Public Health England

Protecting and improving the nation's health

NHS Health Checks: An Analysis of Physical Activity and Alcohol Consumption Measurements

March 2021

Contents

1. Purpose

The first NHS Health Check national data extraction gathered over 9 million patient clinical records between 2012 and 2017.[1] The data showed that among the 5.1 million people who attended their NHS Health Check, the General Practitioner Physical Activity Questionnaire (GPPAQ) was recorded on 64.5% (3.3m attendees) of clinical records as a measure of physical activity. Alcohol consumption was recorded on 38.3% (1.9m attendees) of patient clinical records, using the Alcohol Use Disorders Identification Test (AUDIT), the Alcohol Use Disorders Identification Test for Consumption (AUDIT-C) or the Fast Alcohol Screening Test (FAST).

Public Health England commissioned the Centre for Health and Development (CHAD) and Staffordshire University to further explore the extent of physical activity and alcohol measurement and recording in NHS Health Checks, by using existing research data to:

- Describe the extent to which AUDIT/AUDIT-C/FAST and GPPAQ measurements were completed during an NHS Health Check.
- Compare the recording of physical activity and alcohol consumption measurements in clinical records with observed practice from video recordings of the delivery of NHS Health Checks.[2,3,4]

The aim of this paper is to summarise the key findings from this analysis.[2] This will inform the current review of the NHS Health Check Programme and support local NHS Health Check commissioners and providers in improving the measurement of physical activity and alcohol consumption as part of the NHS Health Check.[5]

2. Method

Staffordshire University conducted an analysis on an existing dataset gathered in 2018/19 for the RIsk COmmunication in NHS Health Checks (RICO) study. The methodology can be found elsewhere.[4]

Data analysed were from 171 video-recorded NHS Health Checks from 12 general practices in the West Midlands. Researchers reviewed data from 171 anonymised clinical records from patients who attended a video-recorded NHS Health Check. This was to determine the proportion of NHS Health Checks in which physical activity and alcohol measurements were recorded in the patient clinical record. Of these video-recorded NHS Health Checks, 130 were transcribed as part of the RICO study (41 were not transcribed for qualitative analysis). [2] The data were used in this analysis to compare what was recorded on the patient clinical record with what actually took place.

3. Key Findings

Alcohol Consumption

Nearly all patients (87.7%, n=171) had a record of alcohol consumption in their clinical record, which was measured using one of the recommended tools: AUDIT, AUDIT-C or FAST (Annex A).[6] This figure is considerably higher than the five-year national average of 38.3%, but is based on a small sample of 12 general practices in the West Midlands and so not representative of England.[1] The results are closer to the 2017/18 regional rates for the West Midlands where 65% of NHS Health Check attendees had an alcohol measurement recorded.[7] The difference in recording rates is a result of natural variation due to the different NHS Health Check commissioning models and delivery methods used across the country.

Despite the majority of clinical records showing that alcohol consumption was recorded, evidence from the NHS Health Check transcripts highlights discrepancies between what was recorded and what was observed. Clinical records show that AUDIT-C was the most commonly recorded measure of alcohol consumption (76%, n=171). However, consultation transcripts show that in the majority of cases (67%, n=59) AUDIT-C was only partially completed (Annex B). Practitioners routinely omitted the third AUDIT-C question on how often a patient has consumed six or more units on a single occasion in the last year.

Additionally, half of the transcribed NHS Health Checks (50%, n=130) showed that none of the recommended tools were followed by practitioners. Rather, practitioners asked a general question about alcohol consumption as part of a more personalised conversation, instead of reading the questions exactly as written. This adaptation may have helped engagement with the patient, and provided sufficient information to complete the AUDIT-C.

Guidance indicates that a full AUDIT assessment should only be undertaken when an individual has an AUDIT-C score ≥5 or FAST score ≥3. Having calculated AUDIT-C scores using the information from the transcripts, the researchers identified that 30% (n=130) of patients were eligible for a full AUDIT assessment and yet 58% (n=40) of those eligible did not have a full AUDIT score recorded (Annex C). This highlights a missed opportunity for practitioners to discuss alcohol consumption in more detail with potentially high-risk individuals.

