

Fill in this information to identify the case:

Debtor ArcherDX, LLC

United States Bankruptcy Court for the: _____ District of New Jersey
(State)

Case number 24-11364

**Official Form 410
Proof of Claim**

04/22

Read the instructions before filling out this form. This form is for making a claim for payment in a bankruptcy case. Do not use this form to make a request for payment of an administrative expense. Make such a request according to 11 U.S.C. § 503.

Filers must leave out or redact information that is entitled to privacy on this form or on any attached documents. Attach redacted copies or any documents that support the claim, such as promissory notes, purchase orders, invoices, itemized statements of running accounts, contracts, judgments, mortgages, and security agreements. **Do not send original documents;** they may be destroyed after scanning. If the documents are not available, explain in an attachment.

A person who files a fraudulent claim could be fined up to \$500,000, imprisoned for up to 5 years, or both. 18 U.S.C. §§ 152, 157, and 3571.

Fill in all the information about the claim as of the date the case was filed. That date is on the notice of bankruptcy (Form 309) that you received.

Part 1: Identify the Claim

1. Who is the current creditor?	<u>The Royal Marsden NHS Foundation Trust</u> <small>Name of the current creditor (the person or entity to be paid for this claim)</small>	
	<small>Other names the creditor used with the debtor</small> _____	
2. Has this claim been acquired from someone else?	<input checked="" type="checkbox"/> No <input type="checkbox"/> Yes. From whom? _____	
3. Where should notices and payments to the creditor be sent?	Where should notices to the creditor be sent?	Where should payments to the creditor be sent? (if different)
<small>Federal Rule of Bankruptcy Procedure (FRBP) 2002(g)</small>	<u>The Royal Marsden NHS Foundation Trust</u> <u>Research and Development</u> <u>Downs Road</u> <u>Surrey</u> <u>Sutton, Surrey SM2 5PT, United Kingdom</u>	<u>THE ROYAL MARSDEN NHS FTRUST</u> <u>SHARED BUSINESS SERVICES</u> <u>RPY RECEIVABLES F259</u> <u>PO BOX 312</u> <u>LEEDS, LEEDS LS11 1HP, United Kingdom</u>
	<small>Contact phone</small> _____ <small>Contact email</small> <u>See summary page</u>	<small>Contact phone</small> _____ <small>Contact email</small> <u>sbs-b.collections@nhs.net</u>
	(see summary page for notice party information) <small>Uniform claim identifier for electronic payments in chapter 13 (if you use one):</small> _____	
4. Does this claim amend one already filed?	<input checked="" type="checkbox"/> No <input type="checkbox"/> Yes. Claim number on court claims registry (if known) _____ Filed on _____ <small>MM / DD / YYYY</small>	
5. Do you know if anyone else has filed a proof of claim for this claim?	<input checked="" type="checkbox"/> No <input type="checkbox"/> Yes. Who made the earlier filing? _____	



Part 2: Give Information About the Claim as of the Date the Case Was Filed

6. Do you have any number you use to identify the debtor? No
 Yes. Last 4 digits of the debtor's account or any number you use to identify the debtor: ____ _

7. How much is the claim? \$ 1,557,415.11. Does this amount include interest or other charges?
 No
 Yes. Attach statement itemizing interest, fees, expenses, or other charges required by Bankruptcy Rule 3001(c)(2)(A).

8. What is the basis of the claim? Examples: Goods sold, money loaned, lease, services performed, personal injury or wrongful death, or credit card.
Attach redacted copies of any documents supporting the claim required by Bankruptcy Rule 3001(c).
Limit disclosing information that is entitled to privacy, such as health care information.
Service performed as per collaboration agreement

9. Is all or part of the claim secured? No
 Yes. The claim is secured by a lien on property.
Nature or property:
 Real estate: If the claim is secured by the debtor's principle residence, file a *Mortgage Proof of Claim Attachment* (Official Form 410-A) with this *Proof of Claim*.
 Motor vehicle
 Other. Describe: _____
Basis for perfection: _____
Attach redacted copies of documents, if any, that show evidence of perfection of a security interest (for example, a mortgage, lien, certificate of title, financing statement, or other document that shows the lien has been filed or recorded.)
Value of property: \$ _____
Amount of the claim that is secured: \$ _____
Amount of the claim that is unsecured: \$ _____ (The sum of the secured and unsecured amount should match the amount in line 7.)
Amount necessary to cure any default as of the date of the petition: \$ _____
Annual Interest Rate (when case was filed) _____ %
 Fixed
 Variable

10. Is this claim based on a lease? No
 Yes. Amount necessary to cure any default as of the date of the petition. \$ _____

11. Is this claim subject to a right of setoff? No
 Yes. Identify the property: _____



12. Is all or part of the claim entitled to priority under 11 U.S.C. § 507(a)?

A claim may be partly priority and partly nonpriority. For example, in some categories, the law limits the amount entitled to priority.

No

Yes. Check all that apply:

	Amount entitled to priority
<input type="checkbox"/> Domestic support obligations (including alimony and child support) under 11 U.S.C. § 507(a)(1)(A) or (a)(1)(B).	\$ _____
<input type="checkbox"/> Up to \$3,350* of deposits toward purchase, lease, or rental of property or services for personal, family, or household use. 11 U.S.C. § 507(a)(7).	\$ _____
<input type="checkbox"/> Wages, salaries, or commissions (up to \$15,150*) earned within 180 days before the bankruptcy petition is filed or the debtor's business ends, whichever is earlier. 11 U.S.C. § 507(a)(4).	\$ _____
<input type="checkbox"/> Taxes or penalties owed to governmental units. 11 U.S.C. § 507(a)(8).	\$ _____
<input type="checkbox"/> Contributions to an employee benefit plan. 11 U.S.C. § 507(a)(5).	\$ _____
<input type="checkbox"/> Other. Specify subsection of 11 U.S.C. § 507(a)(____) that applies.	\$ _____

* Amounts are subject to adjustment on 4/01/25 and every 3 years after that for cases begun on or after the date of adjustment.

13. Is all or part of the claim entitled to administrative priority pursuant to 11 U.S.C. 503(b)(9)?

No

Yes. Indicate the amount of your claim arising from the value of any goods received by the debtor within 20 days before the date of commencement of the above case, in which the goods have been sold to the Debtor in the ordinary course of such Debtor's business. Attach documentation supporting such claim.

\$ _____

Part 3: Sign Below

The person completing this proof of claim must sign and date it. FRBP 9011(b).

If you file this claim electronically, FRBP 5005(a)(2) authorizes courts to establish local rules specifying what a signature is.

A person who files a fraudulent claim could be fined up to \$500,000, imprisoned for up to 5 years, or both. 18 U.S.C. §§ 152, 157, and 3571.

Check the appropriate box:

I am the creditor.

I am the creditor's attorney or authorized agent.

I am the trustee, or the debtor, or their authorized agent. Bankruptcy Rule 3004.

I am a guarantor, surety, endorser, or other codebtor. Bankruptcy Rule 3005.

I understand that an authorized signature on this *Proof of Claim* serves as an acknowledgement that when calculating the amount of the claim, the creditor gave the debtor credit for any payments received toward the debt.

I have examined the information in this *Proof of Claim* and have reasonable belief that the information is true and correct.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on date 04/15/2024
MM / DD / YYYY

/s/Karry Tymieniecka
Signature

Print the name of the person who is completing and signing this claim:

Name Karry Tymieniecka
First name Middle name Last name

Title Interim Chief Financial Officer

Company The Royal Marsden NHS Foundation Trust
Identify the corporate servicer as the company if the authorized agent is a servicer.

Address _____

Contact phone _____ Email _____



KCC ePOC Electronic Claim Filing Summary

For phone assistance: Domestic (866) 967-0263 | International (310) 751-2663

Debtor: 24-11364 - ArcherDX, LLC				
District: District of New Jersey, Trenton Division				
Creditor: The Royal Marsden NHS Foundation Trust Research and Development Downs Road Surrey Sutton, Surrey, SM2 5PT United Kingdom Phone: Phone 2: Fax: Email: research.development@rmh.nhs.uk	Has Supporting Documentation: Yes, supporting documentation successfully uploaded Related Document Statement:			
	Has Related Claim: No Related Claim Filed By:			
	Filing Party: Creditor			
Disbursement/Notice Parties: <table style="width: 100%; border: none;"> <tr> <td style="width: 50%; border: none; vertical-align: top;"> THE ROYAL MARSDEN NHS FTRUST SHARED BUSINESS SERVICES RPY RECEIVABLES F259 PO BOX 312 LEEDS , LEEDS, LS11 1HP United Kingdom Phone: Phone 2: Fax: E-mail: sbs-b.collections@nhs.net DISBURSEMENT ADDRESS </td> <td style="width: 50%; border: none; vertical-align: top;"> Jill Butler The Royal Marsden NHS Foundation Trust Downs Road Surrey Sutton, Sutton, SM2 5PT United Kingdom Phone: Phone 2: Fax: E-mail: jill.butler@rmh.nhs.uk </td> </tr> </table>			THE ROYAL MARSDEN NHS FTRUST SHARED BUSINESS SERVICES RPY RECEIVABLES F259 PO BOX 312 LEEDS , LEEDS, LS11 1HP United Kingdom Phone: Phone 2: Fax: E-mail: sbs-b.collections@nhs.net DISBURSEMENT ADDRESS	Jill Butler The Royal Marsden NHS Foundation Trust Downs Road Surrey Sutton, Sutton, SM2 5PT United Kingdom Phone: Phone 2: Fax: E-mail: jill.butler@rmh.nhs.uk
THE ROYAL MARSDEN NHS FTRUST SHARED BUSINESS SERVICES RPY RECEIVABLES F259 PO BOX 312 LEEDS , LEEDS, LS11 1HP United Kingdom Phone: Phone 2: Fax: E-mail: sbs-b.collections@nhs.net DISBURSEMENT ADDRESS	Jill Butler The Royal Marsden NHS Foundation Trust Downs Road Surrey Sutton, Sutton, SM2 5PT United Kingdom Phone: Phone 2: Fax: E-mail: jill.butler@rmh.nhs.uk			
Other Names Used with Debtor:	Amends Claim: No Acquired Claim: No			
Basis of Claim: Service performed as per collaboration agreement	Last 4 Digits: No	Uniform Claim Identifier:		
Total Amount of Claim: 1,557,415.11	Includes Interest or Charges: No			
Has Priority Claim: No	Priority Under:			
Has Secured Claim: No	Nature of Secured Amount:			
Amount of 503(b)(9): No	Value of Property:			
Based on Lease: No	Annual Interest Rate:			
Subject to Right of Setoff: No	Arrearage Amount:			
	Basis for Perfection:			
	Amount Unsecured:			
Submitted By: Karry Tymieniecka on 15-Apr-2024 11:01:05 a.m. Eastern Time Title: Interim Chief Financial Officer Company: The Royal Marsden NHS Foundation Trust				

COLLABORATION AGREEMENT

This Collaboration Agreement (“Agreement”) is by and between **The Royal Marsden NHS Foundation Trust** having a place of business at Fulham Road, London, SW3, 6JJ, UK (“**RM**”) and **ArcherDX LLC, a subsidiary of Invitae Corporation**, a Delaware limited liability company, having a place of business at 1400 16th Street, San Francisco, CA 94103, USA (“**ARCHERDX**”) each a “Party,” and collectively “Parties”, effective as of the Effective Date (as defined below).

WHEREAS RM is a specialist cancer treatment and research hospital that is part of the UK’s National Health System (NHS) and is an NHS Foundation Trust.

WHEREAS ARCHERDX is engaged in the development, manufacture, and sale of molecular biology kits, products and services for genomic technologies, including the use of circulating tumor DNA (“ctDNA”) in the detection and monitoring of cancers;

WHEREAS, RM and ARCHERDX desire to undertake a collaborative research effort concerning TRAK-ER (randomised phase II trial of early detection of molecular relapse with circulating tumor DNA tracking and treatment with palbociclib plus fulvestrant versus standard endocrine therapy in patients with ER+/HER2- breast cancer) (“**the Study**”);, which will utilize ARCHERDX’s Personalized Cancer Monitoring (PCMTM), a tumor-informed liquid biopsy platform, and associated software, that utilizes patient specific primer panels derived from tumor/normal sequencing for molecular residual disease (MRD) monitoring in solid tumors. (the “Assay”).

NOW THEREFORE, in consideration of the foregoing and the terms and conditions set forth below, the Parties hereby agree as follows:

Article 1. DEFINITIONS

- For purposes of this Agreement, the terms defined in this Article will have the meaning specified and will be applicable both to the singular and plural forms:
- 1.1. “**Affiliate**” means any corporation or other entity that controls, is controlled by, or is under common control with ARCHERDX or RM. For the purpose of this Agreement the term “control” (including the terms “controlled by” and “under common control with”) shall mean the possession of the power to direct or cause the direction of the management or policies of the company, corporation, partnership or entity involved, whether through the ownership of at least 50% (in words: fifty percent) of such entity, by contract or otherwise.
 - 1.2. “**Background Intellectual Property**” means all Intellectual Property and Confidential Information owned by one Party (or licensed by the Party from others), whether in existence prior to the Effective Date of this Agreement or subsequently developed by the Party, independent of its performance under this Agreement. Without limiting the generality of the foregoing, Background Intellectual Property of a Party means all Intellectual Property and Confidential Information owned or controlled by a Party that is required to carry out the Study within the Statement of Work, or to practice and commercialize the Foreground Intellectual Property. Both RM and ARCHERDX may have Background Intellectual Property, which shall be characterized as “**ARCHERDX Background Intellectual Property**” or “**RM Background Intellectual Property**.”

