PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT5186767

| SUBMISSION TYPE: | NEW ASSIGNMENT |
|-----------------------|----------------|
| NATURE OF CONVEYANCE: | ASSIGNMENT |

CONVEYING PARTY DATA

| Name | Execution Date | |
|---------------|----------------|--|
| PHASERX, INC. | 02/02/2018 | |

RECEIVING PARTY DATA

| Name: | ROIVANT HEPATOLOGY GMBH |
|-----------------|-------------------------|
| Street Address: | VIADUKTSTRASSE 8 |
| City: | BASEL |
| State/Country: | SWITZERLAND |
| Postal Code: | 4051 |

PROPERTY NUMBERS Total: 63

| Property Type | Number | | | | |
|---------------------|----------|--|--|--|--|
| Patent Number: | 8822213 | | | | |
| Patent Number: | 9006193 | | | | |
| Patent Number: | 9211250 | | | | |
| Patent Number: | 9220791 | | | | |
| Patent Number: | 9339558 | | | | |
| Patent Number: | 9415113 | | | | |
| Patent Number: | 9464300 | | | | |
| Patent Number: | 9476063 | | | | |
| Patent Number: | 9593169 | | | | |
| Patent Number: | 9662403 | | | | |
| Patent Number: | 9862792 | | | | |
| Patent Number: | 9867885 | | | | |
| Application Number: | 61860136 | | | | |
| Application Number: | 61868122 | | | | |
| Application Number: | 15827793 | | | | |
| Application Number: | 62106024 | | | | |
| Application Number: | 62173847 | | | | |
| Application Number: | 62233568 | | | | |
| Application Number: | 15545302 | | | | |
| Application Number: | 62440941 | | | | |
| | | | | | |

PATENT REEL: 047649 FRAME: 0829

505140002

| Property Type | Number |
|---------------------|--------------|
| Application Number: | 62446186 |
| Application Number: | 61052908 |
| Application Number: | 61052914 |
| Application Number: | 61091294 |
| Application Number: | 61120769 |
| Application Number: | 61171365 |
| Application Number: | 61171377 |
| Application Number: | 12992545 |
| Application Number: | 12992541 |
| Application Number: | 14630477 |
| Application Number: | 15499683 |
| Application Number: | 15828078 |
| Application Number: | 61112048 |
| Application Number: | 61112054 |
| Application Number: | 61140774 |
| Application Number: | 61140779 |
| Application Number: | 61171369 |
| Application Number: | 61171358 |
| Application Number: | 61171381 |
| Application Number: | 13127962 |
| Application Number: | 61177921 |
| Application Number: | 61243898 |
| Application Number: | 14957429 |
| Application Number: | 15254874 |
| Application Number: | 61120756 |
| Application Number: | 15428063 |
| Application Number: | 61262512 |
| Application Number: | 61262516 |
| PCT Number: | US2014048839 |
| PCT Number: | US2016014232 |
| PCT Number: | US2017068841 |
| PCT Number: | US2009043847 |
| PCT Number: | US2009043839 |
| PCT Number: | US2009043849 |
| PCT Number: | US2009043837 |
| PCT Number: | US2009043853 |
| PCT Number: | US2009043859 |
| PCT Number: | US2009043852 |

| Property Type | Number | | | | |
|---------------------|--------------|--|--|--|--|
| PCT Number: | US2009043860 | | | | |
| PCT Number: | US2009063648 | | | | |
| PCT Number: | US2009067193 | | | | |
| PCT Number: | US2010056993 | | | | |
| Application Number: | 16100163 | | | | |

CORRESPONDENCE DATA

Fax Number: (202)371-2540

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: (202) 371-2600

Email: bncombs@skgf.com, mwood@skgf.com

Correspondent Name: STERNE, KESSLER, GOLDSTEIN & FOX P.L.L.C

Address Line 1: 1100 NEW YORK AVENUE, N.W.

Address Line 4: WASHINGTON, D.C. 20005

| ATTORNEY DOCKET NUMBER: | 4170 |
|-------------------------|------------------------------------|
| NAME OF SUBMITTER: | BONNIE W. NANNENGA-COMBS |
| SIGNATURE: | /Bonnie W. Nannenga-Combs #67,836/ |
| DATE SIGNED: | 10/12/2018 |

Total Attachments: 42

source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page1.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page2.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page3.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page4.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page5.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page6.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page7.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page8.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page9.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page10.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page11.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page12.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page13.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page14.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page15.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page16.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page17.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page18.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page19.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page20.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page21.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page22.tif source=1. Bill of Sale and Assignment and Assumption Agreement + Asset Purchase#page23.tif

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BILL OF SALE AND ASSIGNMENT AND ASSUMPTION AGREEMENT

This BILL OF SALE AND ASSIGNMENT AND ASSUMPTION AGREEMENT (this "Agreement") is entered into as of February 2, 2018 by and between Roivant Sciences GmbH, Roivant Hepatology GmbH and Roivant Hepatology, Inc. (collectively, "Buyer"), and PhaseRx, Inc., a Delaware corporation ("Seller," "PhaseRx," or "Debtor"). Each capitalized term used without definition in this Agreement shall have the same meaning given to such capitalized term in that certain Asset Purchase Agreement dated as of even date herewith (the "Purchase Agreement").

WHEREAS, pursuant to terms of the Purchase Agreement, Roivant Sciences GmbH has agreed to (a) purchase from Seller and Seller has agreed to cause to be sold, assigned, transferred, conveyed, and delivered to Buyer all of the Seller's right, title and interest to the Acquired Assets set forth on Schedule 1.1 thereto, except as expressly disclaimed by Buyer; and (b) assume, and shall thereafter pay, discharge and perform as and when due all of the Assumed Liabilities.

WHEAREAS, pursuant to section 8.1 of the Purchase Agreement, Roivant Sciences GmbH may designate an affiliated designee or assignee in its place and stead, and if so, such entity shall become the "Buyer" under the Purchase Agreement for all purposes.

WHEREAS, Roivant Sciences GmbH has designated Roivant Hepatology GmbH and Roivant Hepatology, Inc. as the "Buyer" of certain of the Acquired Assets as set forth below.

