Supporting the generation of evidence and service specification for people at risk of becoming frequent A&E attenders

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INTRODUCTION

High-intensity users (HIUs) place increasing pressure on healthcare systems, highlighting the need to identify and support at-risk individuals before they become frequent users of already overstretched health and social care services [1, 2].

To address this, the Cambridgeshire and Peterborough Integrated Care Board launched the HIU Tier 2 service, a proactive, personalised intervention offering assessment, tailored care plans, and support to reduce future healthcare use [3, 4].

AIM OF OUR SUPPORT

This evaluation support aimed to provide early data insights to assess impact and guide improvements in the service design and evaluation scope.

METHOD

A before-and-after study design was utilised to evaluate the impact of the intervention on healthcare utilisation. Data were collected from Eclipse, focusing on service users' healthcare interactions during the 90 days preceding and the 90 days following the intervention.

A total of 1,900 service users were included in the analysis. Of these, 55% were from practices located in the North and 45% from the South, ensuring representation from both regions. Healthcare utilisation data included the number of A&E visits, outpatient appointments, prescribing, elective admitted patient care (APC) and non-elective admitted patient care.
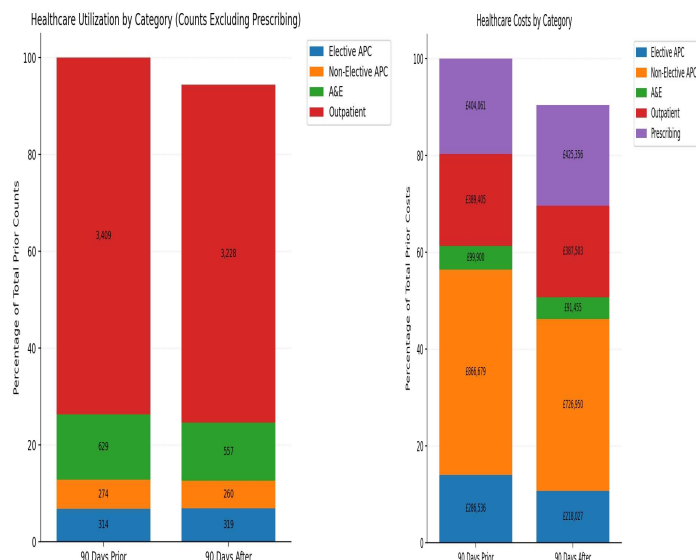
Figure 1. Healthcare costs by category.

Figure 2. Healthcare utilisation by category

Figure 3. Total healthcare costs before and after intervention. Bar chart displays a decrease in total healthcare costs from £2,046,581 (90 days prior) to £1,849,291 (90 days after).

RESULTS

Referred service users were older (median age 71; range 50–90). Post-intervention costs fell by £197,290 (9.6%), though not statistically significant ($p > 0.05$). Reductions were concentrated among users linked to specific GP practices.

However, we do not attribute these changes directly to the intervention. Rather, our analysis highlights that the current service model was not designed to robustly demonstrate impact, due to challenges such as inconsistently recorded metrics, heterogeneous service user cohorts, and ill-defined interventions.

REFLECTIONS

Although reductions in healthcare utilisation were not statistically significant, patterns observed across patient groups suggest areas of potential impact. However, inconsistent delivery, mixed cohorts, and poorly defined interventions highlight the challenges of measuring outcomes in complex service models.

This highlights the importance of aligning business case development with robust evaluation frameworks to better capture effectiveness.

REFERENCE

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