- 1.2.1. ARCHERDX Background Intellectual Property** includes but is not necessarily limited to all materials, documents, data, designs, formulas, Know-How, protocols, operating procedures, techniques, information and intellectual property rights contained therein concerning the Assay.
- 1.2.2. RM Background Intellectual Property** includes but is not necessarily limited to protocols under-which the RM Materials have been collected and patient clinical information related-to the RM Materials.
- 1.3. “Confidential Information”** means all proprietary unpublished or nonpublic information or materials including, but not limited to, written, oral or virtually presented information and such items as electronic media products, trade secrets, financial information, equipment, databases and the like provided by one Party to another under this Agreement, or which is observed by a Party while on another Party’s premises. Confidential Information does not include any information or material that Receiving Party evidences is: (a) already known to the Receiving Party at the time of disclosure (other than from the Disclosing Party); (b) publicly known other than through acts or omissions of the Receiving Party; (c) disclosed to the Receiving Party by a third party who was not and is not under any obligation of confidentiality; or (d) independently developed by employees of the Receiving Party, or on behalf of the Receiving Party, without knowledge of or access to the Confidential Information.
- 1.4. “Disclosing Party”** means a Party to this Agreement who supplies Confidential Information (as defined herein) to the other party to this Agreement.
- 1.5. “Effective Date”** means the date of last signature on this Agreement
- 1.6. “Foreground Intellectual Property”** means all Intellectual Property, including any Study Data, conceived, discovered, authored, invented, developed or reduced to practice in the performance of the Agreement, including applicable Statement(s) of Work, except that it does not mean, and does not refer to (i) Intellectual Property proprietary to ARCHERDX and existing prior to the Effective Date, (ii) inventions, discoveries or improvements made solely by ARCHERDX in the performance of activities conducted pursuant to this Agreement that do not use RM Confidential Information, and (iii) Intellectual Property-developed at any time by any Party independent of any activities conducted pursuant to this Agreement. (While not Foreground Intellectual Property, the Intellectual Property described in section 1.6(i),1.6(ii) and 1.6(iii) may be Background Intellectual Property).
- 1.7. “Intellectual Property”** means any inventions, ideas, discoveries, improvements, innovations, works of authorship, trademarks, and Know-How, whether or not patentable; copyrightable works, such as reports, databases, and documentation; trade secrets, computer software, including source code and object code; compositions of matter; procedures; and experimental results.
- 1.8. “Know-How”** means any information, process, method, technique, material (including any chemical or biological material), technology or sequence, whether or not patentable, and any physical embodiments of any of the foregoing.
- 1.9. “Other Study Agreements”** means [(1) the Pfizer Agreement, (2) RM subcontracting arrangement under the Pfizer Agreement in which RM contracts with Unicancer for

certain contract research organization services, (3) the agreement between RM and [Astra Zeneca] which pertains to the Study.]

- 1.10. “**Pfizer**” means Pfizer Inc., a Delaware corporation with its principal place of business at 235 East 42nd Street, New York, New York, 10017.
- 1.11. “**Pfizer Agreement**” means the collaboration agreement between RM and Pfizer in relation to the Study entered into on or around the same time as this Agreement.
- 1.12. “**Receiving Party**” means a Party to this Agreement which receives Confidential Information (as defined herein) from a Disclosing Party.
- 1.13. “**Statement of Work**” (or “**SOW**”) means a plan or schedule detailing, as applicable, the specific obligations, duties, rights, activities and timelines applicable to each Party under this Agreement (**Exhibit C**).
- 1.14. “**Study Data**” all results and data generated by the Parties, alone or jointly, in the course of the Study, including but not limited to sequencing data, correlation of sequencing data to patient outcomes related to any Human Materials (as defined herein) used in the Study, in whole or by subtypes of breast cancer, correlation of sequencing data to any pre-existing droplet digital PCR ctDNA results or imaging data related to the Human Materials used in the Study.
- 1.15. “**The Study**” means program of research concerning a retrospective assessment of the association between ctDNA detection and relapse-free survival using the Archer MRD Assay in patients with early stage breast- TRAK-ER (randomised phase II trial of early detection of molecular relapse with circulating tumor DNA tracking and treatment with palbociclib plus fulvestrant versus standard endocrine therapy in patients with ER+/HER2- breast cancer), a the Study Protocol; (hereinafter, the “Study”).

ARTICLE 2. COLLABORATION AND SAMPLES

- 2.1. RM and ARCHERDX shall apply reasonable efforts to carry out the Study as described within the Statement of Work (hereinafter, the “**SOW**”) attached as Exhibit C. Notwithstanding the aforementioned, at the Effective Date of this Agreement the Parties acknowledge that anticipated timelines for the Study may be affected by the ongoing COVID-19 pandemic. RM and ARCHERDX shall, from time to time, discuss and agree upon details of the Study, and their respective performance under the SOW, provided that such agreements shall be subject to any relevant related changes to the Other Study Agreements as required. The Statement of Work may be modified, from time-to-time as necessary if done in writing and signed by an authorized representative of each Party. In the event of a conflict between the terms of the Statement of Work and the terms in the body of this Agreement, the terms of this Agreement will control, except to the limited extent that the applicable Statement of Work *expressly and specifically* states intent to supersede this Agreement on a specific matter.
- 2.2. To the extent that RM on the one hand and ARCHERDX on the other hand supplies the other with any materials or samples derived from human subjects (“Human Materials”) for use in the Study, it shall ensure that proper approval or waiver has been obtained from an appropriate Institutional Review Board to use such Human Materials for the purpose hereunder, and, that such Human Materials were obtained under appropriate

consent in accordance with all applicable laws and regulations which address protection of human subjects in research. It is expressly agreed and understood that as between RM and Archer, RM shall be responsible for ensuring that any individuals whose Human Materials are utilized in connection with the activities contemplated by this Agreement, have provided informed consent as appropriate and necessary, and that such consent would permit Archer's use of Study Data in its research, product development, regulatory submissions, prospective clinical trials, and marketing efforts.

- 2.3.** RM shall supply any Human Materials as may be described on Exhibit C as amended by the Parties upon mutual written agreement from time to time, to ARCHERDX for use in the Study (the "RM Materials"). As between the Parties, the RM Materials shall at all times remain the property of RM. ARCHERDX will use the RM Materials solely and exclusively for conducting the Study in accordance with Exhibit C and in accordance with all applicable laws, regulations and best practice recommendations. Any RM Materials delivered pursuant to this Agreement are understood to be experimental in nature and may have hazardous properties. ARCHERDX shall not use the RM Materials in human subjects. ARCHERDX will retain control over the RM Materials at all times and will not without RM's prior written approval transfer them to any person other than employees of ARCHERDX or its Affiliates. RM reserves the right to distribute the RM Materials to others and to use them for its own purposes. Notwithstanding anything to the contrary herein, it is agreed and understood that ARCHERDX may transfer the RM Materials to its Affiliates' validated laboratories solely for purposes of assisting it in the Study, including: Genosity, LLC, a subsidiary of Invitae Corporation, of Iselin, New Jersey, USA ("Genosity"). ARCHERDX shall remain fully responsible and liable for the performance by Genosity of its obligations under this Agreement and shall cause Genosity to comply with the provisions of this Agreement as if party to this Agreement. For clarity, any act or omission of Genosity which, if it were the act or omission of ARCHERDX would be a breach of any of the provisions of this Agreement, will be deemed to be a breach of this Agreement by ARCHERDX who will be liable to RM accordingly.
- 2.4.** ARCHERDX (and if applicable, Genosity) shall ensure that any disposal of the RM Materials is in accordance with prior written instructions given by RM (if any) and all applicable laws, regulations and best practice recommendations. If not previously disposed of, ARCHERDX (or if applicable, Genosity) will dispose of the RM Materials at such time and in such manner as RM may direct. Notwithstanding, upon completion of the Study or upon earlier termination of this Agreement pursuant to Article 7 herein, ARCHERDX (or if applicable, Genosity) shall, at RM's sole option, return or destroy any remaining RM Materials. In the case of RM opting for destruction of RM Materials, ARCHERDX (or if applicable, Genosity) will provide RM with a certificate (signed by a responsible officer of ARCHERDX) confirming the disposal of RM Materials accordingly.
- 2.5.** It is further agreed that in the course of the Study, a validated laboratory at the Institut Gustave Roussy Research ("IGR") may provide assistance to the Parties. IGR shall be a subcontractor to RM, which shall be fully responsible and liable for the performance by IGR of its obligations under this Agreement and shall cause IGR to comply with the provisions of this Agreement as if party to this Agreement. For clarity, any act or omission of IGR which, if it were the act or omission of RM would be a breach of any

of the provisions of this Agreement, will be deemed to be a breach of this Agreement by RM who will be liable to ARCHERDX accordingly.

- 2.6.** It is agreed that the collaboration between the Parties shall have the purpose of testing participants in the Study for the presence of circulating tumour DNA and/or quantifying the level of circulating tumour DNA, and is inclusive of the following:
- 2.6.1.** Provision of funding from ARCHERDX to RM for this purpose. Funding may be passed through to other collaborators/subcontractors named in Statement of Work or agreed to in writing by ARCHERDX.
 - 2.6.2.** Provision of general supplies for this purpose by ARCHERDX to RM and collaborators/subcontractors named in the Statement of Work or agreed to in writing by ARCHERDX.
 - 2.6.3.** Provision of pseudonymized Human Materials, including individual tumor tissue, blood, plasma and genetic data by RM and collaborators/subcontractors named in the Statement of Work or agreed to in writing to ARCHERDX in order to allow completion by ARCHERDX of workflow tasks in creation of individual assays and ctDNA surveillance.
 - 2.6.4.** Provision of processed data and supplies from ARCHERDX to RM for individual Study participants and collaborators/subcontractors named in the Statement of Work to enable ctDNA analyses as required by statement of work.

ARTICLE 3. CONFIDENTIALITY

- 3.1.** Except as expressly permitted herein, no Party will disclose, use or otherwise make available another Party's Confidential Information during the Term and for three (3) years thereafter and will use the same degree of care it employs to protect its own confidential information.
- 3.2.** Each Party shall disclose Confidential Information of another Party to its employees only on a need to know basis. To the extent it is reasonably necessary or appropriate to fulfill its obligations or exercise its rights under this Agreement, the Receiving Party may disclose Confidential Information of the Disclosing Party to its consultants, and outside contractors on the condition that each such entity agrees to obligations of confidentiality and non-use at least as stringent as those therein.
- 3.3.** ARCHERDX may disclose Confidential Information (including but not limited to unpublished Study Data) to commercial partners and potential commercial partners, as well as to the laboratories identified in Section 2.3, so long as any such disclosure is made pursuant to confidentiality obligations at least as restrictive as this Article 3, and so long as ARCHERDX does not share "personal data" as that phrase is used in Section 12.16 herein.
- 3.4.** RM may disclose Confidential Information (including but not limited to unpublished Study Data and Foreground Intellectual Property disclosed under Section 5.4 herein) to Pfizer where required to do so under the Pfizer Agreement.

- 3.5. If a Party is required by law, regulation or court order to disclose any of the Confidential Information, it will have the right to do so, provided it: (i) promptly notifies the Disclosing Party; and (ii) reasonably assists the Disclosing Party to obtain a protective order or other remedy of Disclosing Party's election and at Disclosing Party's expense, and only disclose the minimum amount necessary to satisfy such obligation.
- 3.6. Except as otherwise required by law, the specific terms and conditions of this Agreement shall be Confidential Information of the Parties but the existence of this Agreement will not be Confidential Information.
- 3.7. All Study Data shall be Confidential Information of the Parties until published in accordance with Article 6.

Article 4. COSTS AND PAYMENTS

- 4.1. ARCHERDX shall be responsible for all of its own expenses incurred in the performance of the Study, unless stated otherwise in the SOW.
- 4.2. In consideration of RM's retrieval, preparation and supply of patient samples and/or related information, its activities described in the SOW and the rights provided to ARCHERDX under this Agreement, ARCHERDX will pay to RM the amounts described in, and in accordance with, the section of Exhibit B entitled "Financial Information".
- 4.3. In accordance with Exhibit B, RM shall submit due invoices to ARCHERDX. ARCHERDX shall pay all uncontested invoices within 45 days.
- 4.4. All amounts due to RM under this Agreement shall be payable in cleared funds in US dollars. The payment details are to be provided by RM accompanying their invoices.
- 4.5. Notwithstanding the provision of Article 4.1, the expenses related to Intellectual Property shall be paid as described in Article 5 below.

ARTICLE 5. INTELLECTUAL PROPERTY

- 5.1. All Background Intellectual Property is and shall, as between the Parties, remain the sole property of such Party. In connection with the use of the Assay by RM in connection with the Study, ARCHERDX agrees to provide RM with a royalty-free, non-exclusive, worldwide license to the ARCHERDX Background Intellectual Property for the purpose of completing the Study, and for its non-commercial educational and research purposes. RM agrees to provide ARCHERDX with a royalty-free, non-exclusive, worldwide license to the RM Background Intellectual Property to the extent needed for and solely for the purpose of the Study.
- 5.2. Notwithstanding the provisions of Section 5.6 in relation to Know-How, and unless agreed otherwise in the Statement of Work by the Parties, all Foreground Intellectual Property that is specifically related to ARCHERDX Background Intellectual Property, and/or constitute improvements, advances or modifications to ARCHERDX Background Intellectual Property, including but not limited to the Assay, shall be owned exclusively by ARCHERDX ("ARCHERDX Foreground IP"). Accordingly,

RM hereby irrevocably assigns any and all right, title and related interest it may have in and to such ARCHERDX Foreground IP to ARCHERDX, and as between the Parties, all such ARCHERDX Foreground IP shall be owned solely by ARCHERDX. For clarity, ARCHERDX Foreground IP includes any improvements, advances or modifications to ARCHERDX Background Intellectual Property, including but not limited to the Assay, that are made by ARCHERDX, alone or jointly with RM, through activities conducted pursuant to this Agreement and having direct applicability for the improvement of ARCHERDX products (including the Assay) (hereinafter, "ARCHERDX Technology"). ARCHERDX Foreground IP does not include Intellectual Property that does not specifically relate to ARCHERDX Background Intellectual Property or is not ARCHERDX Technology. RM shall own all other Foreground Intellectual Property that is not ARCHERDX Foreground IP ("RM Foreground IP"). For clarity, RM Foreground IP includes but is not limited to novel mutations in genes and/or genetic biomarkers and their association with clinical characteristics.

