or Utility Model Registration to the said NORTHROP GRUMMAN CORPORATION, its successors, assigns, nominees or other legal representatives, as assignee of the entire interest, and covenant that I have full right to convey the entire interest herein assigned and that I have not executed and will not execute any agreement in conflict herewith, and agree that I will communicate to said Corporation, its successors, assigns, nominees or other legal representatives, all facts known to me respecting said invention, whenever requested, and testify in any legal proceeding, sign all lawful papers, execute all divisional, continuing and reissue applications, make all rightful oaths and do all lawful acts requisite for the application for such divisional, continuing or reissue applications, or the procuring thereof, and that if and when said NORTHROP GRUMMAN CORPORATION, its successors, assigns, nominees or other legal representatives desire to file a disclaimer relating thereto, I will, upon request, sign all lawful papers requisite for the filing of such disclaimer, and I further covenant and agree that I will, at any time upon request, do everything legally possible to aid said Corporation, its successors, assigns, nominees or other legal representatives, either in its or their own name, to apply for, obtain and enforce proper patent and/or Utility Model protection for said invention in all countries, all without further consideration but at the expense of said NORTHROP GRUMMAN CORPORATION, its successors, assigns, nominees or other legal representatives.

IN TESTIMONY WHEREOF, I have hereunto set my hand and seal this 215 day

of JANUARY, 2002.

RECORDED: 01/30/2002

** TOTAL PAGE 03 **

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