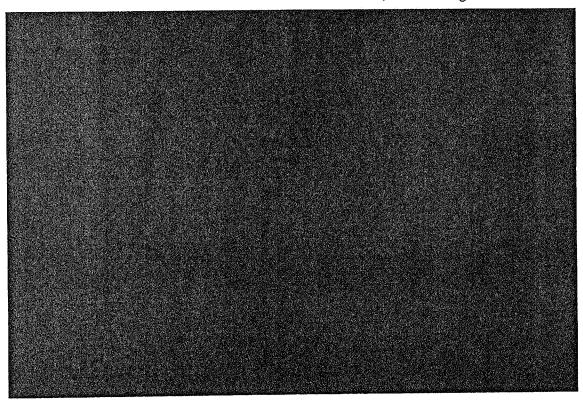
NOW, THEREFORE, in consideration of the foregoing and intending to be legally bound, the parties hereto agree as follows:

1. Sale, Transfer and Assignment of Acquired Assets.

- (a) In accordance with and subject to the terms and conditions set forth in the Purchase Agreement, including Section 5.1 thereof, for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, Roivant Hepatology GmbH hereby purchases from Seller and Seller hereby sells, assigns, transfers, conveys, and delivers to Roivant Hepatology GmbH all of Seller's right, title and interest in and to the following Acquired Assets free and clear of any Interests:
 - All intellectual property rights, licenses, contractual rights, goodwill, going concern value, rights and claims owned, controlled, leased or licensed by or to Seller, including without limitation:
 - o All patent rights owned or controlled by Seller, including without limitation, those listed on Schedule 1.1(a)) of the Purchase Agreement:
 - All patents, patent applications, and trademarks;
 - All data related to nonclinical assets (e.g. study reports, raw data, regulatory interactions);
 - o All filings, correspondences and documents with any Governmental Body;

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- Any confidentiality, nondisclosure, non-solicitation, assignment of inventions or assignment of developments contracts to which the Seller is a party that are not executory contracts; and
- o All of Seller's rights, title and interests under (including its rights to enforce) rights under non-disclosure, confidentiality or similar agreements



- 3. <u>Delivery of Transfer Documents</u>. Seller agrees that it shall so far as possible, (i) make and give physical delivery and possession of the Acquired Assets to the Buyer set forth above in accordance with the terms of the Purchase Agreement and this Bill of Sale and (ii) deliver to the Buyer set forth above such deeds, bills of sale, endorsements, consents, assignments and other good and sufficient instruments of conveyance and assignment as the parties and their respective counsel shall deem reasonably necessary or appropriate to vest in the applicable Buyer all of its right, title and interest in, to and under the Acquired Assets.
- 4. Effect of Assignment. Nothing in this Agreement shall, or shall be deemed to, modify or otherwise affect any provisions of the Purchase Agreement or affect or modify any of the rights or obligations of the parties under the Purchase Agreement. This Agreement is intended only to effect the sale, assignment, transfer, conveyance and delivery of the Acquired Assets pursuant to the Purchase Agreement and shall be governed by the terms and conditions of the Purchase Agreement. In the event of any conflict between the

164935331 v2 62623300.2 provisions hereof and the provisions of the Purchase Agreement, the provisions of the Purchase Agreement shall govern and control.

- 5. Governing Law. This Agreement shall be construed, performed and enforced in accordance with, and governed by, the laws of the State of Delaware (without giving effect to the principles of conflicts of laws thereof), except to the extent that the laws of such State are superseded by the Bankruptcy Code. For so long as Seller is subject to the jurisdiction of the United States Bankruptcy Court for the District of Delaware (the "Court"), the parties irrevocably elect as the sole judicial forum for the adjudication of any matters arising under or in connection with the Agreement, and consent to the exclusive jurisdiction of, the Court. After Seller is no longer subject to the jurisdiction of the Court, the parties hereto irrevocably elect as the sole judicial forum for the adjudication of any matters arising under or in connection with this Agreement, and consent to the jurisdiction of, any state or federal court located in New Castle County, Delaware.
- 6. Severability. In the event that any part of this Agreement is declared by any court or other judicial or administrative body to be null, void or unenforceable, said provision shall survive to the extent it is not so declared, and all of the other provisions of this Agreement shall remain in full force and effect only if, after excluding the portion deemed to be unenforceable, the remaining terms shall provide for the consummation of the transactions contemplated hereby in substantially the same manner as originally set forth at the later of the date this Agreement was executed or last amended.
- 7. <u>Counterparts</u>. This Agreement may be executed in counterparts, each of which shall be deemed an original, but all of which shall constitute one and the same instrument. Delivery of an executed counterpart to this Agreement by facsimile or .pdf shall have the same force and effect as delivery of an original executed counterpart of this Agreement.

[SIGNATURE PAGE FOLLOWS]

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-3-

IN WITNESS WHEREOF, each of Buyer and Seller has caused this Bill of Sale and Assignment and Assumption Agreement to be executed and delivered by their respective representatives thereunto duly authorized, all as of the date first above written.

| Roivant Scien | ces GmbH |
|------------------------------------------|----------------------------------------------|
| | |
| Ву: | S Bul |
| Name: | Sascha Bucher Head of Global Transactions |
| Title: | Head of Global Transactions |
| Roivant Hepa | talogy GmhH |
| rcorvant ricpa | |
| Ву: | S Back |
| Name: | Sascha Bucher Head of Global Transactions |
| Title: | Head of Global Transactions |
| Roivant Hepa By: Name: Matthe Title: CFO | LATELL N |
| SELLER: PhaseRx, Inc. | |
| . 11mo1(n, 1110) | \sim |
| | 1/2 |
| Ву: | |
| Name: | ROBERT OVERELL |
| Title: | PRETIDENT & CEO |

BUYER:

[SIGNATURE PAGE TO BILL OF SALE AND ASSIGNMENT AND ASSUMPTION AGREEMENT] 164935331 v2 62623300.2

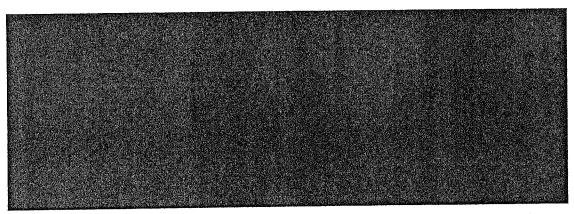
ASSET PURCHASE AGREEMENT

THIS ASSET PURCHASE AGREEMENT (the "Agreement") is made and entered into as of January 31, 2018 (the "Effective Date"), by and between Roivant Sciences GmbH ("Buyer"), and PhaseRx, Inc., a Delaware corporation ("Seller," "PhaseRx," or "Debtor"). Buyer and Seller are sometimes referred to herein individually as a "Party" and collectively as the "Parties." Capitalized terms used herein without separate parenthetical definition have the meanings ascribed to them in Section 8.13 below.

BACKGROUND INFORMATION



WHEREAS, on December 11, 2017, Seller filed for protection under chapter 11 of title 11 of the United States Code (the "Bankruptcy Code") in the United States Bankruptcy Court for the District of Delaware (the "Court") (In re: PhaseRx, Inc., Case No. 17-12890 (CSS)) (the "Bankruptcy Case");



WHEREAS, on December 27, 2018, the Court approved the relief requested in the Bid Procedures Motion [Docket No. 60] (the "Bid Procedures Order"), Buyer desires to purchase the Acquired Assets (as defined below) from Seller, and Seller desires to sell, convey, assign and transfer to Buyer, the Acquired Assets, all in the manner and subject to the terms and conditions set forth in this Agreement and in accordance with sections 105, 363, and 365 of the Bankruptcy Code and other applicable provisions thereof;