- 5.3.** With respect to RM Foreground IP, RM hereby grants ARCHERDX a revocable world-wide, non-exclusive, and royalty free license (a) for non-commercial research & development purposes and (b) for commercial purposes for use with products and services that incorporate ARCHERDX Background Intellectual Property and/or ARCHERDX Foreground IP, including but not limited to product research, product development, regulatory submissions, prospective clinical trials, and marketing (subject to sections 5.5 and 12.15). In any event, RM and ARCHERDX shall be free to exploit or license to a third party their right and interest in and to any Foreground Intellectual Property they each own solely under this Agreement and shall have full control over all aspects of the preparation, prosecution, and maintenance of patent applications and patents covering their respective Foreground Intellectual Property, and will have full responsibility for all associated costs with respect to such patent protection.
- 5.4.** With the exception of disclosure of any Foreground Intellectual Property by RM in breach of RM's obligations under the Pfizer Agreement, each Party shall promptly disclose to the other Parties all Foreground Intellectual Property developed by that Party during the course of the Study, in no event later than thirty (30) days following the creation or discovery of such Foreground Intellectual Property. RM on the one hand and ARCHERDX on the other hand shall keep detailed records regarding the Foreground Intellectual Property. Each Party shall have the right to audit another Party's applicable records once each calendar year during the course of this Agreement, subject to fourteen (14) days advance notice to the other Party. With respect to all Foreground Intellectual Property, the Parties agree to provide all reasonable assistance and cooperation to secure protection of the Foreground Intellectual Property, including but not limited to the execution of documents.
- 5.5.** Notwithstanding anything to the contrary in this Article 5: RM shall have the irrevocable right to utilize the Study Data for non-commercial academic research (including clinical trials), educational purposes and in the creation and submission of Publications (as defined in Section 6.1), as set forth in Article 6; ARCHERDX shall have the irrevocable right to utilize the Study Data for research, product development, regulatory submissions, prospective clinical trials, and subject to Section 12.15 and RM's first right to publish Study Data under Section 6.1, in support of its commercial marketing efforts. Any ensuing marketing materials incorporating Study Data intended

for public availability during the term of this Agreement and for one year thereafter, or longer if the Study Data remains unpublished in accordance with Section 6.1, shall first be submitted to RM for approval as set forth in section 12.15.

- 5.6. The Parties acknowledge that they do not anticipate that any Know-How forming Background Intellectual Property or Foreground Intellectual Property will need to be sub-licensed to Pfizer for the purposes of the Study, but if Pfizer does require use of such Know How for the purposes of the Study then ARCHERDX agrees to grant to RM a non-exclusive, sublicensable, transferable, perpetual, irrevocable, worldwide, royalty-free, fully paid-up licence to such Know-How so that RM can sublicense such Know How to Pfizer for the purpose of Pfizer's participating in the Study.
- 5.7. To the full extent permissible by applicable law, ARCHERDX will procure waivers of moral rights arising as a result of the Study from any party engaged by ARCHERDX for performance of the Study.
- 5.8. Each Party (the "**Notifying Party**") will immediately give notice in writing to the other Party (the "**Notified Party**") of any challenge to the Notified Party's Background Intellectual Property or Foreground Intellectual Property, or any inadvertent disclosure or unauthorized use of such of which the Notifying Party become aware. Each Party will, on request, assist the other in the prevention of any infringement, challenge or unauthorized use, but will not institute any legal proceedings.

ARTICLE 6. PUBLICATIONS

- 6.1. RM reserves the absolute first right to publish the result of work completed under this Agreement, with the assistance and collaboration of ARCHERDX. Prior review of the proposed publication by ARCHERDX will be provided, with RM submitting any proposed publication, presentation or other public disclosure including slides ("**Publication**") to ARCHERDX for review at least thirty (30) days prior to submitting or disclosing such proposed Publication to a publisher or other third party. ARCHERDX shall respond within thirty (30) days of its receipt, and shall have the right to require the removal of specifically identified Confidential Information (other than Study Data) of ARCHERDX and in the case where ARCHERDX identifies Study Data which may impair its ability to obtain patent protection or regulatory submissions which it is entitled to pursue, the proposed Publication will be delayed for an additional sixty (60) days to enable ARCHERDX to seek patent protection or make such regulatory submissions. Notwithstanding the foregoing, in the interest of free exchange of scientific information, RM may publish after the expiration of ninety (90) days following submission of the proposed publication to ARCHERDX. Publication of the results will not include Confidential Information as defined in Section 1.3 without the permission of ARCHERDX. In addition, ARCHERDX shall have the right to publish independently the results of the work completed under this Agreement that RM has not published after two years following the expiry or termination of this Agreement. In addition, the first publication of data from the work completed under this Agreement by any Party shall be considered a joint publication with the Parties as the co-authors.
- 6.2. Subject to Section 6-1 and provided all Parties are in agreement, the Parties may choose to jointly develop Publications as part of the collaboration.

- 6.3. Authorship of publications of the results of the Study will be determined in accordance with appropriate scientific and academic standards and customs. Proper acknowledgement will be made for the contributions of each Party to the collaboration. In all oral presentations or written publications referring to the RM Materials or related information, the Parties hereto shall acknowledge RM's provision of the RM Materials and related information unless otherwise requested by RM.
- 6.4. Title to any copyright or copyrightable material first produced or composed in the performance of the Study will remain with the Party that so composes or produces the work. If jointly composed, then title will be jointly held.

ARTICLE 7. TERM AND TERMINATION

- 7.1. **Term.** This Agreement will remain in effect until the earlier of (a) completion of the Study; or (b) a term of eight (8) years from the Effective Date; ((a) and (b) are collectively referred to as the "Term"), unless terminated earlier as provided in this Article 7 (including subsections). In the event that the Study is not complete at the conclusion of eight (8) years, this Agreement shall automatically renew for successive one (1) year periods, beginning each year on the anniversary of the Effective Date, unless either Party provides written notice, at least 45 days prior to such anniversary, that it will not renew.
- 7.2. **Termination of the Study.** In the event that the Study terminates before the end of the Term for any reason, or alternatively if the Pfizer Agreement terminates before the end of the Term for any reason, this Agreement shall automatically terminate.
- 7.3. **Termination of the Other Study Agreements:** If any one or more of the Other Study Agreements terminates before the end of the Term for any reason and the RM are unable to continue to meet their obligations under this Agreement, RM shall provide written notice to ARCHERDX, which may, at its option within 90 days after receipt, elect to terminate this Agreement by providing written notice to RM.
- 7.4. **Termination for Breach.** RM on the one hand or ARCHERDX on the other hand may terminate this Agreement in the event the other Party (or Parties) materially breaches this Agreement, and such breach shall have continued for thirty (30) days after written notice thereof was provided to the breaching Party (or Parties) by the non-breaching Party (or Parties). Any such termination shall become effective at the end of such thirty (30) day period unless the breaching Party (or Parties) has cured any such breach prior to the expiration of the thirty (30) day period.
- 7.5. **Termination for Bankruptcy.** RM on the one hand or ARCHERDX on the other hand may terminate this Agreement, upon the filing of a petition in voluntary bankruptcy or an assignment for the benefit of creditors by the other Party (or Parties), or upon other action taken or suffered, voluntary, or involuntarily, under any federal or state or national law for the benefit of debtors by the other Party (or Parties), except for the filing of a petition in involuntary bankruptcy against the Party (or Parties) which is dismissed within forty-five (45) days thereafter, the other Party (or Parties) may give notice of the immediate termination of this Agreement.

- 7.6. Termination for Serious Economic Hardship.** In the event that ArcherDX's Chief Financial Officer certifies in writing that ArcherDX faces Serious Economic Hardship, short of bankruptcy, then ArcherDX may terminate this Agreement upon 90 days notice. For purposes of termination under this clause, "Serious Economic Hardship" shall mean that ArcherDX reasonably anticipates a sustained period, of at least 90 days, in which it may lack sufficient access to cash or capital necessary to pay its debts as they come due.
- 7.7. Consequence of Termination.** As soon as is reasonably practicable upon expiry or any termination of this Agreement, each Party will deliver to the other Parties copies of all Study Data in its possession arising from the Study and ARCHERDX shall cease immediately all uses of the RM Materials and dispose of all remaining RM Materials in accordance with Section 2.4.
- 7.8.** The Receiving Party shall return all Confidential Information of the Disclosing Party upon expiration or termination of this Agreement, and agrees to destroy any copies then remaining in the possession of the Receiving Party or its personnel (excluding any copy that such Party is authorized to retain for archiving purposes and any copies held electronically as part of such Party's routine back-up processes, and which are not routinely accessible) and to certify as to such destruction upon the request of the Disclosing Party. Furthermore, ARCHERDX agrees, to the extent permitted by applicable law, to destroy any exome sequencing data (BAM files) that are part of the Study Data, was provided to it by RM and which remain in its possession at the point of termination or expiry. ARCHERDX shall pay to RM any outstanding sums due to RM under Article 4 of this Agreement and any other related expenses pre-approved by ARCHERDX and incurred or uncancellable at the date of termination.:
- 7.9. Survival.** Upon expiration or the earlier termination of this Agreement, for any reason, the provisions of Sections 2.4, 3, 5, 6, 7.7, 7.8 and 8 shall survive such expiration or termination.

Article 8. INDEMNIFICATION AND INSURANCE

- 8.1. Indemnification of RM.** ARCHERDX will defend, indemnify and hold harmless RM, their respective Affiliates and their respective trustees, officers, agents, independent contractors and employees ("**RM Indemnitees**") from any and all third party claims, actions, demands, judgments, losses, costs, expenses, damages and liabilities (including attorneys' fees, court costs and other expenses of litigation), regardless of the legal theory asserted (collectively "**Losses**"), arising out of or connected with: (i) ARCHERDX's use, storage or disposal of the RM Materials and/or RM's Confidential Information; (ii) ARCHERDX's use of the Study Data and/or Foreground Intellectual Property in design, manufacture, distribution, use, sale, importation, exportation or other disposition of Foreground Intellectual Property; or (iii) the gross negligence or willful misconduct of ARCHERDX. ARCHERDX's obligation to indemnify the RM Indemnitees pursuant to this Section shall not apply to the extent that any such Losses (A) arise from the gross negligence or intentional misconduct of any RM Indemnitees; or (B) are Losses for which RM are obligated to indemnify the ARCHERDX Indemnitees pursuant to Section 8.2.

- 8.2. Indemnification of ARCHERDX.** RM will defend, indemnify and hold harmless ARCHERDX, ARCHERDX's Affiliates and their respective trustees, officers, agents, independent contractors and employees ("ARCHERDX Indemnitees") from any and all Losses arising out of or connected with (i) RM's breach of Section 2.2 of this Agreement; or (ii) RM's use of the Study Data and/or Foreground Intellectual Property in design, manufacture, distribution, use, sale, importation, exportation or other disposition of Foreground Intellectual Property; or (iii) the gross negligence or willful misconduct of RM (including in respect of RM's obligations in Article 3). RM's obligation to indemnify the ARCHERDX Indemnitees pursuant to this Section shall not apply to the extent that any such Losses (A) arise from the gross negligence or intentional misconduct of any ARCHERDX Indemnitee; or (B) are Losses for which ARCHERDX is obligated to indemnify the RM Indemnitees pursuant to Section 8.1.
- 8.3. Procedure.** To be eligible to be indemnified hereunder, the indemnified Party shall provide the indemnifying Party with prompt notice of the third-party claim giving rise to the indemnification obligation and the exclusive ability to defend (with the reasonable cooperation of the indemnified Party) or settle any such claim; provided, however, that the indemnifying Party shall not enter into any settlement that admits fault, wrongdoing or damages without the indemnified Party's written consent, such consent not to be unreasonably withheld or delayed. The indemnified Party shall have the right to participate, at its own expense and with counsel of its choice, in the defense of any claim or suit that has been assumed by the indemnifying Party. No Party shall settle any matter that will incur liability for another Party or require another Party to make any admission of liability without that other Party's prior written consent.
- 8.4. Insurance.** Each Party will continuously carry liability insurance, and contractual liability, in an amount and for a time period sufficient to cover its obligations hereunder. Without limiting the foregoing, such insurance policies shall include minimum coverage levels of five million dollars (\$5,000,000) per occurrence of products liability coverage, including clinical trials coverage, five million dollars (\$5,000,000) per occurrence of general liability coverage and one million dollars (\$1,000,000) for employer's liability coverage.
- 8.5. EXCEPT FOR THE PARTIES' RESPECTIVE INDEMNIFICATION OBLIGATIONS UNDER SECTIONS 8.1 AND 8.2, IN NO EVENT WILL ANY PARTY'S LIABILITY OF ANY KIND, WHETHER IN CONTRACT, TORT (INCLUDING NEGLIGENCE OR BREACH OF STATUTORY DUTY) OR OTHERWISE, TO THE OTHERS INCLUDE ANY SPECIAL, INDIRECT, INCIDENTAL, CONSEQUENTIAL OR PUNITIVE LOSSES OR DAMAGES (NOR LOSS OF PROFIT, BUSINESS, REPUTATION, CONTRACTS OR ANTICIPATED SAVINGS), EVEN IF SUCH PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. NOTHING IN THIS AGREEMENT IS INTENDED TO LIMIT OR EXCLUDE ANY LIABILITY FOR FRAUD.**

ARTICLE 9. NO THIRD-PARTY PAYER REIMBURSEMENT

- 9.1.** All Parties agree that they shall not submit any claim for reimbursement for any material, service or deliverable provided pursuant to this Agreement, to any Third-Party Payer for reimbursement. The term "Third-Party Payer" shall include but not be limited to any private insurance company, the U.S. Medicare and/or Medicaid programs, any

program administered by the U.S. Centers for Medicare and Medicaid Services, and/or the National Health Service of the United Kingdom.

