

27 Crowe 2015). For hearing impaired adults with EAL, the clinical team also face the challenge
28 that the candidacy criterion is based on a speech perception task (BKB sentences) which
29 contains sentences with very predictive content. Adults with English as a first language
30 (E1L) are able to use higher level cognitive skills when assessed on the BKB sentences to fill
31 in missing words. This is not so straightforward when English is not the first language
32 because the linguistic rule structure may not be as sophisticated as for native speakers. There
33 may also be cultural aspects that make the sentences less relevant for some adults from
34 diverse cultural backgrounds.

35

36 **EAL deaf children: Demography**

37 Long-term immigration as well as current migration trends contribute to the wide-ranging
38 cultural and linguistic diversity in the UK. In some minority UK communities there is a
39 higher incidence of deafness (Thomas et al., 2008). In 2009, Bajaj et al found that for a
40 variety of reasons, in children of Bangladeshi origin, the prevalence of sensorineural deafness
41 was at least 2.3 times higher than the national average. In newly arrived groups, where
42 disadvantage may be greater, there is likely to be a higher rate of deafness for reasons such as
43 undiagnosed problems and untreated middle ear disease, as reported in Australia by Leigh &
44 Crowe (2015).

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46 **EAL deaf children: Languages**

47 The annual survey conducted by the Consortium for Research into Deaf Education (CRIDE)
48 shows year-on-year that there are significant numbers of EAL deaf children in the UK,
49 particularly in multicultural urban environments. In the most recent 2013 survey (CRIDE
50 2013) which specifically investigated languages, of the 37,371 deaf children for whom
51 information was available, 7.2% were reported to have a language other than English at

52 home. This could be an underestimation, however, since several services were unable to
53 provide information on the languages spoken by children in their area, leaving 7,804 children
54 for whom no information about languages was available. The numbers of EAL deaf children
55 with CI's is not routinely documented. Mahon et al (2011) showed that at one London CI
56 Centre audited over five years (2003-2008), 28% of children receiving implants were from
57 EAL families, speaking languages such as Urdu, Bengali, Gujarati, Turkish, Somali and
58 Arabic, similar to the proportions of people speaking languages other than English in London
59 at the time (DCSF 2008). The latest UK Census figures (ONS 2013) however, show a rise in
60 the number of people speaking other languages such as Polish. The challenge for professions
61 in assessing language development and skills, and in providing appropriate interventions
62 comes with the fact that many families speak variants and dialects of languages about which
63 not much is known such as Mirpuri, Sylheti, Albanian, Roma, to mention but a few.
64 The Newborn Hearing Screening Programme in the UK (NHSP n/d) applies equally to
65 children from all language groups and is a significant factor in early diagnosis and
66 intervention for every child who needs a CI. As there is no similar screening programme for
67 adults, early and appropriate access to CI services for them is less likely and proportions
68 reaching the CI clinic are far lower than for children.

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70 **EAL deaf children: Language development and use**

71 Given the multifaceted interrelationship between culture and language, coupled with the
72 additional complication of deafness, the development of spoken language in EAL deaf
73 children can seem like an impossible task. In most cases, however, the children do acquire a
74 spoken language – usually English, due to early interventions which are generally delivered
75 in English. Whilst this is necessary for progress through the UK education system, there are
76 drawbacks: EAL deaf children frequently do not acquire their family language and as they

77 grow up this can be detrimental to family relationships (Crowe et al 2013). EAL families in
78 the UK are usually bi-or multilingual, speaking their family language as well as some
79 English. The pattern of language use in the family, and the family members' proficiency in
80 the languages used, depends on numerous facts like how long they have lived in the UK,
81 where they were educated, etc. With the benefit of a CI, the EAL deaf child will be exposed
82 to all the languages used by family members, having access to direct speech and to
83 overhearing the incidental talk going on around them. This is known to benefit language
84 development (Hoff 2006). There is growing evidence that with sufficient exposure to
85 languages, EAL deaf children particularly those who have CIs, can acquire 2 spoken
86 languages (Thomas et al, 2008; McConkey Robbins et al 2004). The crucial factor is the
87 provision of appropriate language development support for the child and for the family. Such
88 support should also take into consideration the family's intentions and choice in regard to
89 their children's use of multiple languages at home and at school (Leigh et al 2010).

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91 **EAL deaf children: Language assessment**

92 The planning and execution of appropriate support and intervention is crucial, but knowledge
93 about languages and culture is not always available to professionals (Mahon et al. 2011).

94 Also lacking are the skills and tools to assess linguistically diverse deaf children and provide
95 support for families (Guiberson and Atkins 2012; Cline and Mahon 2010). There is the

96 further challenge in the lack of normative information about language development in

97 linguistically diverse children. The dearth of assessment materials in the UK in languages

98 other than English is well documented (Cattani et al 2014). This matters right from the start,

99 for example, with the assessment of an EAL deaf child's pre-linguistic skills, mentioned

100 earlier as being a key CI candidacy criterion. Frequently, pre-linguistic skills are assessed by

101 way of parental checklists using tools such as the Early Support Monitoring Protocol (DfES

102 2006) or the Children’s Communication Checklist CCC-2 (Bishop 2003). For the families of
103 EAL deaf children, these tried and tested parental report methods can be tricky and the results
104 may not be secure. For example, parental proficiency in English will influence the results if
105 the checklist has to be read and responded to in writing; if the checklist has been translated,
106 there may be concerns about validation of the translated version. Ideally, translators and
107 interpreters should be properly trained.

108 **EAL deaf children and adults: Support by professionals**

109 In the NHS England Action Plan on Hearing Loss (NHS England 2015) there is clear
110 endorsement for delivering culturally and linguistically appropriate intervention for both
111 children and for adults. The stated aims include the provision of “person-centred planning,
112 which is responsive to information and social needs” and the promotion of “inclusion and
113 participation, by ensuring that all public services are accessible and support language and
114 communication needs” (ibid p.6). The document further states that one of the outcomes
115 specifically for deaf children and young people is “support for good language
116 acquisition...for the child and their family, to facilitate effective communication” and “to
117 address the attainment gap for children and young people by ensuring appropriate language
118 acquisition, communication and learning support in the early years and throughout education”
119 (ibid p.15).

120 Ensuring that appropriate strategies are used with a diverse client group presents an enormous
121 challenge in a busy clinic setting; additional training and/or information-gathering may be
122 necessary. Firstly to ensure that access to CI is not reduced through lack of understanding
123 about the process, insight into the way the clients and their family would seek help is needed.
124 Skilled interpreters are essential to carefully explain the CI process to families so that they
125 can weigh up the pros and cons, and make the right decision for their child. Once potential
126 candidates are on board, the team needs to build ‘cultural competence’ into their

127 rehabilitation strategies, taking family attitudes about deafness and language choice into
128 account. To do this, CI teams could work with cultural advisors and/or informed members of
129 a particular family's cultural/linguistic group. The CI team must ensure that the family
130 understand and are fully cognisant about the device: good device management at home is one
131 of the key factors in the child deriving full benefit from the CI.

132 In order to level the playing field for EAL deaf people, it is not simply a case of professionals
133 treating every candidate and their family in the same way, but to treat each in an
134 appropriately different manner.

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216 feel that while raising the issues, there is no attempt to address these or to provide evidence of the

217 impact of EAL on outcomes or on decision making. Is it possible to add something about this?

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