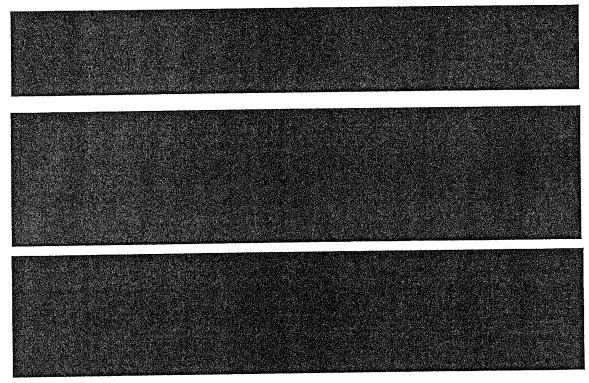
WHEREAS, the Acquired Assets are assets of Seller that are to be purchased by Buyer pursuant to an order of the Court approving such sale pursuant to Sections 105, 363, and 365 of the Bankruptcy Code (the "Sale Order"), all in the manner and subject to the terms and conditions set forth in this Agreement and the Sale Order and in accordance with other applicable provisions of the Bankruptcy Code; and

WHEREAS, the execution and delivery of this Agreement and each Party's ability to consummate the transactions set forth in this Agreement are subject, among other things, to the entry of the Sale Order.

NOW, THEREFORE, in consideration of the foregoing and their respective representations, warranties, covenants and agreements herein contained, and other good and valuable consideration the receipt and sufficiency of which are hereby acknowledged, the Parties hereby agree as follows:

ARTICLE 1 PURCHASE AND SALE OF ACQUIRED ASSETS; CLOSING

1.1 <u>Sale and Purchase of Acquired Assets</u>. Upon the terms and subject to the conditions contained herein, at the Closing (as defined below), Seller shall sell, transfer, assign, convey and deliver to Buyer, and Buyer shall purchase, accept and acquire from Seller, good and marketable title, free and clear of all Liens, claims, encumbrances, and interests (collectively, "Interests") of Seller, other than Assumed Liabilities (as defined below), all of the assets, properties, intellectual property rights, licenses, contractual rights, goodwill, going concern value, rights and claims owned, controlled, leased or licensed by or to Seller, including without limitation, those set forth on Schedule 1.1 hereto, and further including, without limitation, all of Seller's rights, title and interests under (including its rights to enforce) any confidentiality, non-disclosure, non-solicitation, assignment of inventions or assignment of developments contracts to which the Seller is a party that are not executory contracts (collectively, the "Acquired Assets").

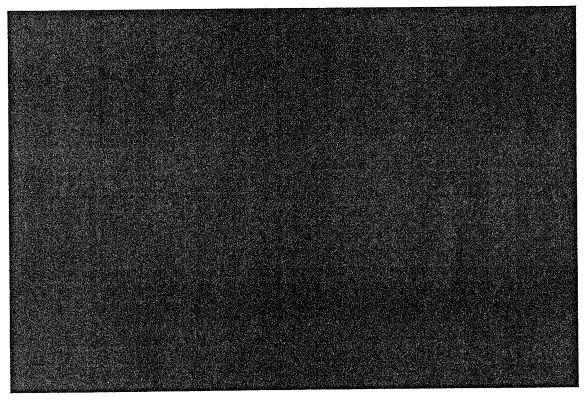


1.5 <u>Closing</u>. Subject to the satisfaction or waiver by the appropriate Party of all of the conditions precedent to Closing specified in Article 5, the consummation of the transactions contemplated by and described in this Agreement (the "Closing") shall take place remotely on February 2, 2018, or on such other date or at such other location as the Parties may mutually designate in writing (the date of consummation is referred to herein as the "Closing Date"). The transactions contemplated herein shall be effective as of 11:59:59 p.m. (EST) on the Closing Date.

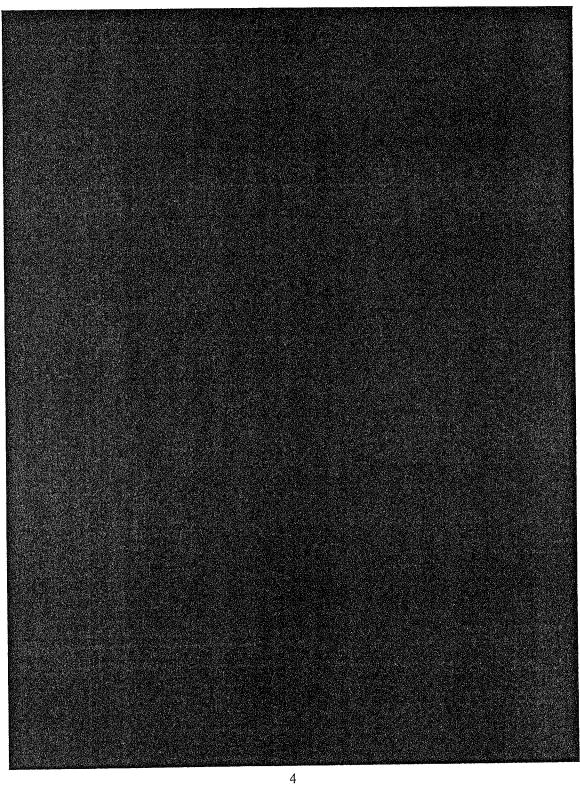
ARTICLE 2 CONSIDERATION FOR TRANSFER

- 2.1 Purchase Price. The purchase price to be paid to Seller for the Acquired Assets will be (the "Cash Purchase Price"), together with that certain promissory note described in Section 2.3. Seller acknowledges that, contemporaneous with Buyer's submission of its bid letter in response to the Bid Procedures Order, Buyer delivered to Seller a good faith deposit in the amount of (the "Deposit").
- 2.2 <u>Payment of Cash Purchase Price</u>. At the Closing, Buyer shall pay to Seller, by delivery of immediately available funds by wire transfer to an account designated by Seller in writing to Buyer, an amount equal to the Cash Purchase Price *less* the Deposit.

