Building a picture of health from data

With the publication of the AYPH’s new Key Data on Adolescence, Dr Ann Hagell looks at some surprising – and worrying – new trends. She also reflects back to the very first edition in 1997 to ascertain some fascinating societal changes in health, lifestyle and behaviours.

**Key Data on Adolescence (KDA)** is published every two years, drawing on publically available data relating to young people aged 10 to 24. It covers the social determinants of health, information about health behaviour and lifestyle, sexual health, mental health, physical health and long-term conditions, and use of health care services.

This autumn – supported by Public Health England (PHE) - we publish the 10th edition, 18 years after the first edition back in 1997. The picture is nuanced. There are surprising trends, worrying trends, huge success stories, and interesting comparisons to be drawn across the years. Whatever the trends, good data provides the basis for understanding young people’s specific health needs, and is the foundation for providing more appropriate, youth friendly health services.

**Most surprising trends**

Although the proportions of young people using drugs have been on the decline for many years, what we might not have anticipated back in 1997 was the concern now being expressed about the development of new forms of substance use. These include use of new psychoactive substances (legal highs). The European Monitoring Centre for Drugs and Drug Addiction identified 73 new psychoactive substances in 2012 alone (EMCDDA 2013), the largest number in any year so far. Data on use of these substances by young people are limited to date. However, risks arise from the fact that we know so little about short and long term effects, and these are largely drugs not approved for human use.

**E-cigarettes**

In addition in the new edition of KDA we noted the appearance of e-cigarettes on the scene. Estimates of the proportions of secondary school children who have tried e-cigarettes now range from one in 12 to one in five. Again the data is limited so far, and very little is known about the risks, but it is clear that e-cigarettes are being designed and marketed to attract young people. They contain nicotine, which is known to be highly addictive.

**New technologies**

We also made no mention in 1997 of media and communication activities by young people. Perhaps the biggest shifts in young people’s behaviour over recent decades relate to the use of information and communication technologies. In 2014, 88% of 16-24 year olds in the UK owned a smart phone, compared to 14% of those aged 65+ (Ofcom, 2014). New technologies bring both challenges and opportunities in relation to health promotion, and there have been tremendous developments in the design of software for phones that can help provide health advice and links to services. This will undoubtedly be an area to watch the coming years with potentially significant benefits for young people.

**Cause for concern**

In our first edition of KDA back in 1997 we reported the great concern at the time over the rates of suicide among young people because rates were rising sharply through.

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**Prevalence of mental disorders in 11-16 year olds in Great Britain, by gender, 2004**

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<thead>
<tr>
<th>Disorder</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Any disorder</td>
<td>20</td>
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<tr>
<td>Conduct disorders</td>
<td>16</td>
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<td>Emotional disorders</td>
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<td>Hyperkinetic disorders</td>
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the 1980s and early 1990s, mainly among young men. It is good to report that rates dropped in the late 1990s and early 2000s and have been fairly level since 2005.

**Self-harm**

However, what we do have now, which we didn’t back in 1997, is hospital episode statistics relating to admissions for self-harm (both through cutting and poisoning). These are not so reassuring. In 2014 there were 41,921 hospitalisations for self-harm (self poisoning and other methods) in 10-24 year olds. In the last seven years the rate per 100,000 young people in this age group for hospitalisation for self-harm rose from 330 to 367. As only a very small proportion of self-harm incidents end with a hospital admission (around 1 in 8), these figures are, arguably, just the tip of an iceberg. In the absence of good, up-to-date survey data on the prevalence of mental problems in this age group, these kinds of indicators alert us to the need for more surveillance.

**Obesity**

There is also much concern over rates of obesity. We report national data showing that one in five school pupils aged 11-15 is obese. Rates have not increased much in recent years but they are not substantially decreasing either. These rates represent a substantial proportion of the adolescent population and are a continuing cause for concern, particularly as they correlate with living in areas of deprivation. In our 2015 edition of KDA, we presented the data in the context of health behaviour and lifestyle factors, noting, for example, that young women age 11 to 18 consume 2.7 portions of fruit and vegetable daily, compared with 3 for young men and 4.1 for adults. This falls short of the recommended five-a-day.

**Encouraging progress**

In the 1990s there was much public concern over the numbers of teenage pregnancies in Britain, and in 1997 we wrote ‘…there has been much variation since 1969, and it is as yet far from clear that there will be a continuing downward trend’. In the early 1990s, the rate of conceptions in England and Wales per 1000 young women aged 15-19 stood at around 60, which was much as it had been in the late 1970s. The picture was similar in Scotland.

What a success story the reduction in these figures has been since then. In England the Government-led Teenage Pregnancy Strategy ran from 1999-2010. Under-18 conception rates fell from 45 per 1,000 in 1999 to 34 in 2010. The reduction accelerated after 2008, with further reductions down to 24.5 per 1000 women aged 15-17 by 2013. Progress has also been made in the proportions regularly smoking and drinking. When we published our first edition of KDA in 1997, rates of 16-19 year olds smoking cigarettes was already on a clear downward trajectory from the 1970s to the 1990s. This trend has continued and year-on-year rates continue to fall. Now only 8% of 15 year olds say they are regular smokers, and the proportions of young people who do not drink alcohol at all are at the highest level since these surveys began (61% of those aged 11-15). Yet we remain concerned about a small group of young people who are not following the general trend of reducing consumption; who drink more frequently, are drunk more frequently, and drink significant numbers of units of alcohol on each drinking occasion. Focusing on reducing the size of this group is a key target for health promotion in coming years.

**Ongoing need for better data**

It is absolutely critical that we get better data on mental health problems and how best to deal with them. Plotting the trends is hugely helpful in understanding where the need lies. It is also essential that we start to collect better data on the use of health services broken down by age group. Patterns of use by young people can be quite different from those for older or younger age groups. If services are to be designed to their needs, we need to know what they are.

Where we do have better data now than in 1997 is in relation to the social determinants of health and how they affect young people. We noted in 2015 that more than one tenth of those aged under 19 are living in situations of low income and material deprivation. One in eight young people under 15 live in workless households and 15% of secondary school children are eligible for free school meals. Nearly two million young people aged 10 to 19 live in the most deprived areas of England. Nearly one in five of the 19 to 24 age group is not in education, employment or training. Deprivation is linked to a range of health outcomes in addition to obesity. More analyses of the social determinants of health for this age group is extremely important as we continue to try to find ways to improve outcomes for the next generation of young people.

**At a glance demographics**

- There are 11.7 million young people aged 10 to 24, representing one fifth of the UK population.
- One in five is from an ethnic minority.
- Young people aged 10 to 19 live in 4.8 million households, mainly with married parents (60%), cohabiting parents (9%) or lone parents (25%).
- Half of those aged 20-24 are still living at home with parents.
- A total of 35,936 young people aged 11-15 had parents who divorced in 2011.
- In 2014, 2,349 young people aged 10-24 died, nearly half from external causes.
- Young men die more frequently than young women and the major cause of death in this age group is road traffic accidents.

**Further information**

To download the free, interactive PDF of Key Data on Adolescence 2015 visit http://www.youngpeopleshealth.org.uk/key-data-on-adolescence. KDA (2015) was written by the Association for Young People’s Health (www.ayph.org.uk) and was funded by the National Child and Maternal Health Intelligence Network, part of Public Health England (PHE).

**References**


European Monitoring Centre for Drugs and Alcohol Addiction (2013) New drugs in Europe 2012. Portugal: EMCDDA