When AUDIT questions were asked, the practitioner tended to only ask up to question seven (out of ten), generally omitting questions relating to feelings of guilt/remorse after drinking, memory loss, alcohol-related injuries, or concern about patients' drinking among others. This may be explained by the sensitive nature of these questions and practitioners feeling that they do not have the capability, confidence or time to raise them

in a meaningful way as part of a NHS Health Check.[8] The amount of time made available to deliver a NHS Health Check is also known to be a barrier or facilitator to delivery, and may have a role in explaining the variation in these findings.[3,8]

Importantly, the transcripts of the NHS Health Checks demonstrated that the result of the alcohol assessment was only shared with the patient in a small number of instances (7.7%, n=130), despite this being a required component of a check. Instead it was more common (46.2%, n=130) for the practitioner to focus the discussion on government guidelines regarding alcohol consumption. Again, this could be indicative of practitioners feeling that they have not had sufficient time or training to competently and confidently have a full conversation about a person's alcohol intake and help them consider consumption changes.[8] As a result, practitioners may default to providing advice on low risk drinking.

Physical Activity

Nearly all patient clinical records (93.6%, n=171) recorded that the GPPAQ had been completed within the NHS Health Check. This figure is considerably higher than the five-year national average of 64.5% but is based on a small sample of 12 general practices in the West Midlands and so not representative of England.[1] The difference in recording rates is a result of natural variation due to the different delivery models adopted across the country. The results are more consistent with the 2017/18 regional rates for the West Midlands where 88% of NHS Health Check attendees had a physical activity measurement recorded.[7]

Almost all patient clinical records and NHS Health Check transcript data matched for the GPPAQ measurement (96.2%, n=130). Nevertheless, transcripts showed that only half of patients (48.5%, n=130) were asked all questions from GPPAQ (Annex D). Practitioners tended to focus on questions relating to recreational physical activity, and omitted questions about work-related physical activity. This may be explained by practitioners deriving a physical activity classification using other patient information, for example if the patient's occupation is already known or came up in conversation earlier in the NHS Health Check.

The transcripts of NHS Health Checks showed that results from GPPAQ were shared with 40% of attendees (n=130) and discussed in relation to recommended physical activity levels in 36% (n=130) of cases. This may be a result of practitioners feeling that they do not have sufficient time, capability or confidence to have a full conversation about a patient's activity levels.[8]

4. Conclusions

Compared with data from the national NHS Health Check data extraction, clinical record data from the RICO study showed far higher rates of alcohol and physical activity recording. However, RICO study data was gathered from a modest sample of 171 patients across 12 general practices in the West Midlands. The findings are more consistent with levels of recording across the West Midlands rather than England. Although it is also possible that the RICO study itself may have affected practitioner behaviour, increasing how thoroughly they completed each element of the check.

Despite this, the research highlights some important considerations for NHS Health Check commissioners. The variation between what is recorded and what is actually done suggests that clinical records provide a limited picture of how tools to measure alcohol consumption or physical activity are implemented. While clinical records suggest that measurement tools were fully completed, the transcripts of NHS Health Checks highlighted that tools were partially completed or not completed. There were also missed opportunities for practitioners to discuss alcohol consumption, particularly with patients who showed a positive screening from AUDIT-C. These differences may be explained by time restrictions and the administrative burden of asking all the AUDIT questions, or due to the perceived sensitivity of questions around alcohol consumption.

In terms of physical activity, there was more consistency with almost all patients' clinical records and consultation data matching for the GPPAQ measurement. However, only half of patients were asked all GPPAQ questions. This is also a missed opportunity for practitioners to highlight the importance of physical activity to potentially high-risk individuals.

