PROBLEMS OF HEARING

Map 23: Rate of audiology assessments undertaken per population by PCT

2010

Domain 2: Enhancing quality of life for people with long-term conditions





Context

Hearing loss affects 10.7 million adults in England, mainly people older than 60 years: 4.9 million adults have a hearing loss for which clinical management with hearing aids and appropriate environmental aids would benefit patients and their families.

The rate of audiology assessments in this indicator is for all diagnostic investigations in adults and children undertaken for the assessment of hearing loss, hearing aid provision and reviews, tinnitus and vestibular disorders. The largest proportion of assessments are referrals for age-related hearing loss. The rate of audiology assessments is a good proxy measure for the rate of hearing aid provision. Although this has risen by 2.3% per annum over the last 4 years, the gap appears to be considerable between audiology assessments and the subsequent provision of hearing aids and other restorative intervention.

Delay in identifying, diagnosing and managing hearing loss has been linked to depression, social isolation and loss of independence. More recently, it has been shown to be associated with an increased risk of developing dementia.¹ In addition, there is evidence that people with hearing loss:

- > manage other long-term conditions less well;
- > have higher levels of unemployment;
- > earn less when in employment.

Demand for services is set to rise substantially over the coming years as a result of an ageing population, lifestyle choices, such as use of MP3 players, and the support needs of returning military personnel.

Highlighting variation in the provision of audiology assessments and the rate of intervention, for example, with hearing aids should enable the commissioning of services to be more appropriately matched with improving outcomes for hearing loss in local populations in this often neglected area of sensory deprivation.

Magnitude of variation

For PCTs in England, the rate of audiology assessments undertaken per 1000 population ranged from 2.3 to 75.1 (32-fold variation). When the five PCTs with the highest rates and the five PCTs with the lowest rates are excluded, the range is 8.8–41.2 per 1000 population, and the variation is 4.7-fold variation.

As variation in the rate of performing audiology assessments is highy related to population demographics, correcting the rate for age is likely to show less variation. However, in a small number of geographical areas, there is a low rate of provision unexplained by demographics.

Options for action

Commissioners need to discuss with providers the impact of population ageing:

- to start to close the gap between met and unmet need;
- > to meet the rising need due to demographic factors, and the impact of publicity campaigns designed to increase awareness. There is considerable variation in investment in hearing services, and evidence that many people do not use the aids provided, therefore, commissioners would expect to see steps taken to increase value and productivity within the allocated resources.

This will ensure that hearing loss in local populations is appropriately diagnosed and treated in a timely manner to minimise the broader social and physical impacts of hearing loss.

To do this, commissioners need:

- To understand the current rate of assessments and local demography and estimate the gap between current provision and unmet need;
- To understand the current annual increase in assessments is 2.3% per annum and expected to rise;
- > To ensure triage and referral arrangements to support earlier management are in place;
- To understand the key quality and productivity issues for local services through the participation of those services in the planned national accreditation scheme (IQIPS).²

RESOURCES

> NHS Improvement, Audiology Improvement homepage. http://www.improvement.nhs.uk/audiology/index.html

¹ Lin FR, Metter EJ, O'Brien RJ, Resnick SM, Zonderman AB, Ferrucci L (2011) Hearing Loss and Incident Dementia. Arch Neurol 68: 214-220. doi: 10.1001/archneurol.2010.362

² Improving Quality in Physiological Diagnostic Services (IQIPS). http://www.rcplondon.ac.uk/sites/default/files/iqips-fact-sheet.pdf

PROBLEMS OF HEARING

Map 24: Mean time from referral to assessment for hearing tests in newborns by PCT

2010

Domain 2: Enhancing quality of life for people with long-term conditions





Context

Congenital deafness has a major impact on child development. There are 20,000 permanently deaf children in England, who receive services from the NHS, including genetic services, because deafness has major genetic aetiologies, social services, and education services. About £250 million is spent on paediatric audiology and related services for families and their children in a year. Early identification by the NHS Newborn Hearing Screening Programme (NHSP) greatly reduces this impact.

Through NHSP, children are referred to paediatric diagnostic audiology services if they have a poor response in either one ear or both ears at screening. The average referral rate to paediatric diagnostic audiology services is 2%: for about 0.5% of these referrals, this is because babies do not have a clear response in both ears, and for 1.5% of referrals it is because there is not a clear response in one ear.

Between 13,000 and 14,000 children are referred each year in England. As a result of audiological assessment, children are diagnosed as permanently deaf, in need of further diagnostics, or "normal" hearing. Of the 1000 children identified as deaf by the NHS NHSP in a year, 660 will have bilateral deafness, and, of those, 170 will be profoundly deaf.

The NHSP has a set of quality standards and service specifications (see "Resources"). The key performance indicator relating to referral for audiological assessment is:

"All parents of babies that refer from the screen and wish to continue should be offered an appointment that is within 4 weeks of screen completion."

This indicator focuses on the interface between the NHSP and paediatric audiology services. The data show mean time to confirmatory assessment after referral from the NHSP.

Reducing the degree of variation in the mean time from referral to assessment for hearing tests across England will reduce the level of inequity for newborns and their parents offered hearing screening.

Magnitude of variation

For PCTs in England, the mean time from referral to assessment for hearing tests in newborns ranged from

10.5 to 57.2 days (5-fold variation). When the five PCTs with the highest mean times and the five PCTs with the lowest mean times are excluded, the range is 13.3–43.6 days, and the variation is 3.3-fold.

Reasons for warranted variation include differences in the levels of risk and genetic aetiologies in different areas.

Possible reasons for unwarranted variation include differences in:

- > Capacity;
- > Prioritisation of services;
- > Arrangements for cover;
- Availability of education services staff with whom to work;
- Quality of management of audiology assessment services.

Options for action

Commissioners and providers in areas where the mean time from referral to assessment for hearing tests is 25 days or greater need to explore why the times are longer than those in the middle part of the distribution (see column chart), including looking at the interface between local screening services, paediatric audiology services and education services.

The UK National Screening Committee (NSC) has been working with the Map of Medicine® to produce pathways for all the English non-cancer screening programmes for which it has responsibility. The Map of Medicine care pathways for newborn hearing screening (including diagnostic assessment and habilitation) have now been completed, and can be localised by commissioners and providers in order to help promote standards in newborn hearing screening, including improving the time from referral to assessment (see "Resources").

RESOURCES

- > NHS Newborn Hearing Screening Programme (NHSP). Standards and Protocols. http://hearing.screening.nhs. uk/standardsandprotocols
- > NHS Newborn Hearing Screening Programme (NHSP). NHSP Map of Medicine care pathways. http://hearing.screening.nhs.uk/cms.php?folder=3788