PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT7826830

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	INTELLECTUAL PROPERTY SECURITY AGREEMENT

CONVEYING PARTY DATA

Name	Execution Date
NANTHEALTH, INC. F/K/A ALL ABOUT ADVANCED HEALTH LLC	03/02/2023
THEOPENNMS GROUP, INC. F/K/A BLAST CONSULTING COMPANY	03/02/2023
NAVINET, INC.	03/02/2023

RECEIVING PARTY DATA

Name:	GLAS AMERICAS LLC, AS COLLATERAL AGENT		
Street Address:	3 SECOND STREET, SUITE 206		
City:	JERSEY CITY		
State/Country:	NEW JERSEY		
Postal Code:	07311		

PROPERTY NUMBERS Total: 29

Property Type	Number
Patent Number:	D892151
Patent Number:	10262759
Patent Number:	10437959
Patent Number:	10762171
Patent Number:	11126969
Patent Number:	11521175
Patent Number:	10614919
Patent Number:	9819650
Patent Number:	10200347
Patent Number:	10476853
Patent Number:	10757081
Patent Number:	11050720
Patent Number:	11431687
Patent Number:	11116720
Patent Number:	11195062
Patent Number:	10629296
Patent Number:	11264122
Patent Number:	10050959

PATENT REEL: 062948 FRAME: 0935

507779703

Property Type	Number
Patent Number:	11089881
Patent Number:	9430612
Patent Number:	10558667
Patent Number:	D891451
Application Number:	16840227
Application Number:	17815011
Application Number:	17539292
Application Number:	17404762
Application Number:	16034271
Application Number:	17707925
Application Number:	16957645

CORRESPONDENCE DATA

Fax Number:

Correspondence will be sent to the e-mail address first; if that is unsuccessful, it will be sent using a fax number, if provided; if that is unsuccessful, it will be sent via US Mail.

Phone: 2023704750

Email: ipteam@cogencyglobal.com

Correspondent Name: RODNEY BOULWARE

Address Line 1: 1025 CONNECTICUT AVE NW, SUITE 712

Address Line 2: COGENCY GLOBAL INC.0
Address Line 4: WASHINGTON, D.C. 20036

ATTORNEY DOCKET NUMBER:	1930146 PT
NAME OF SUBMITTER:	DAHLIA GOTTLIEB
SIGNATURE:	/Dahlia Gottlieb/
DATE SIGNED:	03/03/2023

Total Attachments: 9

source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page3.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page4.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page5.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page6.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page7.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page8.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page9.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page10.tif source=NantHealth - Intellectual Property Security Agreement (Patent) - with cover#page11.tif

INTELLECTUAL PROPERTY SECURITY AGREEMENT

THIS INTELLECTUAL PROPERTY SECURITY AGREEMENT (this "Agreement") dated as of March 2, 2023, by NANTHEALTH, INC., a Delaware corporation, NAVINET, INC., a Delaware corporation and THEOPENNMS GROUP, INC., a North Carolina Corporation (collectively, the "Grantors" and each individually, a "Grantor"), in favor of GLAS Americas LLC, as Collateral Agent (in such capacity, together with its successors and assigns, the "Collateral Agent").

WITNESSETH

WHEREAS, each Grantor, certain Grantors' affiliates and the Collateral Agent are parties to (i) that certain Credit Agreement as of even date herewith (as the same may be amended, restated, supplemented or otherwise modified from time to time, the "Credit Agreement") providing for the extensions of credit to be made to the Borrower by the Lenders party thereto and (ii) that certain Security and Pledge Agreement as of even date herewith (as the same may be amended, restated, supplemented or otherwise modified from time to time, the "Security Agreement") providing for the grant of security interest in the Collateral thereto; and

WHEREAS, each Grantor has granted to the Collateral Agent a security interest in substantially all of the assets of such Grantor including all right, title and interest of such Grantor in, to and under all now owned and hereafter acquired trademarks, copyrights, and patents, together with the goodwill of the business symbolized by such Grantor's trademarks, patents and copyrights and all products and proceeds thereof, to secure the payment of all amounts owing by such Grantor under the Credit Agreement.

