



Senior Healthcare Data Modeller/ Forensic Data Analyst

Candidate information pack

July 2025

Welcome

Thank you for your interest in joining Outcomes Based Healthcare (OBH). We're thrilled you're exploring the possibility of becoming part of a highly skilled team committed to transforming the way healthcare is delivered and measured – by focussing on outcomes that truly matter to people.



At OBH, we are proud to have pioneered the National Bridges to Health Segmentation Dataset, a groundbreaking tool that enables NHS England to take a nationally consistent, data-driven approach to understanding population health. Our work powers some of the most forward-thinking strategies in the NHS, and supports the evaluation and measurement of shifting care from hospitals into communities, and from treatment towards prevention.

This is an exciting time to join us. We are looking for brilliant, mission-led individuals to help us continue building on this momentum. As a Senior Healthcare Data Modeller / Forensic Data Analyst, you will play a central role in refining and evolving our national analytical data pipeline – one that curates over 31 billion rows of event based data into high-quality, person level clinically curated data products.

Your work will directly impact how health systems identify population needs, design services, and measure success, all in a nationally consistent way.

At OBH, you'll be working alongside clinicians, public health experts, data analysts and engineers who share a deep belief in the power of data to improve lives. You'll be supported to grow professionally in a dynamic, collaborative, and innovation-driven environment. In support of a culture that values efficiency, deep work, and a thoughtful balance of asynchronous and synchronous collaboration, we operate on a four-day work week while maintaining full five-day compensation.

We foster a highly collaborative, cross-disciplinary environment that draws on the diverse expertise of our team to solve complex challenges together.

Each quarter, we bring the team together for dedicated away days that blend personal and professional development – from workshops on wellbeing, growth mindset, positive communication, and storytelling with data, to engaging socials like cooking classes, bushcraft, escape rooms, and guided meditation.

We hope this information pack gives you a clear sense of who we are and the exciting journey we're on. If our mission resonates with you and you're ready to apply your skills to something with real-world significance, we'd be delighted to see you apply.

Warm regards,

Dr Nasrin Hafezparast MBBS FBCS

Co-founder and Chief Clinical Data Officer
Outcomes Based Healthcare

About Outcomes Based Healthcare

Specialists in person-centered health data curation, Outcomes Based Healthcare (OBH) are a pioneering UK-based organisation transforming how healthcare success is defined, measured, and incentivised.

Founded in 2013 by clinicians, OBH exists to drive a shift in healthcare systems – from activity-based models to those that reward improved health outcomes for individuals and populations. At the heart of our work is a commitment to what truly matters: empowering health systems to improve people's outcomes, and drive the shift towards prevention and proactive, value-based care.

OBH combines deep clinical expertise with advanced data processing to measure and monitor outcomes that reflect people's lived health experiences – not just clinical events.

Our technology and frameworks are designed to support commissioners, providers, and health systems in embedding person-centred outcomes into the design and delivery of care.

We enable healthcare systems to define, track, and analyse meaningful health outcomes – such as maintaining independence, reducing complications from long-term conditions, or delaying the onset of ill health.



We are not simply a data company or a consultancy but are a partner in redefining the economics of healthcare. With modular, cloud-based tools, deep partnerships across the NHS, and an unwavering focus on meaningful outcomes, we are building a future where health systems are incentivised to keep people well and not just to treat them once they are sick. Our methods and tools are already embedded across the UK health system:

- Partner to NHS England on the National Bridges to Health Segmentation Dataset, covering more than 60 million registered patients and updated quarterly
- Co-developer of the Population and Person Insight (PaPI) dashboard used nationally by the NHS
- Recipient of the Queen's Award for Enterprise – Innovation (2021)
- Contributed to peer-reviewed research in Nature Medicine, The Lancet, and others, advancing understanding of multimorbidity, inequality, and data-driven care

Traditional healthcare systems reward activity – appointments, procedures, hospital stays – rather than improvements in people's health. OBH is addressing this imbalance by enabling a model that:

- Rewards improvements in outcomes rather than volume of services
- Supports early intervention and prevention
- Provides a consistent, evidence-based way to measure population health
- Aligns the goals of patients, clinicians, and system leaders



National Segmentation Dataset

The National Segmentation Dataset, developed through a partnership between OBH and NHS England, is the world's most comprehensive longitudinal dataset for Population Health Management (PHM).