In light of these findings, commissioners of NHS Health Checks should consider the possibility that what is being recorded in a patient's clinical record, may differ from what is happening in practice at their NHS Health Check. The time allocated for a NHS Health Check, as well as the capability, confidence and motivation of healthcare professionals delivering the checks, may also explain variation in what is actually being delivered.[8] Local commissioners should consider evaluating how well the alcohol and physical activity components of the NHS Health Check are being implemented in their area, and look to identify and address factors that may have an impact on ensuring tools are being used to their fullest extent.

5. Funding

The collection of data used in the Staffordshire University research project was funded by the National Institute for Health Research (NIHR) Health Technology Assessment (HTA) Programme (project number HTA – 15/170/02). The views expressed are those of

the author(s) and not necessarily those of the NHS, the NIHR or the Department of Health and Social Care.

6. References

1. Patel R, Barnard S, Thompson K, et al. Evaluation of the uptake and delivery of the NHS Health Check programme in England, using primary care data from 9.5 million people: a cross-sectional study. BMJ Open 2020;0:e042963. doi:10.1136/bmjopen-2020-042963. Available at https://bmjopen.bmj.com/content/10/11/e042963

2. Gidlow CJ, Riley V. Physical Activity and alcohol measurement in NHS Health Checks. Available at https://www.healthcheck.nhs.uk/commissioners-and-providers/evidence/

3. Gidlow, C.J., Ellis, N.J., Cowap, L., Riley, V.A., et al. Quantitative examination of video-recorded NHS Health Checks: comparison of the use of QRISK2 versus JBS3 cardiovascular risk calculators. BMJ Open 2020;10:e037790. doi:10.1136/bmjopen-2020-037790. Available at https://bmjopen.bmj.com/content/10/9/e037790

4. Gidlow CJ, Ellis NJ, Cowap L, et al. A qualitative study of cardiovascular disease risk communication in NHS Health Check using different risk calculators: protocol for the RIsk COmmunication in NHS Health Check (RICO) study. BMC Fam Pract 2019;20. doi:10.1186/s12875-018-0897-0. Available at https://bmcfampract.biomedcentral.com/articles/10.1186/s12875-018-0897-0

5. Public Health England, NHS Health Check Programme Review, Available at: https://www.gov.uk/government/publications/nhs-health-check-programme-review