2.3 Promissory Note.

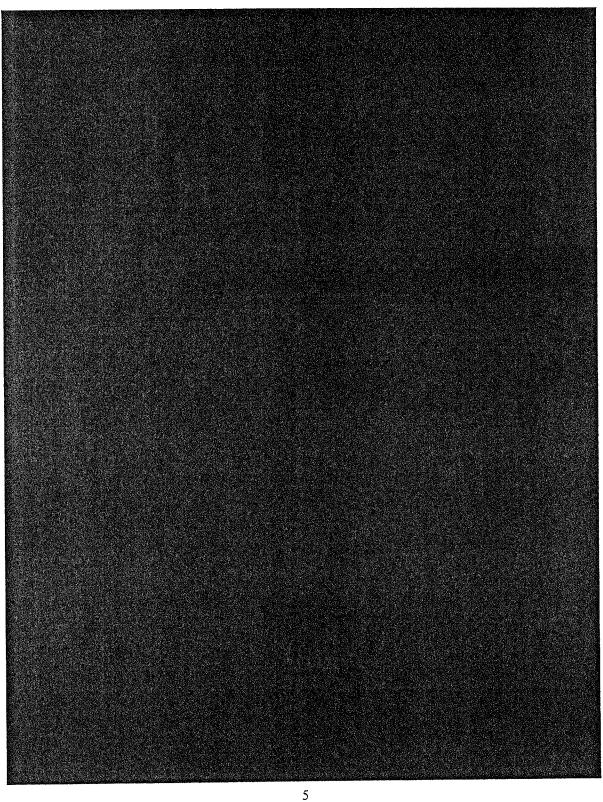


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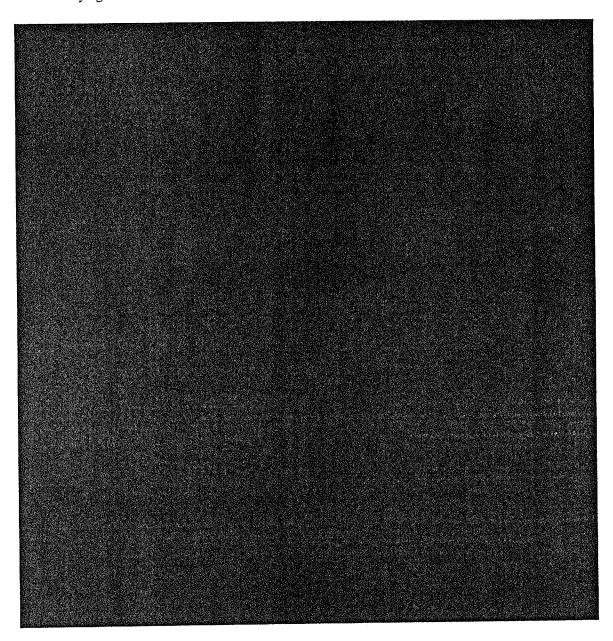
49066/0039-15429601v5 January 31, 2018

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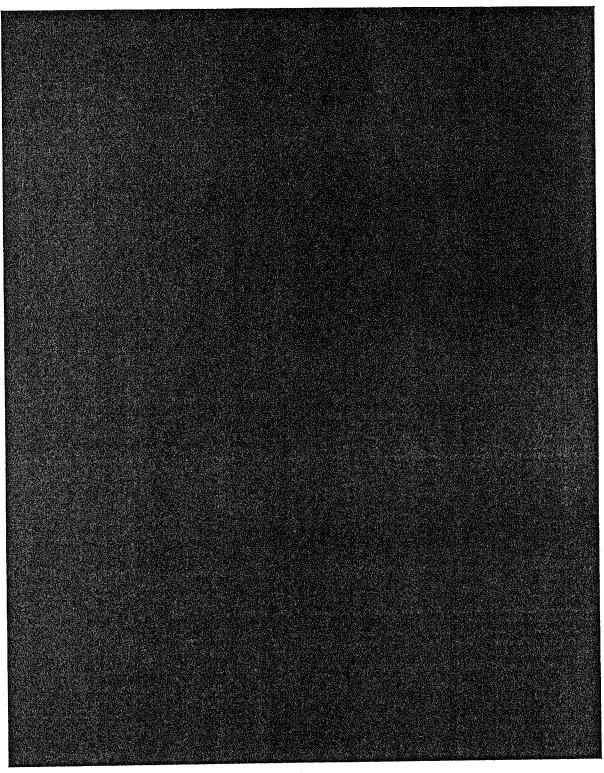


49066/0039-15429601v5 January 31, 2018

(c) <u>Title and Ownership</u>. Seller has good title to the Acquired Assets, free and clear of all Liens and Interests (subject to the Court's entry of the Sale Order). No third party has claimed that the Acquired Assets infringe any third party's rights in the Acquired Assets that are relevant to Seller's delivery technology or mRNA programs. Subject to the entry of the Sale Order, at the Closing, Seller will have the right to transfer the Acquired Assets to Buyer free and clear of all Liens and Interests and will not execute any agreement in conflict therewith.



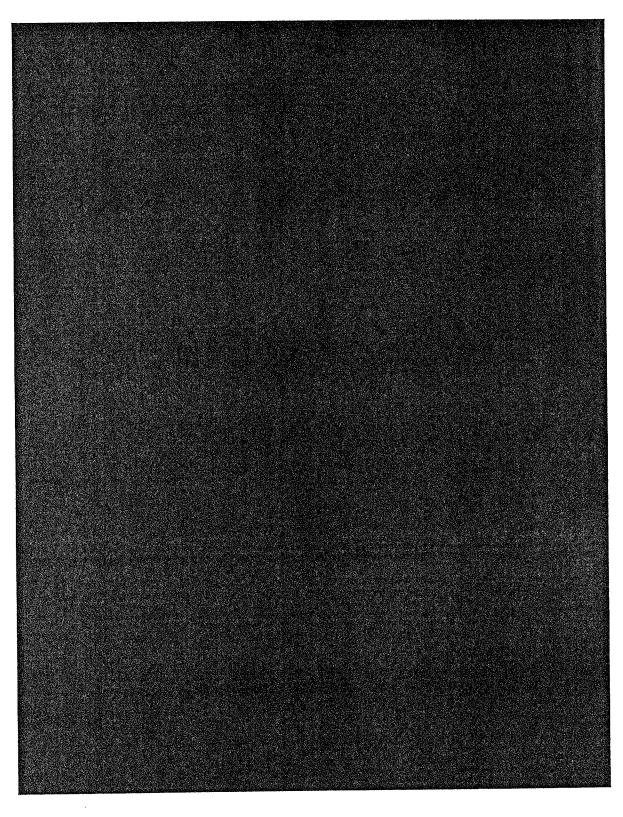
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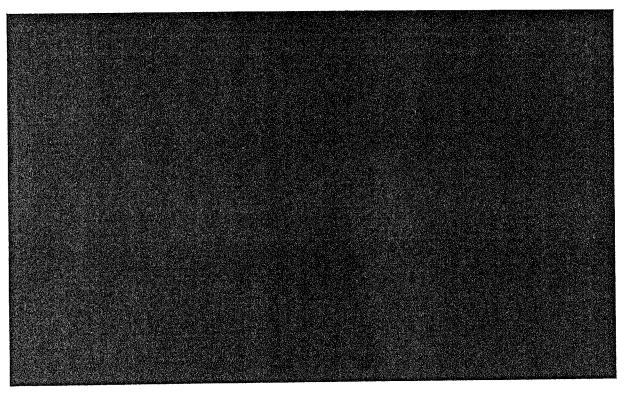
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49066/0039-15429601v5 January 31, 2018

REDACTED



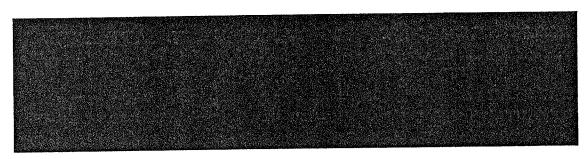
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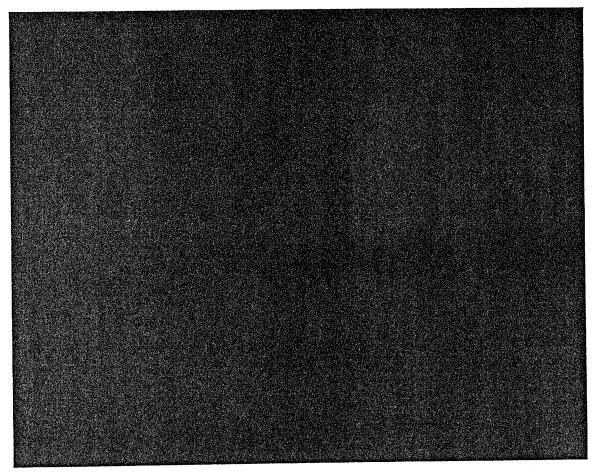