NOW, THEREFORE, in consideration of the premises set forth herein and for other good and valuable consideration, receipt and sufficiency of which are hereby acknowledged, each Grantor agrees as follows:

- 1. <u>Incorporation of Credit Agreement and Security Agreement</u>. The terms and provisions of the Credit Agreement and the Security Agreement are hereby incorporated in their entirety by this reference into this Agreement. All terms capitalized but not otherwise defined herein shall have the same meanings ascribed to them in the Credit Agreement and the Security Agreement, as applicable.
- 2. <u>Grant of Security Interests</u>. To secure the payment and performance of the Obligations, each Grantor hereby grants to the Collateral Agent a continuing security interest in such Grantor's entire right, title and interest in, to and under the following, whether now owned or existing or hereafter created, acquired or arising:
 - (i) each trademark, patent and copyright listed on <u>Schedule 1</u> annexed hereto, (such trademarks, patents and copyrights, the "<u>Trademarks</u>", "<u>Patents</u>" and "<u>Copyrights</u>") together with any reissues, continuations or extensions thereof, and all of the goodwill of the business connected with the use of, and symbolized by, each Trademark, Patent and Copyright; and
 - (ii) all products and proceeds of the forgoing, including without limitation, any claim by such Grantor against third parties for past, present or future (a)infringement or dilution of any Trademark, Copyright or Patent, or (b) injury to the goodwill associated with any Trademark.
- 3. <u>Representations and Warranties</u>. Each Grantor hereby represents and warrants that the Trademarks, Patents and Copyrights listed on <u>Schedule I</u> attached hereto constitute all trademarks, patents and copyrights owned and registered to such Grantor as of the date hereof.

1

- 4. Right to Bring Suit. Each Grantor shall have the right, with the prior written consent of the Collateral Agent, which consent shall not be unreasonably withheld, conditioned or delayed, to bring suit in its own name to enforce the Trademarks, Patents and Copyrights, in which case Collateral Agent may, at Collateral Agent's option, be joined as a nominal party to this suit if the Collateral Agent shall be satisfied that the joinder is necessary and that the Collateral Agent is not incurring any risk of liability by that joinder. Each Grantor shall promptly, upon demand, reimburse and indemnify, defend, and hold harmless the Collateral Agent for all damages, costs and expenses, including reasonable attorneys' fees, incurred by the Collateral Agent pursuant to this paragraph.
- 5. Governing Law; Submission to Jurisdiction; Venue; Waiver of Jury Trial. The terms of Sections 10.13 and 10.14 of the Credit Agreement with respect to governing law, submission to jurisdiction, venue and waiver of jury trial are incorporated herein by reference, *mutatis mutandis*, and the parties hereto agree to such terms.
- 6. <u>Notices</u>. Any notice required or permitted to be given under this Agreement shall be sent in accordance with Section 10.2 of the Credit Agreement.
- 7. <u>Counterparts.</u> This Agreement may be executed in any number of counterparts, each of which where so executed and delivered shall be an original, but all of which shall constitute one and the same instrument. It shall not be necessary in making proof of this Agreement to produce or account for more than one such counterpart. Delivery of an executed counterpart of a signature page of this Agreement by fax transmission or other electronic mail transmission (e.g. "pdf" or "tif") shall be effective as delivery of a manually executed counterpart of this Agreement. Without limiting the foregoing, to the extent a manually executed counterpart is not specifically required to be delivered, upon the request of any party, such fax transmission or electronic mail transmission shall be promptly followed by such manually executed counterpart.
- 8. <u>Electronic Execution.</u> The words "delivery," "execute," "execution," "signed," "signature," and words of like import in this Agreement or any other document executed in connection herewith shall be deemed to include electronic signatures, or the keeping of records in electronic form, each of which shall be of the same legal effect, validity or enforceability as a manually executed signature, physical delivery thereof or the use of a paper-based recordkeeping system, as the case may be, to the extent and as provided for in any applicable Law, including the Federal Electronic Signatures in Global and National Commerce Act, the New York State Electronic Signatures and Records Act or any other similar state laws based on the Uniform Electronic Transactions Act; <u>provided</u> that notwithstanding anything contained herein to the contrary, neither the Administrative Agent, nor any Grantor is under any obligation to agree to accept electronic signatures in any form or in any format unless expressly agreed to by such Person pursuant to procedures approved by it; <u>provided further</u> without limiting the foregoing, upon the request of the Administrative Agent or any Grantor, any electronic signature shall be promptly followed by such manually executed counterpart.