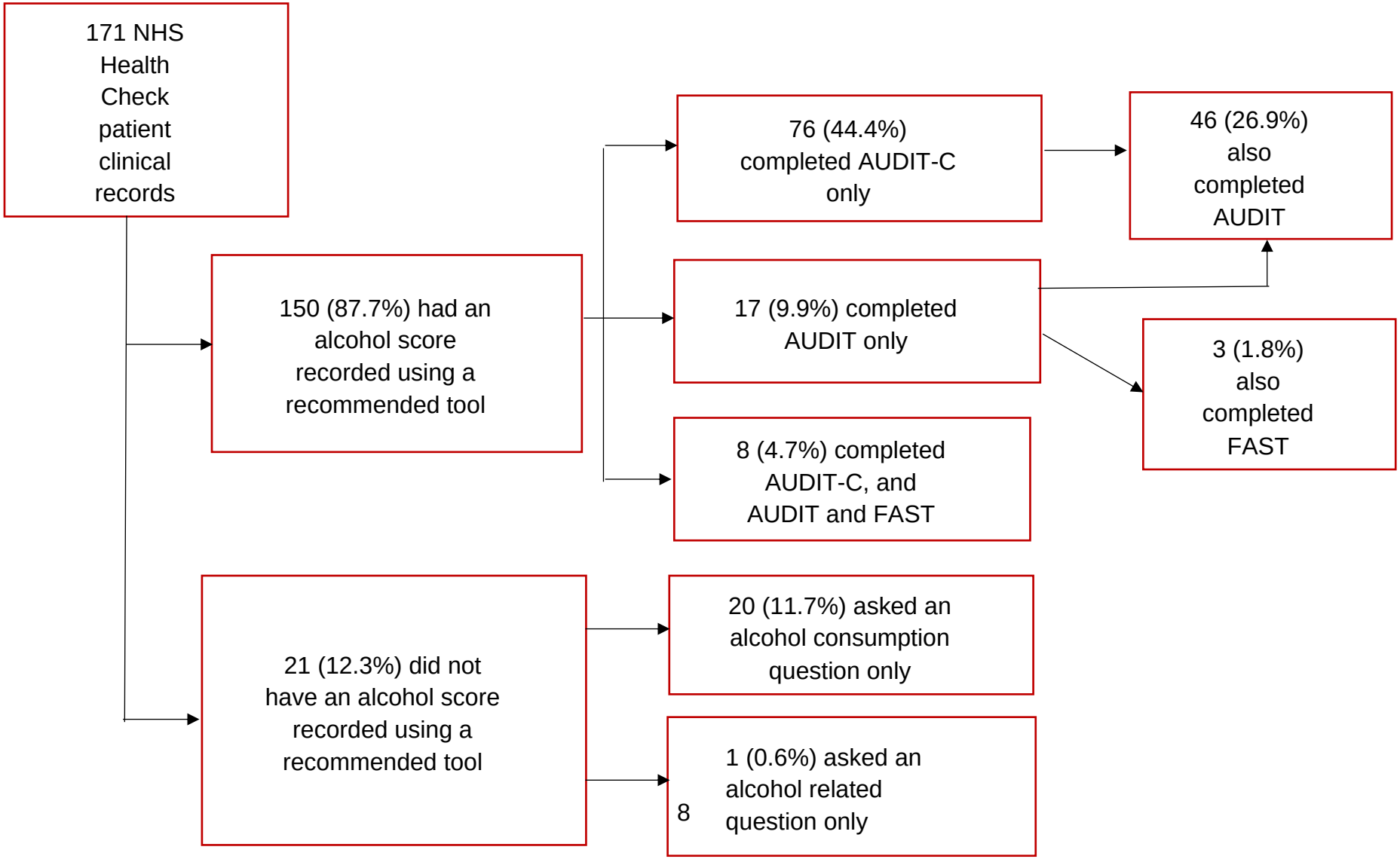
6. Public Health England, NHS Health Check Best Practice Guidance (2019) Available at https://www.healthcheck.nhs.uk/commissioners-and providers/national-guidance/

7. Public Health England, Official Statistics, NHS Health Check Programme, 2012-13 to 2017-18. Available at https://digital.nhs.uk/data-and-information/publications/statistical/nhs-health-check-programme/2012-13-to-2017-18

8. Atkins, L., Stefanidou, C., Chadborn, T. et al. Influences on NHS Health Check behaviours: a systematic review. BMC Public Health 20, 1359 (2020). https://doi.org/10.1186/s12889-020-09365-2. Available at https://bmcpublichealth.biomedcentral.com/articles/10.1186/s12889-020-09365-2