ARTICLE 6
DOCUMENTS TO BE DELIVERED AT CLOSING

6.1 <u>Seller's Deliveries</u>. At the Closing, the sale, transfer, assignment and delivery by Seller of the Acquired Assets to Buyer shall be effected on the Closing Date by bills of sale, endorsements, assignments and other instruments of transfer and conveyance (including with respect to any assignment of the Intellectual Property), and shall otherwise be consistent with the terms of this Agreement reasonably satisfactory in form and substance to Buyer.

6.2 <u>Buyer's Deliveries</u>. At the Closing, Buyer shall pay to Seller the Cash Purchase Price *less* the Deposit and deliver the Buyer Note.



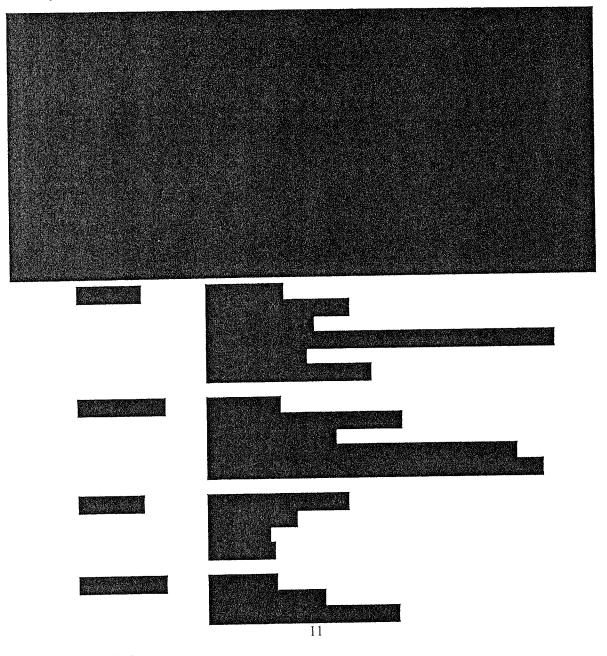


ARTICLE 8
MISCELLANEOUS

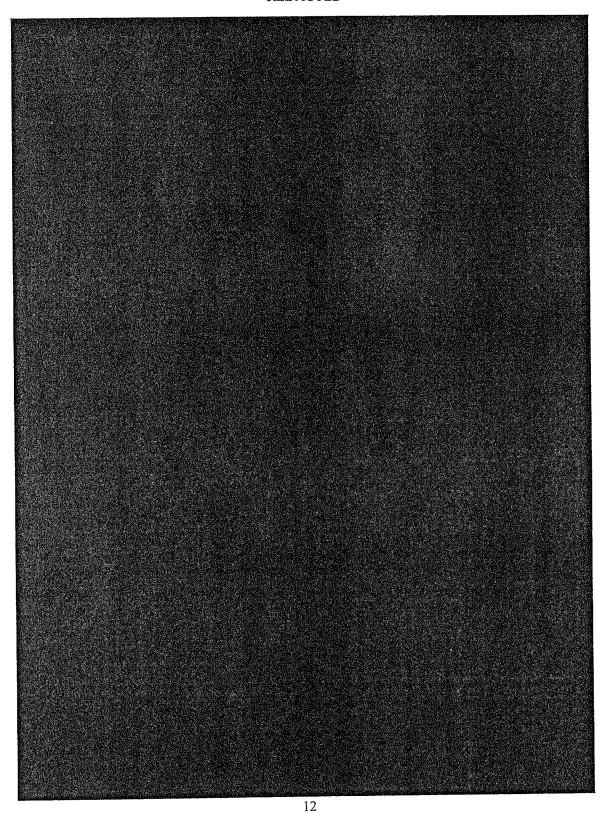
- 8.1 <u>Successors and Assigns</u>. Buyer may designate an affiliated designee or assignee in place and stead of Buyer, and if so, such entity shall become the "Buyer" hereunder for all purposes. Except as otherwise provided in this Agreement, no Party may assign this Agreement or any rights or obligations hereunder without the prior written consent of the other Party, and any such attempted assignment without such prior written consent shall be void and of no force and effect. This Agreement shall inure to the benefit of and shall be binding upon the successors and permitted assigns of the Parties.
- 8.2 <u>Governing. Law; Jurisdiction</u>. This Agreement shall be construed, performed and enforced in accordance with, and governed by, the laws of the State of Delaware (without giving effect to the principles of conflicts of laws thereof), except to the extent that the laws of such State are superseded by the Bankruptcy Code. For so long as Seller is subject to the jurisdiction of the Court, the Parties irrevocably elect as the sole judicial forum for the adjudication of any matters arising under or in connection with the Agreement, and consent to the exclusive jurisdiction of, the Court. After Seller is no longer subject to the jurisdiction of the Court, the parties hereto irrevocably elect as the sole judicial

forum for the adjudication of any matters arising under or in connection with this Agreement, and consent to the jurisdiction of, any state or federal court located in New Castle County, Delaware.

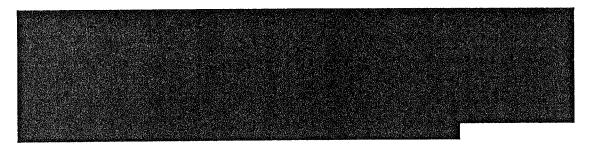
8.3 <u>Expenses.</u> Except as otherwise provided herein, each of the Parties shall pay its own expenses in connection with this Agreement and the transactions contemplated hereby, including any legal and accounting fees, whether or not the transactions contemplated hereby are consummated. Buyer shall pay any fees, costs, and expenses associated with recording an assignment of any of the Acquired Assets.