ARTICLE 10. REPRESENTATION AND WARRANTIES

Each Party represents and warrants to the other that:

- 10.1.** It is duly organized and validly existing under the laws of the jurisdiction of its incorporation, and has full corporate power and authority to enter into this Agreement and to carry out the provisions hereof.
- 10.2.** It is duly authorized to execute and deliver this Agreement and to perform its obligations hereunder, and the person executing this Agreement on its behalf has been duly authorized to do so by all requisite corporate action.
- 10.3.** This Agreement is legally binding upon it and enforceable in accordance with its terms. The execution, delivery and performance of this Agreement by it does not conflict with any agreement, instrument or understanding, oral or written, to which it is a party or by which it may be bound, nor violate any applicable law.
- 10.4.** To the extent of its knowledge, it has not granted, and shall not grant during the Term, any right to any third party which would conflict with the rights granted to another Party (or Parties) hereunder.
- 10.5.** As of the Effective Date its legal department is not aware of any action, suit or inquiry or investigation instituted by any Person which questions or threatens the validity of this Agreement.
- 10.6.** EXCEPT AS EXPRESSLY SET FORTH HEREIN, NO PARTY MAKES ANY OTHER REPRESENTATION, WARRANTY, ASSURANCE, GUARANTY, OR INDUCEMENT TO ANOTHER PARTY, AND IN PARTICULAR, DOES NOT MAKE ANY REPRESENTATION OR WARRANTY WITH RESPECT TO NON-INFRINGEMENT OF ANY RIGHTS OF THIRD PARTIES, THE ACCURACY OR QUALITY OF THE INFORMATION DISCLOSED, OR ANY OTHER MATTER OF ANY NATURE.

HUMAN MATERIALS, INTELLECTUAL PROPERTY, INCLUDING BACKGROUND INTELLECTUAL PROPERTY, STUDY DATA AND CONFIDENTIAL INFORMATION ARE PROVIDED “AS IS,” “WITH ALL FAULTS” AND “WITH ALL DEFECTS,” AND EACH PARTY EXPRESSLY WAIVES ALL RIGHTS TO MAKE ANY CLAIM WHATSOEVER AGAINST ANOTHER PARTY FOR MISREPRESENTATION OR FOR BREACH OF PROMISE, GUARANTEE, REPRESENTATION OR WARRANTY OF ANY KIND RELATING TO ITS HUMAN MATERIALS, INTELLECTUAL PROPERTY, STUDY DATA OR CONFIDENTIAL INFORMATION. EACH PARTY EXPRESSLY DISCLAIMS ANY IMPLIED WARRANTIES ARISING FROM ANY COURSE OF DEALING, USAGE OR TRADE PRACTICE, WITH RESPECT TO: THE SCOPE, VALIDITY OR ENFORCEABILITY OF ITS INTELLECTUAL PROPERTY AND CONFIDENTIAL INFORMATION; OR THAT THE USE, SALE,

OFFER FOR SALE OR IMPORTATION OF ANY INTELLECTUAL PROPERTY
WILL NOT INFRINGE OTHER INTELLECTUAL PROPERTY RIGHTS.

Article 11. NOTICES

11.1. All notices and other business communications between the Parties related to this Agreement shall be in writing, sent by UPS, FedEx or a similarly recognized courier service, addressed as follows:

If to ARCHERDX:

ArcherDX, LLC, a subsidiary of Invitae Corporation.
1400 16th Street
San Francisco, CA 94103
USA
Attention: General Counsel

With a copy not constituting notice to:
legal@invitae.com

If to RM :

Research and Development
The Royal Marsden NHS Foundation Trust
Sutton
Surrey
SM2 5PT

With a copy not constituting notice to:
Trak-er@rmh.nhs.uk

11.2. Any Party may change its address or facsimile number by giving written notice in compliance with this Section.

Article 12. GENERAL PROVISIONS

12.1. Amendments. This Agreement may not be amended or modified except by a writing signed by all Parties and identified as an amendment to this Agreement.

12.2. Construction. Each Party acknowledges that it was provided an opportunity to seek advice of counsel and as such this Agreement shall not be construed for or against any Party.

12.3. Entire Agreement. This Agreement constitutes the final, complete and exclusive agreement between the Parties with respect to its subject matter and supersedes all past and contemporaneous agreements, promises, and understandings, whether oral or written, between the Parties.

12.4. [intentionally omitted]

- 12.5. Governing Law and Jurisdiction.** The terms and conditions of this Agreement, as well as all disputes arising under or relating to this Agreement, shall be governed by English law, specifically excluding its choice-of-law principles. The exclusive forum for the foregoing are the English Courts. ARCHERDX agrees unconditionally that it is personally subject to the jurisdiction of such courts.
- 12.6. Headings.** The headings of articles and sections used in this document are for convenience of reference only.
- 12.7. Independent Contractors.** It is mutually understood and agreed that the relationship between the Parties is that of independent contractors. No Party is the agent, employee, or servant of another Party. Except as specifically set forth herein, no Party shall have nor exercise any control or direction over the methods by which another Party performs work or obligations under this Agreement. Further, nothing in this Agreement is intended to create any partnership, joint venture, lease or equity relationship, expressly or by implication, between the Parties.
- 12.8. Inducement of Referrals.** It is not the purpose of this Agreement or the intent of the Parties to induce or encourage the referral of patients, and there is no requirement under this Agreement or under any other Agreement between the Parties that any Party or its staff refer patients to another Party for products or services. No payment made under this Agreement is made in return for the referral of patients, or is made in return for the purchasing, leasing, or ordering of any products or services.
- 12.9. Limitation of Rights Created.** This Agreement is personal to the Parties and shall be binding on and inure to the sole benefit of the Parties and their permitted successors and assigns and shall not be construed as conferring any rights to any third party. Specifically, no interests are intended to be created for any customer, patient, research subjects, or other persons (or their relatives, heirs, dependents, or personal representatives) by or upon whom the Foreground Intellectual Property or Background Intellectual Property may be used.
- 12.10. No Assignment.** No Party may assign its rights hereunder to any third party without the prior written consent of the other Parties; provided, that a Party may assign its rights without the prior written consent of the other Parties to any Affiliate or other entity that controls, is controlled by or is under common control with such Party, or assign its rights without the prior written consent of the other Parties to a successor of the Party's business to which this Agreement pertains or to a purchaser of substantially all of the Party's assets related to this Agreement whether by sale, merger, operation of law or otherwise; provided that such successor or purchaser shall agree in writing to be bound by all of the terms and conditions of this Agreement. Any purported assignment in violation of this section is void. Such written consent, if given, shall not in any manner relieve the assignor from liability for the performance of this Agreement by its assignee.
- 12.11. Severability.** In the event any provision of this Agreement is held to be invalid or unenforceable, the remainder of this Agreement shall remain in full force and effect as if the invalid or unenforceable provision had never been a part of the Agreement.
- 12.12. Waiver.** The failure of any Party to complain of any default by another Party or to enforce any of such Party's rights, no matter how long such failure may continue, will

not constitute a waiver of the Party's rights under this Agreement. The waiver by any Party of any breach of any provision of this Agreement shall not be construed as a waiver of any subsequent breach of the same or any other provision. No part of this Agreement may be waived except by the further written agreement of the Parties.

12.13. Counterparts. This Agreement may be executed in any number of counterparts which, when taken together, will constitute an original, and photocopy, facsimile, electronic or other copies shall have the same effect for all purposes as an ink-signed original. Each Party hereto consents to be bound by photocopy or facsimile signatures of such Party's representative hereto.

12.14. Force Majeure. No Party shall be responsible for any delay or failure of performance under this Agreement or any Statement of Work hereunder resulting from causes beyond its reasonable control and without its fault or negligence. In any such case, the Parties shall negotiate in good faith with the goal and intent of preserving this Agreement and any impacted Statement of Work and the respective rights and obligations of the Parties.

12.15. No Publicity; Preparation of Marketing Materials. No Party will use for publicity, news release, report, promotion or otherwise, any logo, name, trade name, service mark or trademark of another Party or its Affiliates, or any simulation, abbreviation or adaptation of the same, or the name of any employee or agent of another Party, without that Party's prior, written, express consent. A Party may withhold such consent in that Party's absolute discretion. No Party to this Agreement will make any public announcement regarding the existence of this Agreement and/or the collaboration hereunder without obtaining the prior written consent of the other Parties. As part of the collaboration however the Parties agree to consider jointly developing press releases promoting the outputs of the working relationship, but no such release shall be made by one Party without the review, input and written approval of the other Parties. Notwithstanding anything to the contrary in this Section 12.15, ARCHERDX may refer, with appropriate citation, to the Study Data in publicly distributed marketing materials; *provided that* during the term of this Agreement and one year thereafter (or longer if the Study Data remains unpublished in accordance with Section 6.1), prior to distributing or publishing such materials, ARCHERDX shall submit them to RM for review and approval, which shall not be unreasonably withheld. RM shall approve or reject such materials within thirty (30) days of receipt by RM from ARCHERDX; any lack of timely response by RM shall be deemed approval. RM's comments may include, but not be limited-to, the correction of factual inaccuracies and potential misinterpretations and ARCHERDX shall revise in accordance with RM's comments to correct any such factual inaccuracies or potential misinterpretations and shall delete any RM Confidential Information that may be identified to them by RM. For the avoidance of doubt, if RM reasonably withholds approval to the original or any revised versions, it shall not be published or used publicly.

12.16. Data Security, Privacy and Personal Data: The Parties agree to comply with the terms of the Standard Contractual Clauses attached hereto and fully incorporated into this Agreement as Exhibit A. ARCHERDX acknowledges and agrees that RM Confidential Information may include "personal data" from residents of the United Kingdom and the European Union, as defined and construed under the General Data Protection Regulation (GDPR) (EU) 2016/679 regulations, and the Parties agree to fulfill any applicable obligations upon them accordingly.

- 13 Compliance:** Each Party shall perform its obligations under this Agreement in a professional and diligent manner, consistent with industry standards and good business practices, and in compliance with all applicable laws, rules and regulations. Each Party agrees that, to their knowledge, none of their representatives including respective officers, directors, senior managers, partners, proprietors, shareholders, owners, employees, or principals, as applicable, are or have been accused of, or investigated or prosecuted for violating any anti-corruption laws, export control laws, or other applicable laws or regulations. Each Party agrees that it shall not, shall not, directly or indirectly through third parties, offer, promise, authorize, pay, provide, accept, or solicit any bribe, kickback, or improper payment, gratuity, favor, or benefit to or from (i) any Public Official; (ii) any individual, entity, or organization while knowing that all or a portion of that money or thing of value will be offered, promised, or provided to a Public Official; or (iii) any other individual, entity, or organization, to obtain, retain, or direct any business or for any other improper purpose. "Public Official" means (i) any director, officer, employee, representative, department, agency, official, corporate entity, instrumentality, or subdivision of any government, military, government-owned or affiliated entity or organization, or any public international organization (such as the United Nations or the World Bank), or (ii) any candidate for public office, any political party, or any official of a political party.

IN WITNESS WHEREOF, this Agreement has been executed by duly authorized representatives of the Parties on the date first written above.

**THE ROYAL MARSDEN NHS
FOUNDATION TRUST**

DocuSigned by:
By: *Marcus Thorman*
D98BE5F8EC93447...

Name Marcus Thorman

Title CFO

Date 2022-Jan-05 | 1:18 PM PST

**ARCHERDX LLC, a SUBSIDIARY OF
INVITAE CORPORATION.**

DocuSigned by:
By: *Sean George*
8ECF62E99B5F468...

Name Sean George

Title CEO

Date 2022-Jan-11 | 8:59 AM PST

EXHIBIT A

DATA PROTECTION ADDENDUM

(Controller – to – Controller)

This Data Protection Addendum (“**DPA**”) with an effective date as of the date of last signature shall apply to the Collaboration Agreement (“**Agreement**”) between ArcherDX, LLC, a limited liability company and subsidiary of Invitae Corporation, and their affiliates, and/or subsidiaries (“**ArcherDX**”), and The Royal Marsden NHS Foundation Trust (“**RM**”), (each a “Party” and collectively “the Parties.”)

1. Scope, Definitions and Applicable Law. This DPA will only apply to the extent that a Party receives personal data from the other Party originating in the European Economic Area, the United Kingdom, and Switzerland (“**European Data**”). Terms and expressions used herein that are not otherwise defined, including, without limitation, “personal data,” “controller,” “processing,” “identify” and “processor,” shall have the meanings set forth in the privacy and data protection laws, regulations, and decisions applicable to a party to this DPA (“**Applicable Data Protection Law**”). For European Personal Data, Applicable Data Protection Law includes the Data Protection Act 2018, UK GDPR, General Data Protection Regulation (2016/679) and any implementing and successor legislation. “**Key**” means any information or collection of information, which does not form a part of the European Data but which, taken together with the European Data, permits the identification of any European Data Subject. “**Re-identification Incident**” means a situation where the importer or any third party is able to identify any European Data Subject. “**European Data Subject**” means any individual to which the European Data relates.

2. Roles and Restrictions. Each Party to this DPA: (a) is an independent controller of European Personal Data under Applicable Data Protection Law; (b) will individually alone, or jointly with the Other Party determine the purposes and means of its processing of European Personal Data; and (c) will comply with the obligations applicable to it under Applicable Data Protection Law with respect to the processing of European Personal Data. Nothing in this Section 2 shall modify any restrictions applicable to either Party’s rights to use or otherwise process European Personal Data under the Agreement, and each Party will process European Personal Data solely and exclusively for the purposes specified in the Agreement.