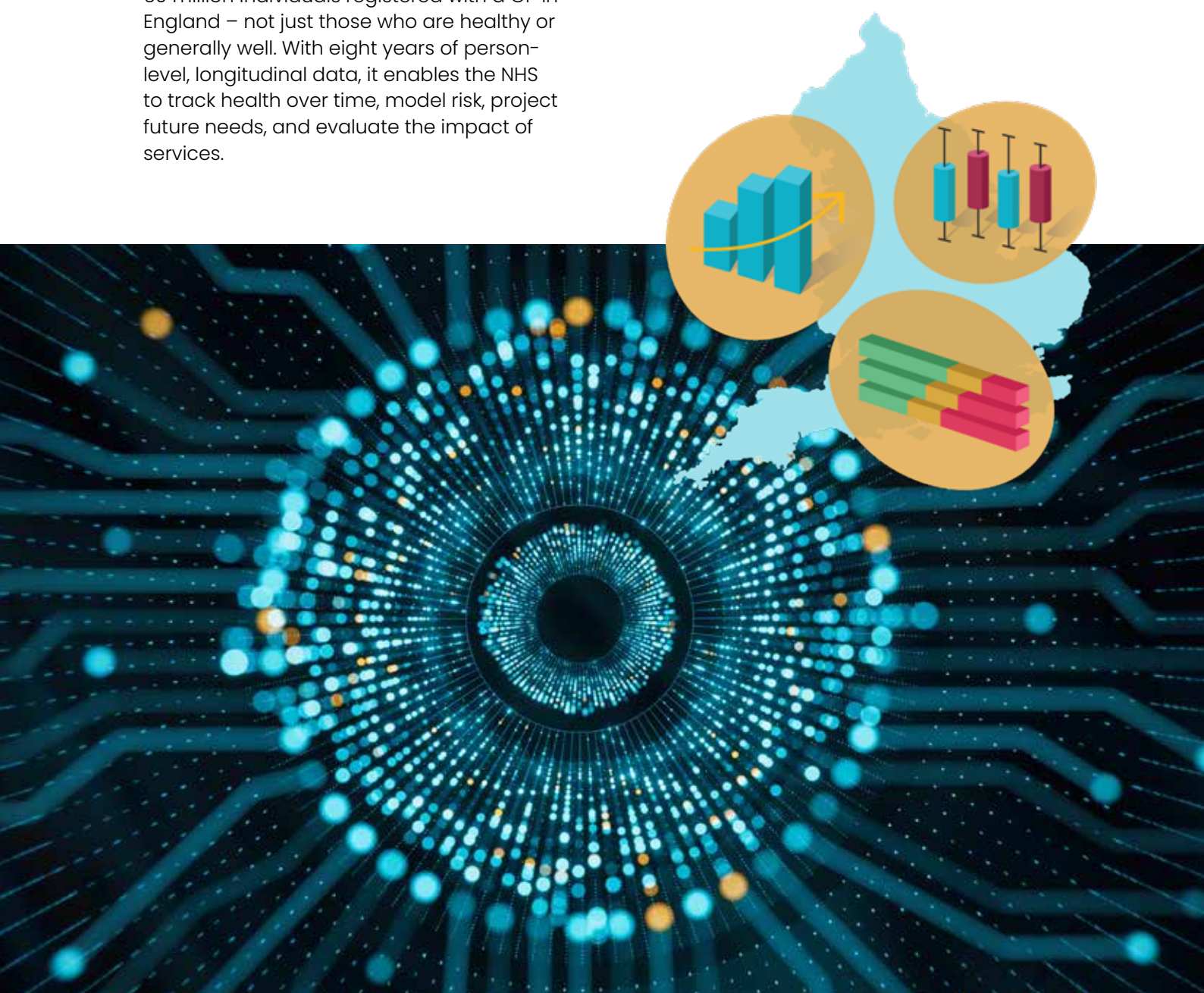
Anchored in the internationally recognised Bridges to Health (B2H) life-course segmentation model, it delivers a consistent, scalable and clinically meaningful way to understand and respond to the health needs of the entire population.