REDACTED



49066/0039-15429601v5 January 31, 2018



- 8.11 <u>Counterparts.</u> This Agreement may be executed in counterparts, each of which shall be deemed an original, but all of which shall constitute one and the same instrument. Delivery of an executed counterpart to this Agreement by facsimile or .pdf shall have the same force and effect as delivery of an original executed counterpart of this Agreement.
- 8.12 <u>Further Assurances.</u> From and after the Closing, each Party shall take such actions and execute such other documents and instruments of conveyance and transfer as may be reasonably requested by the other party from time to time to fully effectuate the transfer of the Acquired Assets to Buyer in accordance with the terms of this Agreement.
- 8.13 <u>Definitions</u>. As used in this Agreement, the following terms have the following meanings:
 - (a) "Governmental Body" means any (i) nation, state, county, city, town, village, district, or other jurisdiction of any nature; (ii) federal, state, local, municipal, foreign, or other government; (iii) governmental or quasi-governmental authority of any nature (including any governmental agency, branch, department, official, or entity and any court or other tribunal); (iv) multi-national organization or body; or (v) body exercising, or entitled to exercise, any administrative, executive, judicial, legislative, police, regulatory, or taxing authority or power of any nature.
 - (b) "IRC" means the Internal Revenue Code of 1986, as amended, or any successor law, and regulations issued by the IRS in accordance with the Internal Revenue Code or any successor law.
 - (c) "Lien" means any mortgage, lien, pledge, claim, charge, security interest or encumbrance or any kind, including the interest of a vendor or lessor under any conditional sale agreement, capital lease obligation or other title retention agreement, or any agreement to create or grant any of the foregoing or prohibiting Seller from granting Liens on their respective assets.
 - (d) "Person" means any individual, corporation, partnership, limited liability company, trust, joint venture, unincorporated association or other enterprise or any Governmental Body.
 - (e) "<u>Tax Return</u>" means any report, return, information return, filing or other information, including any schedules, exhibits or attachments thereto, and any amendments to any of the foregoing required to be filed or maintained in connection with

the calculation, determination, assessment or collection of any Taxes (including estimated Taxes).

(f) "Taxes" shall mean any federal, state, local or foreign taxes, assessments, interest, penalties, deficiencies, fees and other governmental charges or impositions (including all income tax, unemployment compensation, social security, payroll, sales and use, excise, privilege, property, ad valorem, franchise, license, school and any other tax or similar governmental charge or imposition under any requirement of law.

[SIGNATURE PAGE FOLLOWS]

IN WITNESS WHEREOF, the Parties have caused this Agreement to be executed by their respective duly authorized officers as of the Effective Date.

BUYER:

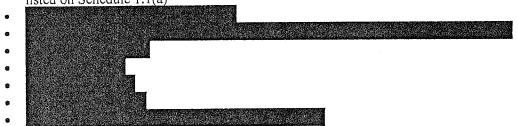
Roivant Sciences GmbH

| Ву: | S Bad | |
|-------------|----------------------------|-------------------------------|
| Name: | Sascha Bucher | |
| Title: | Head of Global Transaction | |
| | | |
| SELLER: | | |
| PhaseRx, In | IC, | |
| By: | W. | |
| Name: | ROBERT OVERELL | anggapa, daga direpakkan meda |
| Title: | PRESIDENT L CEO | |

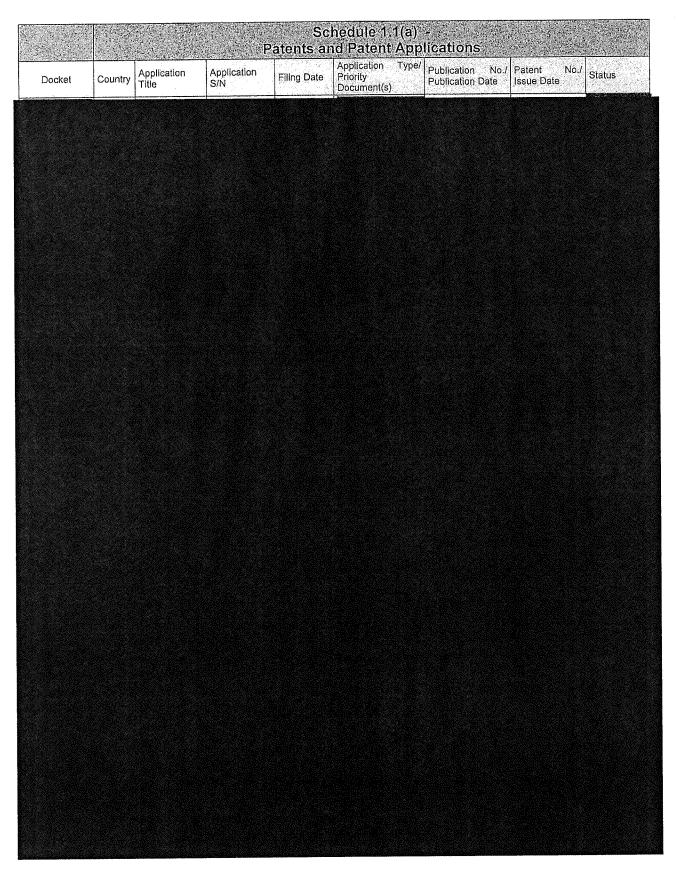
SIGNATURE PAGE TO ASSET PURCHASE AGREEMENT

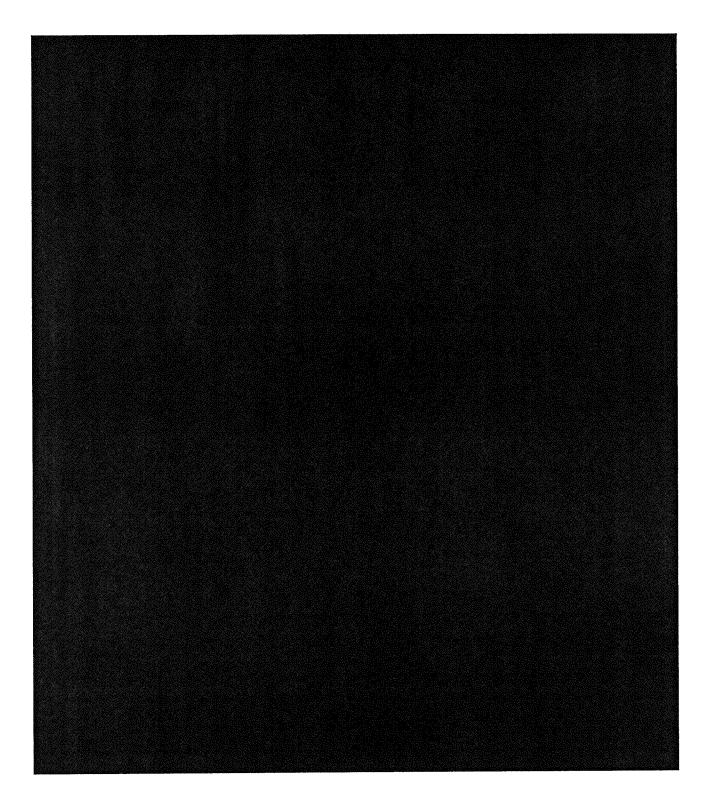
Schedule 1.1

• All patent rights owned or controlled by Seller, including without limitation, those listed on Schedule 1.1(a)



