Nottingham City Health and Wellbeing Board 24 January 2024

Report Title:	Data Integration for Population Health
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Executive Summary:

In the evolving landscape of health and care data, the role of integrated population data has become pivotal in driving informed decisions and strategies. At the heart of this transformation is the need to integrate and harness the power of data in innovative ways to deliver the population health agenda. This paper delves into the approach the ICB is adopting into integrated population health data, and how it aims to use it systematically to deliver both the strategic population health agenda, while operationally delivering improved outcomes for our citizens. This paper will give stakeholders within the system insight into the goals, and envisioned outcomes that underline SAIU's (System Analytics Intelligence Units) commitment to elevating the standards of data-driven health and care solutions.

Background:

In recent years, the quantity and quality of individual patient data has seen a significant increase. While the regulatory landscape has been instrumental in upholding patient data privacy and confidentiality, it has also inadvertently made it more challenging to utilise this data to its fullest potential for broader health and care management objectives, particularly as the recent Planning Guidance on Population Health Intelligence and insights highlights the pressing need to integrate and leverage this data.

In the past, the System Analytics Intelligence Unit's (SAIU) Data Management Team, previously aligned with the CCG, secured permissions from data custodians to collect and utilise data primarily for first hand use (patient/service user focus). This led to the establishment of the GPRCC (GP Repository for Clinical Care). GPRCC serves as a central hub where data from diverse sources such as GPs, community centres, acute care facilities, and Local Authority systems amalgamates. This consolidated data is then streamlined into a warehouse managed by the Data Management Team, with eHealthscope and the systems PowerBI dashboards acting as the user interface for GPRCC.

This approach provided profound insights into direct patient care. However, with the

shift towards more population health management approaches, it was quickly identified that a gap in which integrated data for secondary use purposes was needed. This integration was not just about compiling data, but also about linking data sets together to gain a more complete picture to help the system model, predict and stratify patient and citizen data enabling the system to align our strategies with the current and projected needs of both individuals and the broader community.

An integrated Data Approach

By championing the integration of data within our system, we acknowledge the following steps were a necessity.

1. Expanding GPRCC to be used for secondary use purposes

To bring the vision of integrated population health data to fruition, our first step was to engage proactively with GPs and other service providers and gain authority from them as data owners to use data for primary and secondary use purposes. This required forging collaborative relationships, persuading data owners and their patients and citizens of the benefits of us having access to this system. Accessing data for secondary use purposes enabled us to understand health trends, vulnerabilities, and opportunities in the community. This approach provided us with intelligence to steer health care strategies, promoting a tailored and holistic approach to health and wellbeing.

*Its important to note that all data stored in the GPRCC pseudonymised

2. Implementation of Section 251 to enable GPRCC data to be linked

Securing the Section 251 provided the Nottingham and Nottinghamshire healthcare ecosystem with an unprecedented advantage. We are now equipped to interlink all data within GPRCC, thus offering a panoramic view of our population's interaction with the healthcare infrastructure. Historically, our understanding of healthcare touchpoints was fragmented. Using the illustrative case of the Urgent Care Department, in the past, we had a count of 150 individuals. However, with linked data enabled by Section 251, we can discern the comprehensive patient journey, tracing steps from initial calls to 111, visits to the WIC, or even details of a medicine reviews. This multi-layered data offers richer insights and a tangible understanding of the patient journey, making healthcare intervention more strategic and impactful.

3. Enabling integrated population data to be accessible

In our commitment to fostering a data-driven healthcare culture, we are pioneering the creation of an accessible population health data warehouse. This platform, holding pseudonymised and interlinked data, enables analysts to truly analyse trends, impacts and monitor outcomes. Available to all 'authorised' system analysts, it promises a unified view of the patient journey, moving away from traditionally siloed insights to one that is truly integrated no longer restricted by a limited data viewpoint enabling and supporting true collaboration.

Conclusion Summary

Recommendation(s):

- <u>Acknowledgment of Progress</u>: Members are urged to take cognizance of the significant strides made in the realm of integrated data management and the transformation it promises to bring within the broader healthcare landscape.
- <u>Support for Integrated Data Strategy</u>: We solicit the continuous backing of all members to reinforce our integrated approach towards intelligence sharing and utilization. A cohesive, collaborative stance will be instrumental in optimising the potential of our data-driven interventions.
- <u>Future Endeavours</u>: As we continue to innovate and expand our data capabilities, it is crucial for members to remain engaged, providing feedback and strategic input, ensuring our approach aligns with the evolving needs of our community.

The Joint Health and Wellbeing Strategy		
Aims and Priorities	How the recommendation(s) contribute to meeting the Aims and Priorities:	
Aim 1: To increase healthy life expectancy in Nottingham through addressing the wider determinants of health and enabling people to make healthy decisions	The current health and care environment has many diverse challenges; rapidly evolving data streams, challenging regulations, and an overarching need to pivot towards an integrated, population health-focused strategy are obstacles	
Aim 2: To reduce health inequalities by having a proportionately greater focus where change is most needed	that intelligence leads have to overcome on a daily basis. The ICS's commitment to this vision is evidenced by its dedicated approach to harnessing the	
Priority 1: Smoking and Tobacco Control	power of integrated population health data. The System Analytics Intelligence Unit (SAIU) has been pivotal in	
Priority 2: Eating and Moving for Good Health	orchestrating these data-driven initiatives, curating a strategic roadmap defined by rigorous collaboration with stakeholders,	
Priority 3: Severe Multiple Disadvantage	the implementation of the Section 251, and the creation of an accessible data warehouse. As the system advances on	
Priority 4: Financial Wellbeing	this trajectory, it is evident that our health and care strategies, informed by these sophisticated data mechanisms, are geared towards not only enhancing	

	system efficiencies but also enriching the outcomes for the residents of Nottingham and Nottinghamshire.	
How mental health and wellbeing is being championed in line with the Board's aspiration to give equal value to mental and physical health:		

List of background papers relied upon in writing this report (not including published documents or confidential or exempt information)	
Published documents referred to in this report	