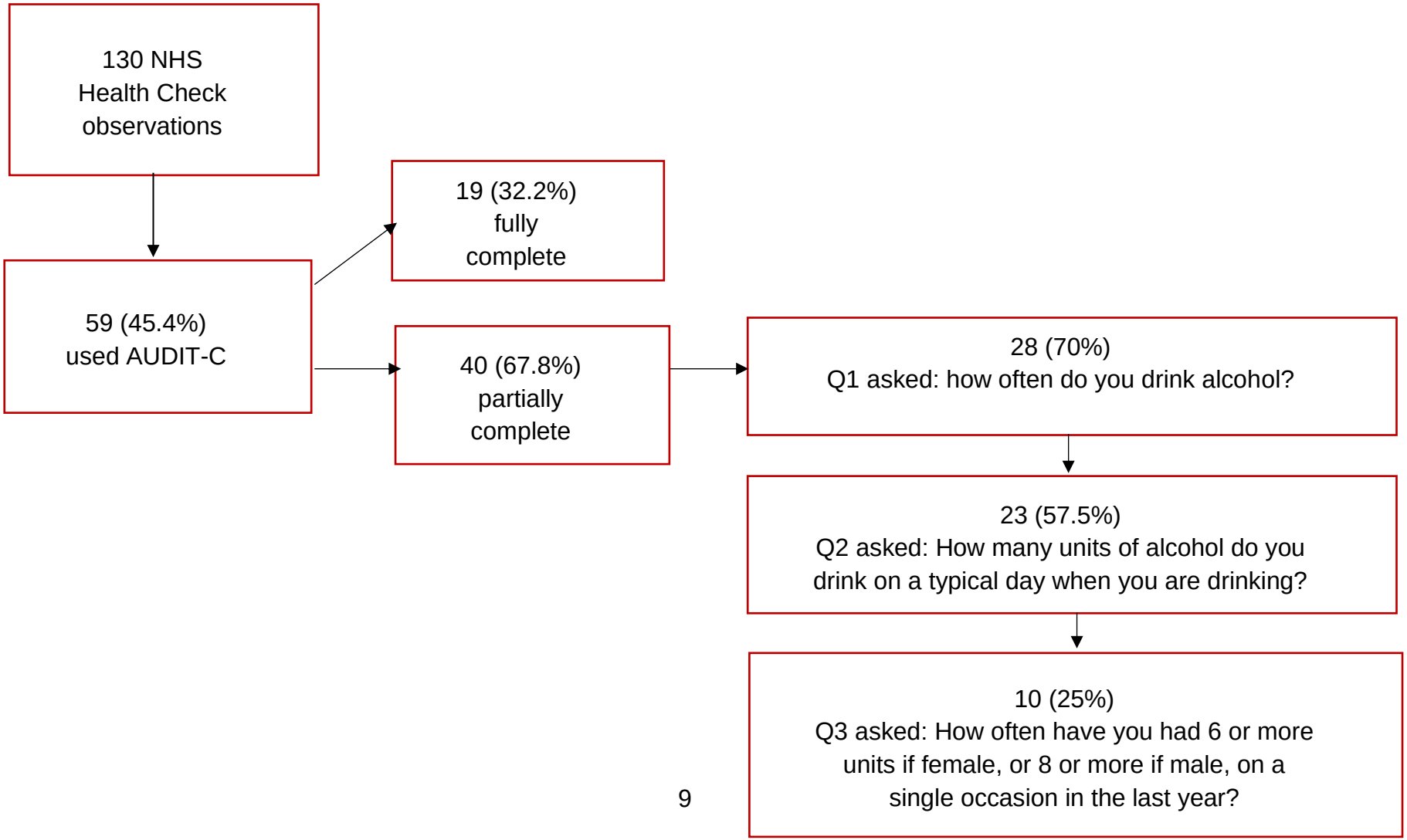
Annex A

Annex A: The proportion of patients with NHS Health Check alcohol consumption measurement coded in their clinical record.