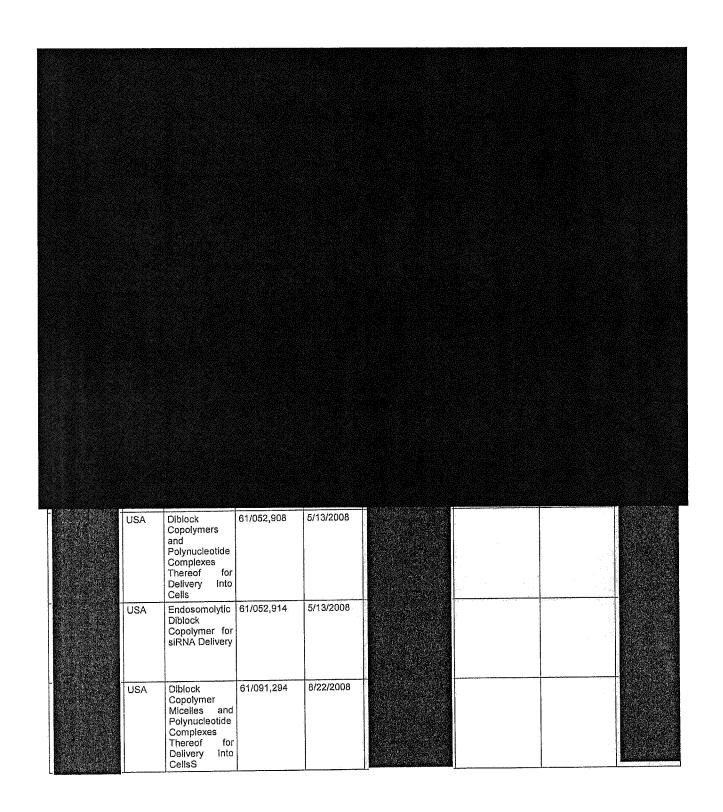
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SCHEDULE 1.1(a) TO ASSET PURCHASE AGREEMENT

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| г | | USA | Micellic | 61/112,048 | 11/6/2008 | 1.0 | | | |
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| | | USA | Assemblies | 011(12,040 | 117072000 | | | | |
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| | | USA | Micellic Assemblies | 61/140,774 | 12/24/2008 | | <u>.</u> | | |
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| | | USA | Micellic Assemblies | 61/171,369 | 4/21/2009 | | | | |
| (Allegery) | | | Assembles | | 1 | | | 2 | |
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| 10000 | | | | | | | | 1 | |
| - | | USA | Polymeric Carrier | 61/112,054 | 11/6/2008 | | | | |
| | | | Carrier | | | | | | |
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| - Constitution of the cons | | USA | Polymeric | 61/140,779 | 12/24/2008 | | | 7 | |
| Name of the last | 7.00 | | Carrier | | | | | | |
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| 1 | | USA | Polymeric | 61/171,358 | 4/21/2009 | | | | |
| 200 | | USA | Carrier | 0 17 17 17000 | ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,, | | | | |
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| | | USA | Targeted Polymer | 61/120,769 | 12/8/2008 | | | | |
| | | | Bioconjugates | | | | | | |
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| ľ | | USA | Targeted | 61/171,365 | 4/21/2009 | | | | |
| | | | Polymer Bioconjugates | | | | | | |
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| + | | USA | Diblock | 61/171,377 | 4/21/2009 | | | | |
| | | | Copolymer Micelles and | | | | | | |
| | | | Polynucleotide Complexes | | | | | | |
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| | | | Delivery Into Cells | | | | | | |
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| USA | Bispecific Intracellular Delivery Vehicles | 61/171,381 | 4/21/2009 | | | |
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| PCT | | PCT/US2009/ 043847 | 5/13/2009 | WÖ/2009/140427 Nov. 19, 2009 | | |
| USA | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 12/992,517 | 11/12/2010 | US 2011/0143434 June 16, 2011 | October 25, 2016 | |
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| EP | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | EP 2281011 A4February 9, 2011 | | |
| EP | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into | | 2/21/2013 | EP2620161 July 31, 2013 | | |

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| | | Polynucleotide Complexes Thereof for Delivery Into Cells | | | | | |
| | AU | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 2013204733 | 4/12/2013 | | Patent No. 2013204733 9/29/2016 | |
| | BR | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | P10912159-5 | 5/13/2009 | | | |
| | CA | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 2,724,105 | 5/13/2009 | | CA2724105 9/5/2017 | 914 |
| | CA | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | | | Te. |
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| IN | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 2010 | 5/13/2009 | | | |
| JP | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 2011-509670 | 5/13/2009 | | 5911723 04/08/2016 5/13/2029 | |
| JP | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 2015-200236 | 5/13/2009 | 2016-053169 April 14, 2016 | 6239565 11/10/2017 5/13/2029 | |
| KR | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 10-2010- 7027808 | 5/13/2009 | | 10-1661636 09/26/2016 05/13/2029 | |
| МХ | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | | 316902 01/07/2014 | |
| SG | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | | 166444 07/15/2013 | |
| ZA | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | | 2010/08729 05/28/2014 | |
| FR | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | | EP 2281011 02/27/2013 | 74.E |

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| | IT | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | 9747510.7 | 5/13/2009 | | EP 228101102/27/ 2013 | |
| | ES | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into | | 5/13/2009 | | EP 2281011 02/27/2013 | |
| | СН | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into Cells | | 5/13/2009 | | EP 2281011 02/27/2013 | |
| | GB | Diblock Copolymers and Polynucleotide Complexes Thereof for Delivery Into | | 5/13/2009 | | EP 2281011 02/27/2013 | |
| | PCT | Targeted Polymer Bioconjugates | PCT/US09/43 839 | 5/13/2009 | WO/2009/140423 Nov. 19, 2009 | | |
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| РСТ | Micellic Assemblies | PCT/US2009/ 043849 | 5/13/2009 | WO/2009/140429 Nov. 19, 2009 | | |
| USA | Micellic Assemblies | 12/992,525 | 11/12/2010 | US 2011/0123636 May 26, 2011 | May 17, 2016 | |
| USA | Micellic Assemblies | 15/059,026 | 3/2/2016 | 2016 | 9,662,403 May 30, 2017 | |
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| EP | Micellic Assemblies | 9747512.3 | 5/13/2009 | EP 2285853 A4 February 23, 2011 | February 27, 2013 | |
| FR | Micellic Assemblies | 9747512.3 | 5/13/2009 | | EP 2285853 February 27, 2013 | |
| DE | Micellic Assemblies | 9747512.3 | 5/13/2009 | | EP 2285853 February 27, 2013 | |