3. Protection of European Personal Data. To the extent not otherwise provided for in the Agreement: (a) each Party will cooperate with the other Party on and implement appropriate security (including both organizational and technical) measures prior to and during processing of any European Personal Data to protect against, without limitation, the accidental, unlawful or unauthorized access to or use, transfer, destruction, loss, alteration, commingling, disclosure or processing of European Personal Data and ensure a level of security appropriate to the risks presented by the processing of European Personal Data and the nature of such European Personal Data, and these measures shall remain in place throughout the duration of the processing of European Personal Data or until either Party ceases to process European Personal Data (whichever is later); (b) each Party will treat European Personal Data with strict confidence and take all reasonable steps to ensure that persons employed and/or persons engaged at a Party’s place(s) of business who will process

European Personal Data are aware of and comply with this DPA and are under a duty of confidentiality with respect to European Personal Data no less restrictive than the duties set forth herein; (c) each Party will not transfer European Personal Data to third parties except under written contracts that guarantee at least a level of data protection and information security as provided for herein, and each Party will remain fully liable to the other Party for any third party's failure to so comply.

4. Notice and Cooperation. Each Party will promptly give written notice to and fully cooperate with the other Party:

(a) if for any reason (i) a Party cannot comply, or have not complied, with any portion of this DPA, (ii) a Party has breached or, if a Party continued to process European Personal Data, would breach, any Applicable Data Protection Law governing processing, transfer, or receipt of European Personal Data. In such cases, that breaching Party will take reasonable and appropriate steps to remedy any noncompliance, or cease further processing of European Personal Data and the non-breaching Party may immediately terminate the Agreement or terminate access to European Personal Data, or take any other reasonable action; and

(b) regarding (i) any breach of security or unauthorized access to European Personal Data that the non-breaching Party detects or becomes aware of (ii) any complaint, inquiry, or request from a data subject or government or regulatory agency regarding European Personal Data, unless such notice is prohibited by law. In such cases, without limiting the generality of the foregoing, the breaching Party will refrain from notifying or responding to any data subject, government or regulatory agency, or other third party, for or on behalf of the non-breaching Party or any of its personnel, unless the non-breaching Party specifically requests in writing that the breaching Party does so, except as and when otherwise required by Applicable Data Protection Law. Each Party agrees and acknowledges that if it receives a request from a government or regulatory agency, that receiving Party may share the terms of this DPA, the Agreement, and other information that is provided to demonstrate compliance with this DPA or Applicable Data Protection Law.

5. Data Exports. If (i) European Personal Data is transferred outside of the European Economic Area or any European Commission approved country, then each Party hereby agrees to and hereby enters into the Controller to Controller Standard Contractual Clauses 2004 (Set II) (Commission Decision 2004/915/EC) (“**C2C SCCs**”) with the other Parties, the terms of which are hereby incorporated into this Agreement and DPA. For the purposes of the C2C SCCs, both ArcherDX and RMH may be the data importer and data exporter, depending on the situation and the governing law of the C2C SCCs is English law.

6. Re-identification.

6.1 It is the Parties' intention that it should not be possible for the importer or any third party to identify any of the European Data Subjects.

6.2 Importer shall take all reasonable steps to avoid a Re-identification Incident from occurring.

6.3 If importer becomes aware that a Re-identification Incident has occurred, or has reason to believe that a Re-identification Incident may occur, it shall:

- 6.3.1 Notify exporter immediately that the incident has occurred or may occur, including particulars of the European Data Subjects who are likely to be identified and the means likely to be used for that identification;
- 6.3.2 Take all reasonable steps to prevent or mitigate any harm caused by the Re-identification Incident.
- 6.4 Importer shall not request any Key from exporter. If importer comes into possession of a Key it shall
 - 6.4.1 Notify exporter immediately on coming into possession of the Key, including particulars of the Key and the circumstances in which it came into importer's possession.
 - 6.4.2 Destroy the Key if, or as soon as, it is lawfully able to do so.
- 6.5 If importer has given notification to exporter concerning a Re-identification Incident or the coming into possession of a Key by importer, then importer shall take any reasonable steps reasonably requested by exporter relating to the possible re-identification of European Data Subjects.
- 6.6 When importer is considering what "reasonable steps" should be taken in respect of a Re-identification Incident or the coming into possession of a Key, it should consider, having regard to its data protection and other obligations imposed by law, the cessation of processing of the European Data, its deletion or the deletion of any Key in the hands of the importer.

7. Government access requests

- 7.1. Importer shall promptly notify the exporter and, where possible, the European Data Subject (if necessary, with the help of the exporter) if it:
 - 7.1.1. Receives a legally binding request by a public authority under the laws of the country of destination for disclosure of personal data transferred pursuant to these clauses; such notification shall include information about the personal data requested, the requesting authority, the legal basis for the request and the response provided.
 - 7.1.2. becomes aware of any direct access by public authorities to personal data transferred pursuant to these Clauses in accordance with the laws of the country of destination; such notification shall include all information available to the importer.
- 7.2. If importer is prohibited from notifying exporter and / or the European Data Subject, importer shall use its best efforts to obtain a waiver of the prohibition, with a view to communicate as much information and as soon as possible. Importer shall document its best efforts in order to be able to demonstrate them upon request of exporter.
- 7.3. To the extent permissible under the laws of the country of destination, importer shall provide to exporter, in regular intervals for the duration of the Agreement, the greatest possible amount of relevant information on the requests received (in particular, number

of requests, type of data requested, requesting authority or authorities, whether requests have been challenged and the outcome of such challenges, etc.).

7.4 Importer shall preserve the information pursuant to the preceding paragraphs under this clause (“government access requests”) for the duration of the Agreement and make it available to the competent supervisory authority upon request. Importer’s obligations under this clause notwithstanding the obligation of importer pursuant to Schedule 1 to promptly inform exporter where it is unable to comply with the terms of Schedule 1.

8. Order of Precedence. In the event of a conflict between the provisions of this DPA and those of the Agreement, the provisions of this DPA will control. Except as modified herein, all terms and conditions of the Agreement shall remain in full force and effect.

EXHIBIT B: FINANCIAL INFORMATION

ArcherDX LLC (“Archer”) shall provide financial support for the Research pursuant to the following details:

Prospective Study Activities:**Costs at laboratories (UK and France combined)**

Including WES T/N for 1300 patients

Including MRD follow-up at 12 timepoints for 1100 patients

Personnel	\$1,000,000
PCM validation	\$200,000
Lab running logistics	\$500,000
Sample processing and storage	\$300,000
Total	\$2,000,000

Number of samples given are an estimated maximum from the study protocol.

To the extent MRD and WES activities take place at Genosity, Archer shall not provide payments to RM for these activities.

Payment schedule

On signature of contract:	\$1,000,000
Following first 250 patients recruited:	\$1,000,000

Retrospective Study Analyses (on-treatment samples):

RM will invoice Archer prior to starting the retrospective analysis for an amount to be agreed in writing at the time. This amount is not to exceed **\$660,000**.

The \$660,000 figure represents sequencing of 1,320 on-treatment samples (132 patients x 10 time points) at a rate of **\$500** per sample. Archer will also provide the necessary kit/reagents for sequencing these samples. This figure represents the maximum that RM and IGR would invoice for this sample set, if the number of samples is lower, the payment will reflect this.

Costings have been calculated on an exchange rate of 1.35USD (\$)/1GBP (£). Payments for the trial will be in USD (\$) but in the event the exchange rate is more than 7% above 1 GBP: 1.35 USD then costs will be reviewed by parties in good faith to ensure costs incurred by laboratories are met.

EXHIBIT C: STATEMENT OF WORK (SOW)

The Royal Marsden NHS Foundation Trust (“RM”) and ARCHERDX LLC (“Archer”) hereby mutually agree to engage in the following collaborative research:

(a) Description of Research

Title of study:

A randomised trial of early detection of molecular relapse with circulating tumour DNA tracking and treatment with palbociclib plus fulvestrant versus standard endocrine therapy in patients with ER positive HER2 negative breast cancer (TRAK-ER).

Principal Investigator(s):

- Professor Nicholas Turner (Royal Marsden Hospital, London, United Kingdom)
- Professor Fabrice Andre (Institut Gustave Roussy (“IGR”), Paris, France)

Research Laboratories:

Prospective (Exploratory): Genosity, LLC, a wholly owned subsidiary of Invitae Corporation.

Retrospective (On-Treatment): Royal Marsden Hospital, London, United Kingdom & Institut Gustave Roussy, Paris, France.

Study duration:

6 years (2y patient recruitment, 4y ctDNA surveillance).

Background and rationale:

Breast cancer is the most common cancer in women and the second leading cause of cancer-related death in Western countries. Despite a decline in breast cancer mortality, prognosis of advanced breast cancer remains poor. Indeed, metastatic disease remains incurable with an estimated 5-year survival rate of about 25%¹.

Standard adjuvant management for postmenopausal women with high-risk ER+ breast cancer involves adjuvant chemotherapy followed by endocrine therapy for at least 5 years. Patients with high-risk disease such as extensive axillary lymph node involvement (4 or more positive axillary lymph nodes) and/or T3/4 disease are more likely to recur and improving the efficacy of adjuvant endocrine therapy would be of benefit to a large number of breast cancer patients and is an unmet medical need². Studies evaluating extended adjuvant endocrine therapy have suggested increased benefit when therapy is extended for up to 10 years and the rate of recurrence occurs at a steady rate over 20 years². Despite this effective therapy, a percentage of patients will recur with incurable metastatic disease, likely related to the development of resistance to endocrine therapy.

There is a critical clinical need to develop tests that can better identify and predict future risk of recurrence. The development of non-invasive “liquid biopsy” methods based on the analysis of circulating tumour DNA (ctDNA) represents an alternative to invasive tumour biopsies³.

1. Waks AG, Winer EP. Breast Cancer Treatment: A Review. JAMA 2019;321:288-300.
2. Pan H, Gray R, Braybrooke J, et al. 20-Year Risks of Breast-Cancer Recurrence after Stopping Endocrine Therapy at 5 Years. N Engl J Med 2017;377:1836-46.
3. Dawson SJ, Tsui DW, Murtaza M, et al. Analysis of circulating tumor DNA to monitor metastatic breast cancer. N Engl J Med 2013;368:1199-209.

(b) Methodology

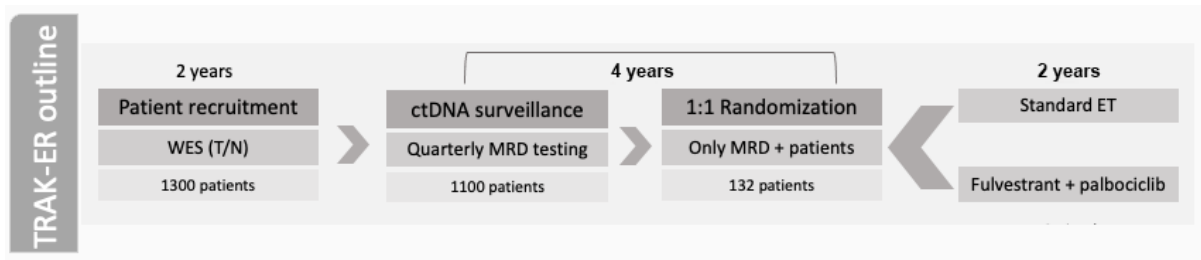


Figure 1. TRAK-ER Study outline

1300 Patients will be recruited and tested for MRD quarterly (Prospective Study). 132 patients will be randomised to the treatment arms of the study (Retrospective Study).

Responsibilities in the Performance of the Study:

ctDNA testing through the PCM assay (the “Assay” or the “PCM Assay”) will occur prospectively for the exploratory portion of the TRAK-ER study and retrospectively for the on-treatment portion of the TRAK-ER study.

Prospective (Exploratory)

Laboratory activities that fall under the Assay activities (such as DNA isolation from tissue and blood/plasma as well as WES and MRD sequencing) will be performed by Genosity (an Invitae Corp affiliate). See figure 2 below for sample logistics for the full duration of the study.

Turnaround time for prospective/exploratory study would be expected to be:

- From receipt of both tissue and whole blood at Genosity to result report for the first MRD time point: approximately **40** days, with day of receipt of both tissue and whole blood identified as day **0** and the caveat that receipt of blood (Streck tubes) for the first MRD time point occurs at least **14** days prior to anticipated result report.
- From blood sample receipt (MRD) to ctDNA result communicated to RM's trial manager: approximately **14** days from receipt of both blood (Streck tube) and PSP.

Above timelines assume that samples and test requisition forms received by the laboratory meet acceptance criteria. Samples and test requisition forms that are insufficient will result in delays and turnaround times will be adjusted based upon the length of time needed to adequately resolve each query. Turnaround times also assumed that the blood sample for the MRD assay is received by day 26, otherwise MRD result will be provided within 14 days from the receipt of the sample. Turnaround times are estimates, and Archer makes no guarantees with respect to turn-around times.

Retrospective (On-treatment) Study

For the ctDNA analysis in patients randomised to therapy (retrospective analysis), the on-treatment blood will no longer be shipped to, processed and sequenced by Genosity but all of the PCM Assay activities will now be done at RM and IGR.

PCM Assays (including Patient Specific Panels (PSP) and reagents for testing) for ctDNA positive patients will be transferred to RM and IGR. The blood will be banked by RM and IGR, and Archer will transfer the PCM Assays as it aligns with commercial readiness. RM agrees, and it has obtained IGR's agreement that, prior to their performing the PCM Assay in any laboratory under their control, for any purpose set forth in this SOW, they shall permit ARCHER to provide in-person training, and proficiency testing, to those RM and IGR personnel who will be responsible for supervising (“Supervisors”) the use of the PCM Assay

in their laboratories. Supervisors shall be responsible for training others in their laboratories (“Non-Supervisors”) on the performance of the PCM Assay in compliance with protocols as directed by ARCHER, and for evaluating the proficiency of such Non-Supervisors. Following such training and proficiency evaluation, RM shall identify in writing to ARCHER those RM and IGR Supervisors and Non-Supervisors deemed proficient and shall ensure that only such personnel deemed proficient may perform the PCM assay, and that such personnel shall only perform the assay in compliance with such protocols as shall be provided by ARCHER. RM and IGR will be solely responsible for obtaining any necessary regulatory approvals associated with the performance of testing human samples in the context of the study (Figure 3).