Available on NHS England UDAL cloud environment and via the NHS Federated Data Platform (FDP), this dataset covers all 60 million individuals registered with a GP in England – not just those who are healthy or generally well. With eight years of person-level, longitudinal data, it enables the NHS to track health over time, model risk, project future needs, and evaluate the impact of services.

What sets this dataset apart is its unmatched scope and clinical depth:

- 59 clinically curated condition registers, enabling fine-grained segmentation
- Integration of data from 31 billion raw records, transformed into 5 billion rows
- Geographic and socio-demographic granularity, supporting equity-focused interventions

Crucially, it is the only PHM tool that enables the calculation of HEALTHSPAN® – a metric that measures how long people live in good health – and Days Disrupted by Care (DDBC), which assesses care coordination and hospital avoidance.



The dataset plays a pivotal role in delivering on two of the UK Government's strategic health shifts:

- From hospitals to communities – by tracking DDBC and supporting care closer to home
- From treatment to prevention – by identifying those at risk earlier and measuring HEALTHSPAN®

Already underpinning national strategy, research, and service improvement, including contributions to peer-reviewed journals and national evaluations, the **National Segmentation Dataset** is redefining what's possible in population health.

Use it for

- Identifying cohorts of the population with similar needs
- Benchmarking against activity, outcomes and costs
- Modelling scenarios to allocate resources effectively
- Evaluating and tracking the outcomes of any interventions



Job Description

Job Title: Senior Healthcare Data Modeller/Forensic Data Analyst

Location: Hybrid – London (Tuesdays, Wednesdays)

Company: Outcomes Based Healthcare, part of the RCI Group

Position Overview:

We are seeking a highly skilled and detail-oriented Healthcare Data Modeller / Forensic Data Analyst to join the Outcomes Based Healthcare (OBH) team.

This specialist role is central to the ongoing development, validation, and investigation of the National Segmentation Analytical Data Pipeline, which underpins the National Bridges to Health Segmentation Dataset, which is a critical asset for NHS England's population health analytics strategy.

The successful candidate will work closely with clinicians, data analysts, and product owners to update and prototype business logic, investigate complex data issues, and ensure the integrity and clinical relevance of the segmentation dataset. This role requires hands-on expertise with large-scale healthcare data, advanced analytical skills, and a collaborative approach to working with both technical and clinical colleagues.

Key Responsibilities:

- Design and develop updates to the segmentation analytical pipeline, including the implementation of new clinical and business logic to support evolving product features and requirements
- Prototype and implement analytical code (primarily in PySpark and SparkSQL within Azure Synapse) to transform and link data from 15+ national patient-level datasets, encompassing more than 19 billion health records
- Collaborate closely with the design and clinical informatics team to translate clinical definitions and requirements into robust, testable logic and data models
- Investigate and resolve data issues identified during pipeline testing and validation cycles, using forensic data analysis techniques to trace root causes and recommend solutions
- Support the quarterly refresh and delivery of the National Segmentation Dataset, ensuring high standards of data quality, accuracy, and clinical validity
- Develop and maintain clear documentation of logic, data models, and validation processes to support transparency and reproducibility
- Work with data engineers to hand over prototype code for productionisation and optimisation within the analytical pipeline
- Contribute to the integration of new data sources (e.g., GP data via FDP) and the development of additional data products linked to the segmentation dataset
- Participate in internal reviews, knowledge sharing, and continuous improvement activities across the analytics and clinical teams
- Support the training and onboarding of new team members and end users as required



Qualifications and Experience:

- Significant hands-on experience in healthcare data analysis, data modelling, or analytical pipeline development, ideally within the NHS or related UK health sector
- Advanced proficiency in PySpark, SparkSQL, and working within Azure Synapse or similar big data platforms
- Demonstrated ability to design, prototype, and implement complex business logic and data transformations for large, linked health datasets
- Strong track record of investigating and resolving data quality and validation issues, with a forensic attention to detail
- Experience collaborating with clinical, analytics, and engineering teams to translate requirements into robust data solutions
- Solid understanding of NHS data sources, coding standards (e.g., ICD-10, SNOMED), and the challenges of population health analytics
- Degree in a relevant field (e.g., data science, statistics, informatics, epidemiology, public health, computer science, or a related discipline)

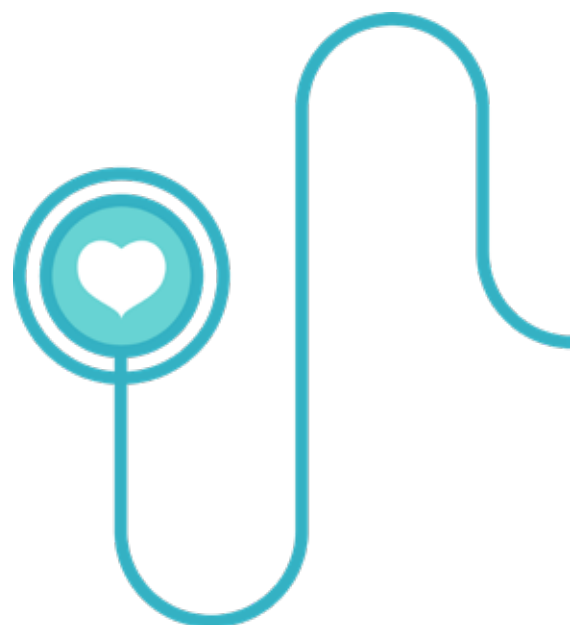
Preferred Qualifications and Experience:

- Experience working directly with national NHS datasets (e.g., SUS, Mental Health Data, Community Data, IAPT, National Diabetes Audit)
- Advanced degree (MSc, PhD) in public health, epidemiology, clinical informatics, or a related field
- Familiarity with the design and delivery of analytical pipelines supporting population health management or segmentation

- Experience with data validation, testing, and quality assurance processes in a healthcare context
- Background in clinical, public health, or epidemiology, with an understanding of how data models support care delivery and health outcomes
- Experience supporting or delivering training and support to end users of health data products

What We Offer:

- A four-day working week environment
- Competitive salary
- Attractive benefits, including private health insurance
- A mission-led organisation that strives to make a meaningful impact on healthcare outcomes at a national level
- Brilliant team of similarly motivated colleagues, including clinical leadership
- A dynamic and innovative work environment
- Opportunities for training, professional growth and development
- Part of the RCI Group of companies, with opportunities to be part of a wider group focussed on improving outcomes for people



How to Apply

Applications should be made by submitting:

- A full and up-to-date CV, which includes your contact details and email address.
- A personal statement of no more than two sides of A4, which should explain why you are interested in applying for the role and what you believe you will be bringing to it.
- Contact details for three referees (who will not be contacted without your permission).
- A completed **Diversity Monitoring Form** and **Fit and Proper Person Monitoring Form**.

All applications should be sent to: apply@hunter-healthcare.com. All applications will be acknowledged.

For an informal conversation about the post, please contact **Brendan Davies** at our recruitment partners, Hunter Healthcare by email: bdavies@hunter-healthcare.com or phone: **07585 356985**



General enquiries

Outcomes Based Healthcare
11-13 Cavendish Square
London W1G 0AN

w: outcomesbasedhealthcare.com
e: info@outcomesbasedhealthcare.com

X @OBH_UK

f [outcomesbasedhealthcare](https://www.facebook.com/outcomesbasedhealthcare)

in [outcomes-based-healthcare](https://www.linkedin.com/company/outcomes-based-healthcare)



Floor 2, Berkshire House
168-173 High Holborn, London WC1V 7AA

T: 020 7935 4570
E: enquiries@hunter-healthcare.com