[Remainder of Page Intentionally Blank]

2

IN WITNESS WHEREOF, the parties hereto have duly executed this Agreement as of the day and year first above written.

NANTHEALTH, INC., as Grantor

By: Bob Petron

Name: Bob Petrou

Title: General Counsel, Chief Financial Officer, Treasurer and

Secretary

NAVINET, INC., as Grantor

By: Bob Petrou

Name: Bob Petrou

Title: Chief Financial Officer,

Treasurer and Secretary

THE OPENNMS GROUP, INC., as Grantor

Bob Petrou

Name: Bob Petrou

Title: Chief Financial Officer

GLAS AMERICAS LLC, as Collateral Agent

By: Name: Katie Fischer
Title: Vice President

[Signature Page to Intellectual Property Security Agreement]

Schedule I

(See Attached)

Trademarks for The OpenNMS Group, Inc.

Mark	Serial No.	Reg. No.	Owner
OPENNMS	85/071,501	3,969,304	The OpenNMS
			Group, Inc.
OPENNMS	87/165,322	5,299,424	The OpenNMS
			Group, Inc.
OPENNMS	87/240,338	5,439,146	The OpenNMS
			Group, Inc.
HORIZON	87/163,701	5,444,154	The OpenNMS
			Group, Inc.
MERIDIAN	87/163,824	5,195,006	The OpenNMS
			Group, Inc.
COMPASS	87/163,921	5,351,594	The OpenNMS
			Group, Inc.

Trademarks for NaviNet, Inc.

Mark	Serial No.	Reg. No.	Owner
NAVINET	75/872,673	2,632,379	NaviNet, Inc.

Trademarks for NantHealth, Inc.

Mark	Serial No.	Reg. No.	Owner
EVITI	77/847,235	3,912,060	NantHealth, Inc.
EVITI CONNECT	85/566,532	4,236,901	NantHealth, Inc.
GPS CANCER	86/766,233	5,242,131	NantHealth, Inc.
eviti ADVISOR	87/426,943	5,462,190	NantHealth, Inc.
Feather Design System	97/505,897		NantHealth, Inc.
FEATHER DS	97/505,819		NantHealth, Inc.
Feather Design System LOGO	97/505,851		NantHealth, Inc.