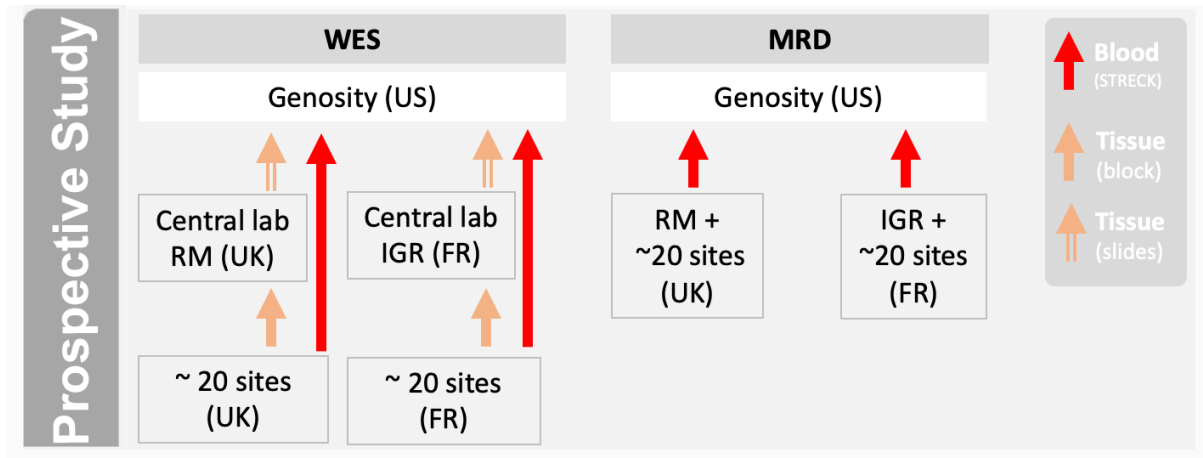


Figure 2. Sample logistics for the prospective study in TRAK-ER

To be able to develop PSPs for each patient, DNA from both tumor (tissue) and normal (whole blood) will be whole exome sequenced (WES) by Genosity.

To enable this, sites in the UK and France will ship tumor tissue to the corresponding Central Lab in each country for processing. Central labs will process the tumor tissue to Archer’s specifications. 11x 5um slides (10x tumor DNA extraction, 1x H+E staining and pathology assessment by Genosity) will be prepared and shipped to Genosity unstained and unwaxed at ambient temperature. For each patient enrolled, 1x10ml whole blood (Streck tube) will be shipped at ambient temperature from sites to Genosity for germline DNA extraction. For each patient an extra 3x10ml preservative BCT from this timepoint (referred in the protocol, as “Exploratory Blood”) will also be shipped at ambient temperature to the corresponding Central Lab in each country, for processing and storage.

For MRD sequencing, each site included in the TRAK-ER study will ship 2x10ml whole blood in Streck tubes for which PSPs were designed, directly to Genosity for MRD sequencing. An extra 2x10ml BCT from the same timepoint will be shipped to the corresponding Central Labs for processing and storage.

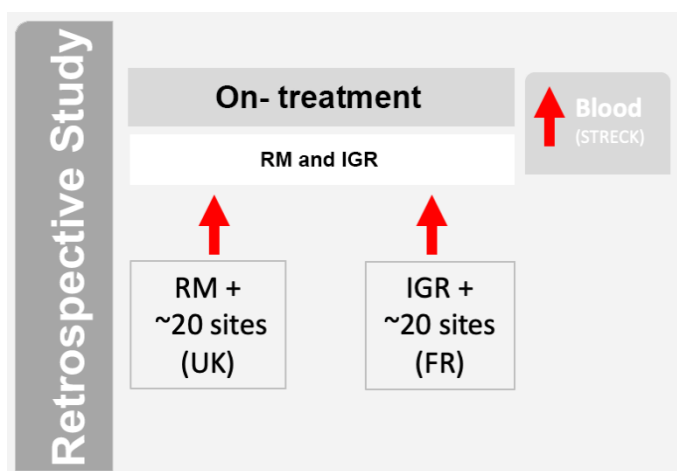


Figure 3. Sample logistics for the retrospective study in TRAK-ER

PCM Assay activities in the Prospective Study:

Whole Exome sequencing:

Approximately 1300 patients will be recruited by RM and IGR for whole exome sequencing of tumor biopsies and blood for 'normals'. This will allow for up to 200 screen failures (patients who are not able to enter ctDNA surveillance phase, see Figure 1).

Genosity will conduct the following steps: extraction of DNA from tumor samples as well as whole blood (germline), including macrodissection of tumor samples and preparation and sequencing of exome libraries in accordance with the CLIA approved LDT test.

ctDNA analysis:

ctDNA surveillance

RM and IGR will collectively be referred to as "Research Laboratories" or "Central Laboratories" and Genosity and Research Laboratories will collectively be called "Laboratories".

Approximately 1100 of the initial 1300 patients recruited by RM and IGR will undergo quarterly ctDNA surveillance over a three-year period (with a goal for 4 tests/year/patient x 3 years x 1100 patients = a maximum of approximately 13,200 tests). Notwithstanding anything in the preceding sentence, the parties may by mutual agreement cease ctDNA surveillance when sufficient patients are randomised (approximately 132 patients). It is anticipated that randomisation of 132 participants will occur a period of time after 1100 participants have commenced ctDNA surveillance.

Genosity will upload exome files in fastq format into an Amazon Web Services cloud-based server supplied by Archer for somatic mutation identification. By comparing the cancer and non-cancer exomes from each patient, an individualized profile of cancer-specific somatic mutations will be identified by Archer. Archer will use these results to design personalized sequencing panels (PSPs) including up to 50 cancer-specific mutations. These PSPs will be supplied to Genosity (with sufficient reagents and primers for at least 24 repeats) at Archer's expense within approximately **40** days of data upload.

In parallel, participating sites in France and the UK ("Sites") will collect *at least* 20mL of whole blood from enrolled patients on a quarterly basis. ("Sites" shall refer to hospitals or institutions who will contribute patients to the Research. RM shall have sole responsibility for locating sites and entering into such agreements with IGR and sites as may be necessary and appropriate for the conduct of the activities set forth in this Statement of Work and the Agreement).

For the prospective study, fresh samples will be sent to Genosity. From these whole blood specimens, plasma will be separated for cell free DNA (cfDNA) isolation by Genosity. *At least* 10 ng of cfDNA will be used for sequencing library preparation with the appropriate PSP Assay. However, the Parties acknowledge that inputting less than 30ng of cfDNA could potentially negatively impact the sensitivity of the PCM Assay. In addition, the PCM Assay has been developed by Archer to query up to 50 patient-specific somatic mutations in order to optimize sensitivity. cfDNA libraries will be sequenced by Genosity to a depth of at least 10 million reads per test on an Illumina sequencing platform. Resulting sequencing data will be uploaded by Genosity to a cloud-based Archer analysis tool for evaluation. For clinical decision-making within the trial, results will be available to RM's TRAK-ER study coordinator(s) and trial manager within approximately **14** days and will be reported on the CLIA report as MRD "Positive" or "Negative" for ctDNA. A "Positive" result means that the patient's plasma did contain ctDNA, indicative of ongoing or recurrent disease.

Training and support:

Archer will provide training to the Research Laboratories at RM and IGR on the use of Archer PCM Assays and online tools. Archer will provide ongoing technical support to Research Laboratories at RM and IGR for the duration of the clinical trial.

Laboratories:

ctDNA testing will occur at three laboratories; USA (Genosity) for the prospective study samples and in the UK (RM) and France (IGR) for the retrospective on-treatment samples.

All activities conducted at IGR shall be conducted at the direction of RM, and pursuant to an agreement between IGR and RM, and RM shall be responsible for any payments to IGR. All activities conducted at Genosity shall be done under the supervision of Archer and at the expense of Archer.

Participation of Clinical Logistics Inc (CLI) as a Clinical Research Organisation (CRO):

During the duration of the trial, CLI will participate as a CRO for sample logistics, sample management as well as for preparation of the lab manual and kits.

Invitae will cover the expenses of the participation of CLI for the duration of the trial pursuant to a separate agreement with CLI.

RMH/IGR will cover the packaging and postage of kits for retrieval of tumor samples from Sites to the Central Labs for processing.

FIRST AMENDMENT TO COLLABORATION AGREEMENT

THIS FIRST AMENDMENT TO COLLABORATION AGREEMENT (“Amendment”) is made on the date of last signature hereto (the “Amendment Effective Date”) between The Royal Marsden NHS Foundation Trust of Fulham Road, London, SW3, 6JJ, UK (“RM”), and ArcherDX, LLC, a Delaware limited liability company, having a place of business at 1400 16th Street, San Francisco, CA 94103, USA (“ARCHERDX”).

Each a “Party” and collectively the “Parties”

WHEREAS the Parties entered into a Collaboration Agreement effective as of January 11, 2022 (the “Agreement”); and

WHEREAS the Parties desire to amend the section of the Agreement concerning Financial Information.;

NOW, THEREFORE, in consideration of the mutual covenants and promises set forth herein, the Parties agree as follows:

1. In this Amendment, expressions defined in the Agreement and used in this Amendment have the meaning set out in the Agreement unless otherwise defined. The rules of interpretation set out in the Agreement apply to this Amendment.

2. Exhibit B of the Agreement entitled “Financial Information” is amended by deleting in its entirety the section entitled “Prospective Study Activities” and replacing it in its entirety with the following language:

- a. Costs at Laboratories (UK and France Combined):
Including WES T/N for 1300 patients
Including MRD follow-up at 12 timepoints for 1100 patients.

The costs are set forth on the spreadsheet attached to this Amendment as Exhibit 1.

Number of samples given are an estimated maximum from the Study protocol. To the extent MRD and WES activities take place at ArcherDX or any of its Affiliates, ArcherDX shall not provide payment to RM for those activities.

Payment Schedule:

On signature of amendment:	\$1,000,000
Following recruitment of first 250 patients	\$557,415.11

3. Exhibit B of the Agreement entitled “Financial Information” is further amended by deleting in its entirety the section entitled “Retrospective Study Analyses (on-treatment samples).”

4. **No Other Amendments:** Except as expressly modified above, all terms and conditions of the Agreement remain in full force and effect and are hereby ratified and confirmed.

5. In the event of a conflict between the terms of this Amendment and the Agreement in relation to the subject matter hereof, this Amendment shall prevail.

IN WITNESS WHEREOF, the parties have caused this Amendment to be executed by their duly authorized representatives.

THE ROYAL MARSDEN NHS FOUNDATION TRUST ARCHERDX, LLC, A SUBSIDIARY OF INVITAE CORPORATION

DocuSigned by:
Marcus Thorman
By: _____
Name: Marcus Thorman
Title: CFO
Date: 2023-Nov-22 | 7:50 AM PST

DocuSigned by:
Tom Buda
By: _____
Name: Tom Buda
Title: General Counsel & Secretary
Date: 2023-Nov-16 | 1:52 PM PST

Exhibit 1

[Insert RM Spreadsheet 230609 TRAK ER costs itemized Invitae Final.xls]

	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Total (£)	Total (\$)
Personnel	£170,839.56	£143,753.56	£113,627.79	£94,081.83	£98,235.86	£125,535.67	£746,074.28	\$1,007,200.27
UK								
1x Research Scientist (FTE) NHS AfC: Band 7	£39,741.13	£43,274.19	£44,572.42	£22,954.79	£23,643.44	£48,705.48	£222,891.45	\$300,903.46
1x Research Scientist (FTE) NHS AfC: Band 6	£30,769.07	£33,522.03	£34,527.69	£35,563.52	£37,296.21	£38,415.10	£210,093.60	\$283,626.36
1x Staff Scientist	£69,560.31	£33,435.32	£0.00	£0.00	£0.00	£0.00	£102,995.63	\$139,044.10
France								
1x Research Scientist (FTE) NHS AfC: Band 6	£30,769.07	£33,522.03	£34,527.69	£35,563.52	£37,296.21	£38,415.10	£210,093.60	\$283,626.36
FTEs UK								
1x Research Scientist (FTE) NHS AfC: Band 7	0.5	0.5	0.5	0.25	0.25	0.5	2.5	N/A
1x Research Scientist (FTE) NHS AfC: Band 6	0.5	0.5	0.5	0.5	0.5	0.5	3	N/A
1x Staff Scientist	0.75	0.35	0	0	0	0	1.1	N/A
FTEs France								
1x Research Scientist (FTE) NHS AfC: Band 6	0.5	0.5	0.5	0.5	0.5	0.5	3	N/A
Lab Running Logistics	£69,375.76	£19,589.83	£19,589.83	£19,589.83	£19,589.83	£19,589.83	£167,324.90	\$225,888.62
General	£600.00	£600.00	£600.00	£600.00	£600.00	£600.00	£3,600.00	\$4,860.00
QIAsymphony SP system plus cabinet + servicing	£18,989.83	£18,989.83	£18,989.83	£18,989.83	£18,989.83	£18,989.83	£113,938.97	\$153,817.61
2x Zephyr PE (Pre and Post-PCR)+ 6 years servicing	£49,785.93						£49,785.93	\$67,211.01
Sample processing and storage	£29,925.31	£64,541.92	£63,444.86	£50,757.92	£19,494.48	£12,077.16	£240,241.64	\$324,326.22
Thermo Scientific TSX40086V Upright -86C ULT Freezer, 400 Box/ 549 L Capacity	£7,975.50	£7,975.50	£7,975.50	£7,975.50	£7,975.50	£7,975.50	£47,853.00	\$64,601.55
Freezer probe purchase and Installation	£322.50	£322.50	£322.50	£322.50	£322.50	£322.50	£1,935.00	\$2,612.25
Probe Monitoring/Year	£412.50	£412.50	£412.50	£412.50	£412.50	£412.50	£2,475.00	\$3,341.25
Probe Calibration/Year	£475.00	£475.00	£475.00	£475.00	£475.00	£475.00	£2,850.00	\$3,847.50
iPassport reactivation	£683.33	£683.33	£683.33	£683.33	£683.33	£683.33	£4,100.00	\$5,535.00
iPassport (5 years)	£2,208.33	£2,208.33	£2,208.33	£2,208.33	£2,208.33	£2,208.33	£13,250.00	\$17,887.50
SampleProcessingTissue	£478.34	£820.29	£0.00	£0.00	£0.00	£0.00	£1,298.63	\$1,753.15
SampleProcessingBlood	£17,369.81	£51,644.47	£51,367.70	£38,680.76	£7,417.32	£0.00	£166,480.06	\$224,748.08
Grand Total							£1,153,640.82	\$1,557,415.11