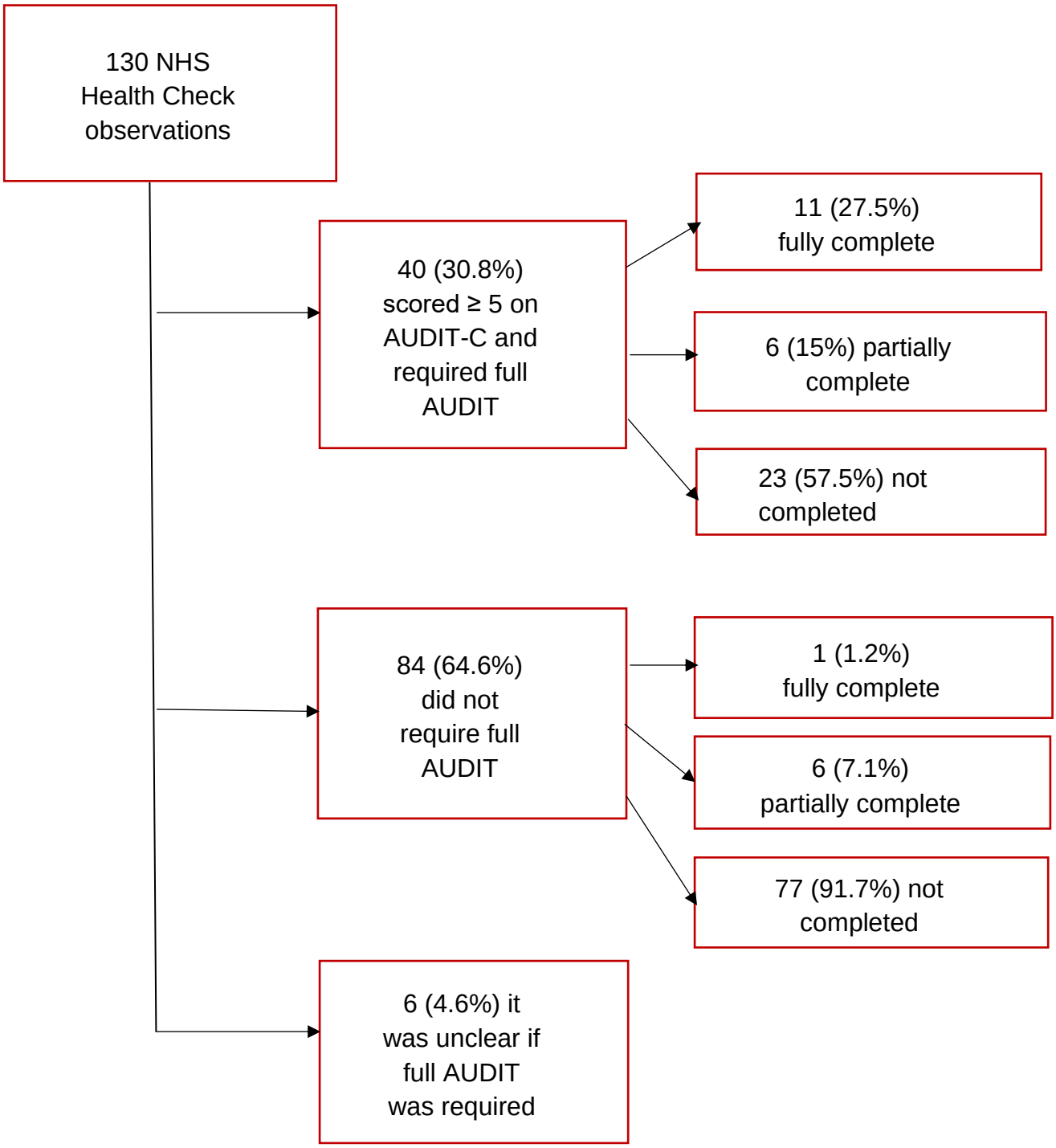
Annex B

Annex B: The proportion of patients who were measured for AUDIT-C and how this was measured based on video-recorded NHS Health Checks.