| | IE | Micellic | 9747512.3 | 5/13/2009 | | EP 2285853 | |
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| | IC. | Assemblies | 3147312.0 | 0/10/2000 | | February 27, 2013 | |
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| | IT | Micellic Assemblies | 9747512.3 | 5/13/2009 | | EP 2285853 February 27, | |
| | | Assembles | | | | 2013 | |
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| | re- | Micellic | 9747512.3 | 5/13/2009 | | EP 2285853 | |
| | ES | Assemblies | 9747312,3 | 3/13/2009 | | February 27, 2013 | |
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| | | Assemblies | | | | 2013 | |
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| | GB | Micellic Assemblies | 914/512.5 | 3/13/2009 | | February 27, 2013 | |
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| | AU | Micellic Assemblies | 2009246329 | 5/13/2009 | | 2009246329 2/20/2014 | |
| | | Assemblies | | | | 5/13/2029 | |
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| | 0.4 | Micellic | 2,724,014 | 5/13/2009 | | CA2724014 | |
| | CA | Assemblies | 2,724,014 | 3/13/2000 | | 9/13/2016 | |
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| | JP | Micellic Assemblies | 2011-509671 | 5/13/2009 | | 57555636/5/20 155/13/2029 | |
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| | ID | Micellic | 2015-107802 | 5/13/2009 | | | |
| | JP | Assemblies | 2010-101002 | 5/10/2000 | | | |
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| KR | Micellic Assemblies | 10-2010- 7027809 | 5/13/2009 | | 10-1764427 7/27/2017 5/13/2029 | |
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| MX | Micellic Assemblies | 2010/012239 | 5/13/2009 | | 315375 11/15/2013 5/13/2029 | |
| РСТ | Polymeric Carrier | PCT/US2009/ 043837 | 5/13/2009 | WO/2009/140421 Nov. 19, 2009 | | |
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| PCT | Heterogeneou s Polymeric Micelles for Intracellular Delivery | PCT/US2009/ 043859 | 5/13/2009 | WO/2010/021770 Feb. 25, 2010 | | 3 |
| USA | Heterogeneou s Polymeric Micelles for Intracellular Delivery | 13/059,946 | 5/13/2009 | US 2012/0021514 January 26, 2012 | 9,211,250 December 15 2015 | 5, |
| PCT | Bispecific Intracellular Delivery Vehicles | PCT/US2009/ 043852 | 5/13/2009 | WO/2010/053596 May 14, 2010 | | |
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| FR | Multiblock Copolymers | 9825524.3 | 11/6/2009 | | | EP 2364330 B1 March 25, 2015 |
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| ES | Multiblock Copolymers | 9825524.3 | 11/6/2009 | | | EP 2364330 B1 March 25, 2015 |
| CH | Multiblock Copolymers | 9825524.3 | 11/6/2009 | No. | | EP 2364330 B1 March 25, 2015 |
| GB | Multiblock Copolymers | 9825524.3 | 11/6/2009 | | | EP 2364330 B1 March 25, 2015 |
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| 100 | BR | Multiblock Copolymers | PI09213570 | 11/6/2009 | | | (P ¹) |
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| | CA | Multiblock Copolymers | 2,742,880 | 11/6/2009 | | | |
| | CN | Multiblock Copolymers | 20098014815 3.8 | 11/6/2009 | | ZL2009801481 53.8 3/12/2014 11/6/2029 | |
| | IL | Multiblock Copolymers | 212459 | 11/6/2009 | | | |
| | IN | Multiblock Copolymers | 3370/DELNP/ 2011 | 11/6/2009 | . : . : | | |
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| | KR | Multiblock Copolymers | 10-2011- 7012773 | 11/6/2009 | | | |
| | MX | Multiblock Copolymers | 2010/004242 | 11/6/2009 | | 330456 5/29/2015 11/6/2029 | |
| | SG | Multiblock Copolymers | 201103187-9 | 11/6/2009 | | 171100 1/15/2014 | |

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| USA | Omega- Functionalized Polymers, Junction Functionalized Block Copolymers, Polymer Bioconjugates and Radical Chain Extension Polymerization | 61/120,756 | 12/8/2008 | | | |
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| | CA | Omega- Functionalized Polymers, Junction Functionalized Block Copolymers, Polymer Bioconjugates and Radical Chain Extension Polymerization | 2,745,926 | 12/8/2009 | | · | |
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| | USA | Folate and Folate Analog Targeting Monomers and Polymers Having Folate of Folate Analog Targeting Blocks | | 11/18/2009 | | | |

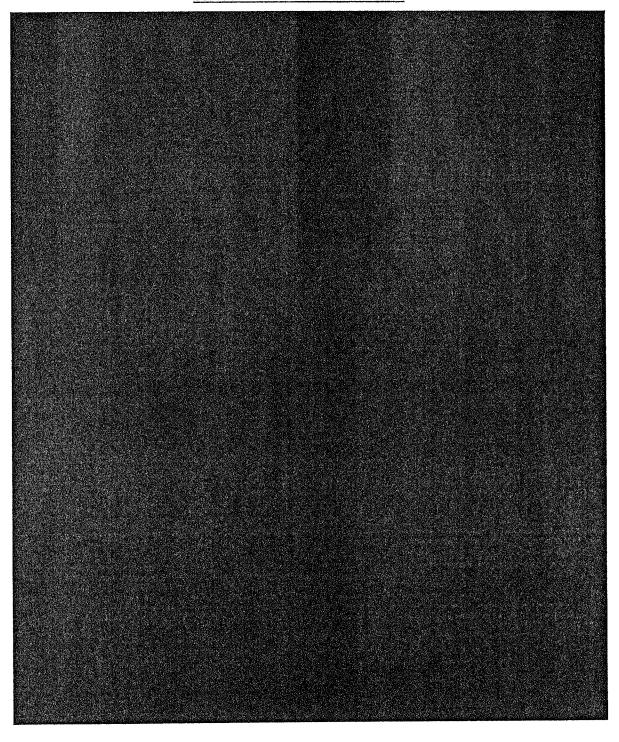
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| PCT | RNA Targeted to c-Met | PCT/US13/26 623 | 2/19/2013 | | WO 2014/109780 July 17, 2014 | | |
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| USA | Block Copolymers | 61/868,122 | 8/21/2013 | | | | |
| PCT | Block Copolymers | PCT/US14/48 839 | 7/30/2014 | | WO 2015/017519 February 5, 2015 | | |
| USA | Block Copolymers | 14/908,351 | 7/30/2014 | | US 2016/0206750 July 21, 2016 | 9,867,885 January 16, 2018 | |
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| EP | Block Copolymers | 14753175 | 7/30/2014 | and a selection | | | |
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| CN | Cells Methods, Compositions, and Systems for Delivering Therapeutic and Diagnostic Agents into Cells | 2,0168E+11 | 1/21/2016 | | | | |
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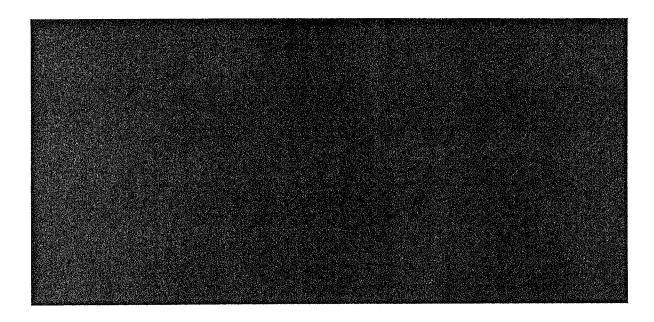
Schedule 1.1(a) - Patents

Schedule 1.3 - Assumed Contracts



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SCHEDULE 1.3 TO ASSET PURCHASE AGREEMENT

49066/0039-15429601v5 January 31, 2018

> PATENT REEL: 047649 FRAME: 0874

RECORDED: 10/12/2018