SECOND AMENDMENT TO COLLABORATION AGREEMENT

THIS SECOND AMENDMENT TO COLLABORATION AGREEMENT (“Amendment 2”) is made on the date of last signature (the “Amendment Effective Date”) between The Royal Marsden NHS Foundation Trust of Fulham Road, London, SW3, 6JJ, UK (2RM”), and ArcherDX, LLC, a Delaware limited liability company, having a place of business at 1400 16th Street, San Francisco, CA 94103, USA (“ARCHERDX”). Each a “Party” and collectively the “Parties”

WHEREAS the Parties entered into a Collaboration Agreement effective as of January 11, 2022 and an amendment agreement dated the same date as this Amendment 2 (together the “Agreement”); and

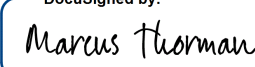
WHEREAS the Parties desire to amend Exhibit C, the “Statement of Work”;

NOW, THEREFORE, in consideration of the mutual covenants and promises set forth herein, the Parties agree as follows:

1. In this Amendment 2, expressions defined in the Agreement and used in this Amendment 2 have the meaning set out in the Agreement unless otherwise defined. The rules of interpretation set out in the Agreement apply to this Amendment 2.
2. Exhibit C of the Agreement entitled “Statement of Work” is deleted in its entirety and replaced with the Exhibit C attached to this Amendment 2.
3. **No Other Amendments:** Except as expressly modified above, all terms and conditions of the Agreement remain in full force and effect and are hereby ratified and confirmed.
4. In the event of a conflict between the terms of this Amendment 2 and the Agreement in relation to the subject matter hereof, this Amendment 2 shall prevail.

IN WITNESS WHEREOF, the parties have caused this Amendment 2 to be executed by their duly authorized representatives.

THE ROYAL MARSDEN NHS FOUNDATION TRUST	ARCHERDX, LLC, A SUBSIDIARY OF INVITAE CORPORATION
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DocuSigned by:

 By: _____
D98BE5E8EC93447...
 Name: Marcus Thorman
 Title: CFO
 Date: 2023-Nov-22 | 7:50 AM PST

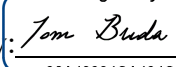
DocuSigned by:

 By: _____
30A43334CA434C4...
 Name: Tom Brida
 Title: General Counsel & Secretary
 Date: 2023-Nov-16 | 1:52 PM PST

EXHIBIT C: STATEMENT OF WORK (SOW)

(a) Description of Research

Title of study:

A randomised trial of early detection of molecular relapse with circulating tumour DNA tracking and treatment with palbociclib plus fulvestrant versus standard endocrine therapy in patients with ER positive HER2 negative breast cancer (TRAK-ER).

Principal Investigator(s):

- Professor Nicholas Turner (Royal Marsden Hospital, London, United Kingdom)
- Professor Fabrice Andre (Institut Gustave Roussy (“IGR”), Paris, France)

Research Laboratories:

Prospective (Exploratory): Invitae Corporation (corporate parent of ArcherDX, LLC) (“Invitae”), Royal Marsden Hospital, Ralph Lauren Centre for Breast Cancer Research, London, United Kingdom (“Ralph Lauren”)

CLB, Centre Léon Bérard, 28 rue Laënnec 69373 Lyon cedex 08, Bâtiment CHENEY B Rez de Chaussée PGEB (Plateforme de Gestion des Echantillons Biologiques) – France (“CLB”)

Study duration:

6 years (2y patient recruitment, 4y ctDNA surveillance).

Background and rationale:

Breast cancer is the most common cancer in women and the second leading cause of cancer-related death in Western countries. Despite a decline in breast cancer mortality, prognosis of advanced breast cancer remains poor. Indeed, metastatic disease remains incurable with an estimated 5-year survival rate of about 25%¹.

Standard adjuvant management for postmenopausal women with high-risk ER+ breast cancer involves adjuvant chemotherapy followed by endocrine therapy for at least 5 years. Patients with high-risk disease such as extensive axillary lymph node involvement (4 or more positive axillary lymph nodes) and/or T3/4 disease are more likely to recur and improving the efficacy of adjuvant endocrine therapy would be of benefit to a large number of breast cancer patients and is an unmet medical need². Studies evaluating extended adjuvant endocrine therapy have suggested increased benefit when therapy is extended for up to 10 years and the rate of recurrence occurs at a steady rate over 20 years². Despite this effective therapy, a percentage of patients will recur with incurable metastatic disease, likely related to the development of resistance to endocrine therapy.

There is a critical clinical need to develop tests that can better identify and predict future risk of recurrence. The development of non-invasive “liquid biopsy” methods based on the analysis of circulating tumour DNA (ctDNA) represents an alternative to invasive tumour biopsies³.

1. Waks AG, Winer EP. Breast Cancer Treatment: A Review. JAMA 2019;321:288-300.
2. Pan H, Gray R, Braybrooke J, et al. 20-Year Risks of Breast-Cancer Recurrence after Stopping Endocrine Therapy at 5 Years. N Engl J Med 2017;377:1836-46.
3. Dawson SJ, Tsui DW, Murtaza M, et al. Analysis of circulating tumor DNA to monitor metastatic breast cancer. N Engl J Med 2013;368:1199-209.

(b) Methodology

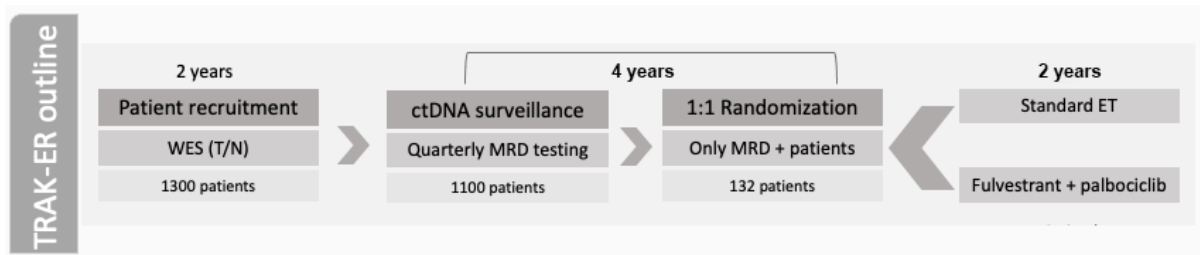


Figure 1. TRAK-ER Study outline

1300 Patients will be recruited and tested for MRD quarterly (Prospective Study). 132 patients will be randomised to the treatment arms of the study

Responsibilities in the Performance of the Study:

ctDNA testing through the PCM assay (the “Assay” or the “PCM Assay”) will occur prospectively for the exploratory portion of the TRAK-ER study

Prospective (Exploratory)

Laboratory activities that fall under the Assay activities (such as DNA isolation from tissue and blood/plasma as well as WES and MRD sequencing) will be performed by Invitae. See figure 2 below for sample logistics for the full duration of the study.

Turnaround time for prospective/exploratory study would be expected to be:

- From receipt of both tissue and whole blood at Invitae to result report for the first MRD time point: approximately **40** days, with day of receipt of both tissue and whole blood identified as day **0** and the caveat that receipt of blood (Streck tubes) for the first MRD time point occurs at least **14** days prior to anticipated result report.
- From blood sample receipt (MRD) to ctDNA result communicated to RM’s trial manager: approximately **14** days from receipt of both blood (Streck tube) and PSP.

Above timelines assume that samples and test requisition forms received by the laboratory meet acceptance criteria. Samples and test requisition forms that are insufficient will result in delays and turnaround times will be adjusted based upon the length of time needed to adequately resolve each query. Turnaround times also assumed that the blood sample for the MRD assay is received by day 30, otherwise MRD result will be provided within 14 days from the receipt of the sample. Turnaround times are estimates, and Archer makes no guarantees with respect to turn-around times.

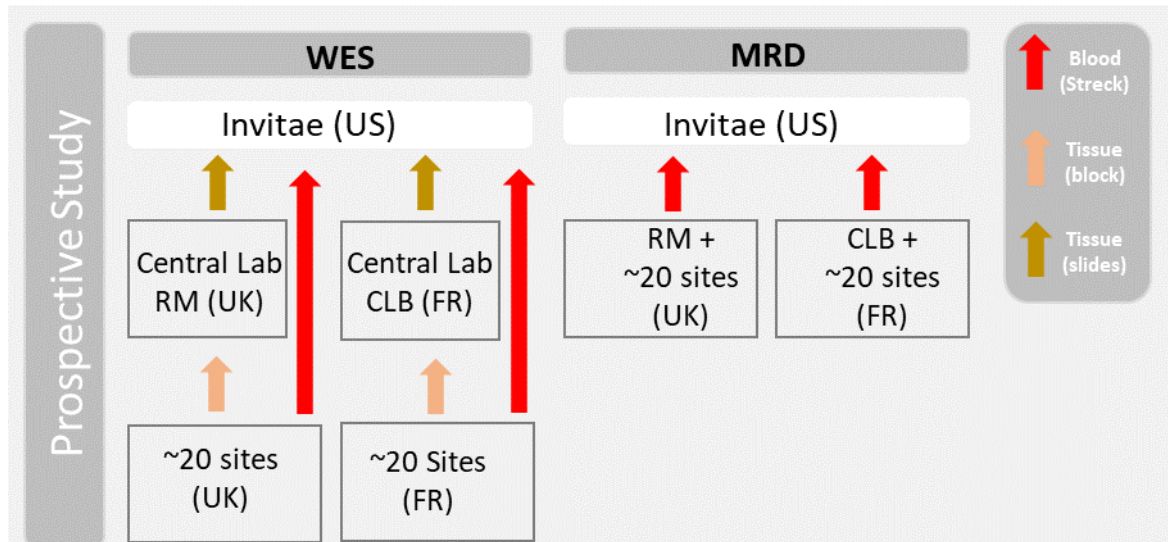


Figure 2. Sample logistics for the prospective study in TRAK-ER

To be able to develop PSPs for each patient, DNA from both tumor (tissue) and normal (whole blood) will be whole exome sequenced (WES) by Invitae.

To enable this, sites in the UK and France will ship tumor tissue to the corresponding Central Lab in each country for processing. Central labs will process the tumor tissue to Invitae's specifications. 11x 5um slides (10x tumor DNA extraction, 1x H+E staining and pathology assessment by Invitae) will be prepared and shipped to Invitae unstained and unwaxed at ambient temperature. For each patient enrolled, 1x10ml whole blood (Streck tube) will be shipped at ambient temperature from sites to Invitae for germline DNA extraction. For each patient an extra 3x10ml preservative BCT from this timepoint (referred in the protocol, as "Exploratory Blood") will also be shipped at ambient temperature to the UK Central Lab from both countries, for processing and storage.

For MRD sequencing, each site included in the TRAK-ER study will ship 2x10ml whole blood in Streck tubes for which PSPs were designed, directly to Invitae for MRD sequencing. An extra 2x10ml BCT from the same timepoint will be shipped to the UK Central Lab from both countries, for processing and storage.

PCM Assay activities in the Prospective Study:

Whole Exome sequencing:

Approximately 1300 patients will be recruited by RM and sites engaged by RM for whole exome sequencing of tumor biopsies and blood for 'normals'. This will allow for up to 200 screen failures (patients who are not able to enter ctDNA surveillance phase, see Figure 1).

Invitae will conduct the following steps: extraction of DNA from tumor samples as well as whole blood (germline), including macrodissection of tumor samples and preparation and sequencing of exome libraries in accordance with the CLIA approved LDT test.

Following whole exome sequencing, Invitae will transmit BAM files and mutation calls to RM on a mutually agreeable cadence.

ctDNA analysis:

ctDNA surveillance

RM will collectively be referred to as "Research Laboratories" or "Central Laboratories" and Invitae and Research Laboratories will collectively be called "Laboratories".

Approximately 1100 of the initial 1300 patients recruited by RM and Sites engaged by RM will undergo quarterly ctDNA surveillance over a three-year period (with a goal for 4 tests/year/patient x 3 years x 1100 patients = a maximum of approximately 13,200 tests). Notwithstanding anything in the preceding sentence, the parties may by mutual agreement cease ctDNA surveillance when sufficient patients are randomised (approximately 132 patients). It is anticipated that randomisation of 132 participants will occur a period of time after 1100 participants have commenced ctDNA surveillance.

Invitae will upload exome files in fastq format into an Amazon Web Services cloud-based server for somatic mutation identification. By comparing the cancer and non-cancer exomes from each patient, an individualized profile of cancer-specific somatic mutations will be identified by Invitae. Invitae will use these results to design personalized sequencing panels (PSPs) including up to 50 cancer-specific mutations. These PSPs will be manufactured (with sufficient reagents and primers for at least 24 repeats) at Invitae's expense within approximately **40** days of data upload.