NantHealth Patent Portfolio

Title	Application Number	Publication Number	Patent Number	Owner/Applicant
Display Screen or	29/649132		D892,151	NantHealth, Inc.
Portion Thereof with				
Graphical User Interface				
Personal Health	14/657,679	2015-0269321	10,262,759	NantHealth, Inc.
Operating System				
Patient Sensor Data	14/835,714	2016-0058390	10,437,959	NantHealth, Inc.
Exchange Systems and				
Methods				
Patient Sensor Data	16/561,750	2019-0392930	10,762,171	NantHealth, Inc.
Exchange Systems and				
Methods				
Patient Sensor Data	16/941,387	2020-0357496	11,126,969	NantHealth, Inc.
Exchange Systems and				
Methods				
Patient Sensor Data	17/408,196	2021-0383328	11,521,175	NantHealth, Inc.
Exchange Systems and				
Methods				
Automated Medical	14/047,621		10,614,919	NantHealth, Inc.
Diagnosis, Risk				
Management, and				
Decision Support				
Systems and Methods				
Automated Medical	16/840,227	2020-0294671		NantHealth, Inc.
Diagnosis, Risk				
Management, and				
Decision Support				
Systems and Methods				
Homomorphic	14/805,417	2016-0105402	9,819,650	NantHealth, Inc.
Encryption in a				
Healthcare Network				
Environment, System				
and Methods				
Homomorphic	15/727,494	2018-0048628	10,200,347	NantHealth, Inc.
Encryption in a				
Healthcare Network				
Environment, System				
and Methods				
Homomorphic	16/228,572	2019-0124051	10,476,853	NantHealth, Inc.
Encryption in a				
Healthcare Network				
Environment, System				
and Methods				
Homomorphic	16/679,078	2020-0099666	10,757,081	NantHealth, Inc.
Encryption in a				
Healthcare Network				
Environment, System				
And				
Methods				

Homomorphic Encryption in a Data	16/939,360	2020-0358746	11,050,720	NantHealth, Inc.
Processing Network Environment, System				
and Methods	1= (0.01, 0.00		11 121 22-	
Homomorphic	17/331,863	20210377231	11,431,687	NantHealth, Inc.
Encryption in a				
Healthcare Network				
Environment, System				
and Methods				
Homomorphic	17/815,011	20220385450		NantHealth, Inc.
Encryption in a				
Healthcare Network				
Environment, System				
and Methods				
Ice Pop Medicament	16/554,421	20200069580	11,116,720	NantHealth, Inc.
Delivery System and				
Method				
Classification Based on	16/685,191	20200160097	11,195,062	NantHealth, Inc.
Characterization				NANTOMICS, LLC.
Analysis Methods and				·
Systems				
Classification Based on	17/539,292	20220092340		NantHealth, Inc.
Characterization	, ,			NantOmics, LLC.
Analysis Methods and				,
Systems				
Image or Waveform	17/404,762	20220059239		NantHealth, Inc.
Analysis Method,	17, 10 1,7 02	20220033233		rtantinearin, me.
System and Non-				
transitory Computer-				
readable Storage				
Medium				
Mobile Carrier-Centric	14/838,264	2016-0063189	10,629,296	NantHealth, Inc.
Data Record Custodian	14/030,204	2010-0003189	10,029,290	Nanthealth, Inc.
Systems and Methods	16/052 216	2020 0242476	11 264 122	Nie alde alde de c
Location Based Medical	16/852,316	2020-0243176	11,264,122	NantHealth, Inc.
Record Management				
Systems and Methods	44/044.074	2016 0072000	10.050.050	
Synthetic Genomic	14/844,974	2016-0072800	10,050,959	NantHealth, Inc.
Variant-Based Secure				NantOmics, LLC
Transaction Devices,				
Systems and Methods				
Modular Mattress and	16/221,360	2019-0183255	11,089,881	NantHealth, Inc.
Bedframe System with				
Surface Positioning				
Actuators				
Synthetic Genomic	16/034,271	2019-0020651		NantHealth, Inc.
Variant-Based Secure				Nantomics, LLC
Transaction Devices,				
Systems and Methods				
Synthetic Genomic	17/707,925	2022-0224686		NantHealth, Inc.
Variant-Based Secure				Nantomics, LLC
Transaction Devices,				
Systems and Methods				

System and Method for Healthcare Data Management	12/700,477	2010-0205597	9,430,612	NaviNet, Inc.
System and Method of Healthcare Data Management	15/213,917	2016-0328447	10,558,667	NaviNet, Inc.
Display Screen or Portion Thereof with Graphical User Interface	29/649,130		D891,451	NantHealth, Inc.
User Interface Log Validation Via Blockchain System and Methods	16/957,645	20210042839		NantHealth, Inc.

#96432186v15 PATENT
RECORDED: 03/03/2023 REEL: 062948 FRAME: 0945