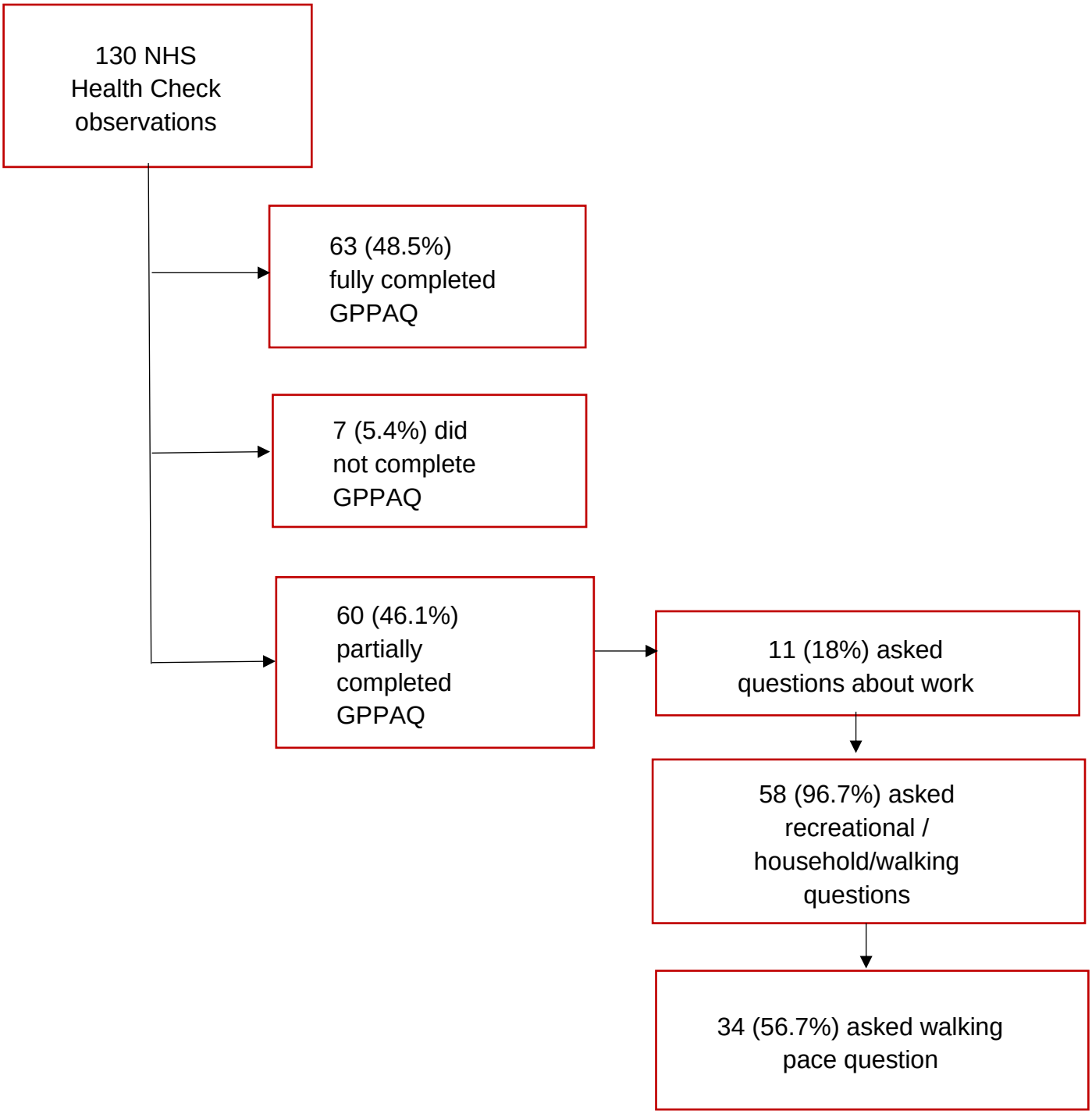
Annex C

Annex C: The proportion of patients who required AUDIT, and how patients had AUDIT measured based on video-recorded NHS Health Checks.



Annex D

Annex D: How patients GGPAQ score was measured based on video-recorded NHS Health Checks.



About Public Health England

Public Health England exists to protect and improve the nation's health and wellbeing, and reduce health inequalities. We do this through world-leading science, research, knowledge and intelligence, advocacy, partnerships and the delivery of specialist public health services. We are an executive agency of the Department of Health and Social Care, and a distinct delivery organisation with operational autonomy. We provide government, local government, the NHS, Parliament, industry and the public with evidence-based professional, scientific and delivery expertise and support.

Public Health England
Wellington House
133-155 Waterloo Road
London SE1 8UG
Tel: 020 7654 8000

www.gov.uk/phe
Twitter: @PHE_uk
www.facebook.com/PublicHealthEngland

Version 1.0

Paper prepared by Hannah Sullivan and Katherine Thompson, Cardiovascular Disease Prevention Programme, Public Health England.

Research conducted by Christopher Gidlow and Victoria Riley, Centre for Health and Development (CHAD), Staffordshire University.

Published March 2021
PHE gateway number: GW-1908

PHE supports the UN Sustainable Development Goals

SUSTAINABLE DEVELOPMENT GOALS