In parallel, participating sites in France and the UK ("Sites") will collect *at least* 20mL of whole blood from enrolled patients on a quarterly basis. ("Sites" shall refer to hospitals or institutions who will contribute patients to the Research. RM shall have sole responsibility for locating sites and entering into such agreements with Sites, as may be necessary and appropriate for the conduct of the activities set forth in this Statement of Work and the Agreement).

For the prospective study, fresh samples will be sent to Invitae. From these whole blood specimens, plasma will be separated for cell free DNA (cfDNA) isolation by Invitae. *At least* 5 ng of cfDNA will be used for sequencing library preparation with the appropriate PSP Assay. However, the Parties acknowledge that inputting less than 30ng of cfDNA could potentially negatively impact the sensitivity of the PCM Assay. In addition, the PCM Assay has been developed by Invitae to query up to 50 patient-specific somatic mutations in order to optimize sensitivity. cfDNA libraries will be sequenced by Invitae to a depth of at least 10 million reads per test on an Illumina sequencing platform. Resulting sequencing data will be uploaded by Invitae to a cloud-based analysis tool for evaluation. For clinical decision-making within the trial, results will be available to RM's TRAK-ER study coordinator(s) and trial manager within approximately **14** days and will be reported on the CLIA report as MRD "Positive" or "Negative" for ctDNA. A "Positive" result means that the patient's plasma did contain ctDNA, indicative of ongoing or recurrent disease.

Following ctDNA analysis, Invitae will transmit mutation calls, frequencies and P values to RM on a mutually agreeable cadence.

Laboratories:

ctDNA testing will occur at one laboratory in USA (Invitae) for the prospective study samples. RM and CLB responsible for processing tissue and sending tumor slides to Invitae;

All activities conducted at CLB, Ralph Lauren, and the Sites shall be conducted at the direction of RM, and pursuant to appropriately documented agreements. RM shall be responsible for any payments to the Sites, Ralph Lauren and CLB..

Participation of Clinical Logistics Inc (CLI) as a Clinical Research Organisation (CRO):

During the duration of the trial, CLI will participate as a CRO for sample logistics, sample management as well as for preparation of the lab manual and kits

Invitae will cover the expenses of the participation of CLI for the duration of the trial pursuant to a separate agreement with CLI.

RM will cover the packaging and postage of kits for retrieval of tumor samples from Sites to the Central Labs for processing.

Dymphna Lee

From: William O'Callaghan <william.ocallaghan@invitae.com>
Sent: Tuesday 13 February 2024 18:57
To: Dymphna Lee
Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Hi Dymphna,

Good news, the PO is finally approved! Please use PO110362 for the invoice.

Thank you,
Billy

On Thu, Feb 8, 2024 at 8:35 AM William O'Callaghan <william.ocallaghan@invitae.com> wrote:
Hi Dymphna,

I know the PO request was submitted, it is currently pending approval. I'm hoping to have the PO soon.

Thank you,
Billy

On Thu, Feb 8, 2024 at 8:03 AM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

Is there any update on when the PO will be available?

BW,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The **ROYAL MARSDEN**
NHS Foundation Trust

From: William O'Callaghan <william.ocallaghan@invitae.com>
Sent: Wednesday, January 24, 2024 2:04 PM
To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>
Cc: William O'Callaghan <william.ocallaghan@invitae.com>
Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Hi Dymphna,

Thanks for this, some updates from our end.

- Our team accepted the exchange rate provided.
- No Contract Amendment Required!
- This will however, require a new PO per our Finance Team
 - We'll cancel the current PO
 - The new PO will need sign off by CEO/CFO due to the amount
 - This will likely take the longest on our end.

Thank you,

Billy

On Tue, Jan 23, 2024 at 4:59 AM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

See below exchange rate. XE.com uses the mid-market rate (I don't know what that means but perhaps Invitae does). I did check other websites but they weren't clear on their sources. The time taken is in the bottom right. Do let me know if Invitae are happy with this amount to be invoiced.

The screenshot shows the XE Currency Converter interface. At the top, there are navigation links for Personal, Business, Send Money, Converter, Currency API, Tools, Resources, Sign In, and Register. The main heading reads "1,557,415.11 USD to GBP - Convert US Dollars to British Pounds" with the subtitle "Xe Currency Converter". Below this, there are tabs for Convert, Send, Charts, and Alerts. The "Convert" tab is active, showing an input field for "Amount" with the value "\$1,557,415.11". The "From" dropdown is set to "USD - US Dollar" and the "To" dropdown is set to "GBP - British Pound". The result is displayed as "1,557,415.11 US Dollars = 1,224,195.39 British Pounds". Below the result, the exchange rates are shown: "1 USD = 0.786043 GBP" and "1 GBP = 1.27219 USD". There is a disclaimer: "We use the mid-market rate for our Converter. This is for informational purposes only. You won't receive this rate when sending money. [Login to view send rates](#)". At the bottom right, there are two buttons: "Track currency" and "View transfer quote". The footer text reads "US Dollar to British Pound conversion — Last updated Jan 23, 2024, 09:48 UT".

Best wishes,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The ROYAL MARSDEN
NHS Foundation Trust

From: William O'Callaghan <william.ocallaghan@invitae.com>

Sent: Monday, January 22, 2024 9:05 PM

To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>

Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Sure that is fine with me. Thank you!

On Mon, Jan 22, 2024 at 3:08 PM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

I'd have to go to an exchange rate converter website and input the contract value. Then we'd have the evidence of the exchange rate used. I can do that tomorrow and send to you?

Best wishes,

Dymphna

Sent from [Outlook for Android](#)

From: William O'Callaghan <william.ocallaghan@invitae.com>

Sent: Monday, January 22, 2024 7:10:04 PM

To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>

Cc: William O'Callaghan <william.ocallaghan@invitae.com>

Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Hi Dymphna,

I agree avoiding another amendment would be preferable. Could you confirm what the expected invoice would be in GBP? I can see if that can be approved.

Thank you,

Billy

On Mon, Jan 22, 2024 at 9:34 AM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

I cannot find a way to invoice in USD using our system, so I can only invoice in GBP. Agreeing on the exchange rate is the simplest way in my opinion.

We just amended the contract and that took some time so would rather not do it again!

Best wishes,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The ROYAL MARSDEN
NHS Foundation Trust

From: William O'Callaghan <william.ocallaghan@invitae.com>

Sent: Monday, January 22, 2024 2:22 PM

To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>

Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Hi Dymphna,

It sounds like we could pay in USD or GBP. In order to process invoice/pay in GBP we'd need an agreement on the exchange rate. I'm finding out if that is a contract update or if there is a simpler alternative.

In the meantime could you confirm what you'd expect the invoice to be in GBP?

Thank you,

Billy

On Mon, Jan 22, 2024 at 9:03 AM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

Is there any answer on this yet?

Best wishes,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The ROYAL MARSDEN

NHS Foundation Trust

From: William O'Callaghan <william.ocallaghan@invitae.com>

Sent: Monday, January 15, 2024 5:07 PM

To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>

Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Hi Dymphna,

Thanks for letting me know. I will take this to finance and get back to you with an update.

Thank you,

Billy

On Mon, Jan 15, 2024 at 12:05 PM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

Happy new year! Hope 2024 is treating you well.

I tried to raise invoice in USD and I hit a wall. Our finance system appears to offer the option, but when I tried to proceed I was met with several error messages which crashed the system.

Is it mandatory for Invitae to pay out in USD? Also if we invoice in GBP would Invitae still want to send funds in USD?

The only solution I can think of is we agree an exchange rate on a given date, document the equivalent values in USD and GBP, and raise invoice in GBP. I have heard from colleagues of this being done before.

Please let me know what your contracts/finance colleagues think.

Best wishes,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The ROYAL MARSDEN

NHS Foundation Trust

From: William O'Callaghan <william.ocallaghan@invitae.com>

Sent: Wednesday, December 20, 2023 2:06 PM

To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>
Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Sounds good, thank you Dymphna!

On Wed, Dec 20, 2023 at 4:53 AM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

No, it's just a named contact who for the trial so you'd probably get notified the invoice was received. There's a PO number so it should be fine but I usually put a FAO just in case.

Best wishes,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The **ROYAL MARSDEN**
NHS Foundation Trust

From: William O'Callaghan <william.ocallaghan@invitae.com>
Sent: Tuesday, December 19, 2023 7:49 PM
To: Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>
Cc: William O'Callaghan <william.ocallaghan@invitae.com>
Subject: Re: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Thanks Dymphna,

I think that is fine. Unless that means I'd also have to sign anything like contract amendments, etc. If so I can double check the proper name.

Thank you,

Billy

On Tue, Dec 19, 2023 at 6:05 AM Dymphna Lee <Dymphna.Lee@rmh.nhs.uk> wrote:

Hi Billy,

That is a shame about Kelli.

The contract amendment was finalised and I am working on getting the invoice issued. Should I list you as FAO on the invoice?

Best wishes,

Dymphna Lee (she/her)

Lead Project Manager – Breast portfolio

The Royal Marsden Clinical Trials Unit (RM-CTU)

Email: dymphna.lee@rmh.nhs.uk

The ROYAL MARSDEN
NHS Foundation Trust

From: trak-er <trak-er@rmh.nhs.uk>

Sent: Tuesday, December 19, 2023 10:30 AM

To: 'William O'Callaghan' <william.ocallaghan@invitae.com>; trak-er <trak-er@rmh.nhs.uk>; Claire Swift <claire.swift@icr.ac.uk>

Cc: Cody Sargent <cody.sargent@invitae.com>; Dymphna Lee <Dymphna.Lee@rmh.nhs.uk>

Subject: RE: Invitae TRAK-ER Contacts

Hi Billy,

We are sorry to hear about this update.

Thank you for keeping us informed, we will proceed as requested going forward. I am not aware of any ongoing/pending communication but I have cc'd in Dymphna in case she had something open with Kelli.

Best wishes,

Luke

Luke Webster

Senior Trial Manager, Breast Portfolio

The Royal Marsden Clinical Trials Unit (RM CTU)

Email: Luke.Webster@rmh.nhs.uk | Tel: Email to request call back

Working pattern: Monday - Friday

The ROYAL MARSDEN
Life demands excellence



From: William O'Callaghan <william.ocallaghan@invitae.com>

Sent: Monday, December 18, 2023 9:31 PM

To: trak-er <trak-er@rmh.nhs.uk>; Claire Swift <claire.swift@icr.ac.uk>

Cc: William O'Callaghan <william.ocallaghan@invitae.com>; Cody Sargent <cody.sargent@invitae.com>

Subject: Invitae TRAK-ER Contacts

Caution: "This message was sent from an external source. Please do not click links or open attachments unless you recognise the sender and know the content is safe"

Hello,

As you may have seen in the news Invitae announced late last week a reorganization/reduction of some teams. Unfortunately, Kelli Swan was included in the team reduction. Please be sure to include me on anything you would have directed to Kelli or if there is anything you are still needing from her. I can make sure they get addressed.

Thank you,

Billy

--

William O'Callaghan

Associate Director Oncology Laboratory Services

485F US Highway 1 S, Suite 110, Iselin, NJ 08830

invitae.com

Upcoming OOO - 25Dec23, 01Jan24

You can find a detailed explanation of our privacy practices [here](#).

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Upcoming OOO - 25Dec23, 01Jan24

You can find a detailed explanation of our privacy practices [here](#).

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Upcoming OOO - NA

You can find a detailed explanation of our privacy practices [here](#).

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Upcoming OOO - NA

You can find a detailed explanation of our privacy practices [here](#).

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Upcoming OOO - NA

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Upcoming OOO - NA

You can find a detailed explanation of our privacy practices [here](#).

Invoice

45802373

Your Ref: PO110362

THE ROYAL MARSDEN NHS FTRUST



INVITAE CORPORATION

1400 16TH STREET
SAN FRANCISCO
CA
94103
US

GLN:

Send Payment To

THE ROYAL MARSDEN NHS FTRUST

RPY RECEIVABLES F259
SHARED BUSINESS SERVICES
PO BOX 312
LEEDS
LS11 1HP**Supplied Customer**

INVITAE CORPORATION

1400 16TH STREET
SAN FRANCISCO
CA
94103
US

Customer No.	Transaction Date	Payment Terms	Instalments	Due Date	Page
RPY-G-001368914	15-FEB-24	30 NET	1 OF 1	16-MAR-24	1 of 1

Line	Unit	Item	Description	Qty Ord.	Qty Inv.	Unit Price GBP	Total GBP	VAT RATE
1	EA		GRANT INCOME - OTHER CCR5316 TRAK-ER payment for prospective study activities Exhibit B - FAO William O'Callaghan On signature of agreement amendment, plus recruitment of first 250 patients Value of contract \$1,557,415.11 USD agreed conversion to £1,224,195.39 GBP on 23Jan2024	1	1	1,224,195	1,224,195.	
VAT Summary by Rate								
Tax	GB	VAT	1,224,195.39@ 0 %					0.00
Currency Code	GBP	Net VAT Total	1,224,195.39	VAT Total		0.00	Total	1,224,195.39

Your Invoice is due for payment by 16-MAR-24

How to make payment:**Bank Transfer**Make a payment to
THE ROYAL MARSDEN NHS FTRUST
SORT CODE [REDACTED] ACCOUNT NO [REDACTED] for £1,224,195.39
In the payment reference field please quote INV45802373**Other Methods** Please send Remittance Advices to SBS-W.cmr@nhs.netFor queries relating to your account please contact the **COLLECTIONS TEAM:****Email:** sbs-b.collections@nhs.net**Phone:** Mon-Fri 09:00 - 17:00 0303 123 1155Registered Organisation Name and Address:
THE ROYAL MARSDEN NHS FTRUST, FULHAM ROAD, CHELSEA, LONDON, SW3 6JJ

VAT Number: GB 654947396