

Life Expectancy in Wirral

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Introduction

Life expectancy at birth in England showed dramatic increases throughout the twentieth century as health and living conditions improved. It increased from 46 for men and 50 for women in 1900, to 79 for men and 83 for women in 2010-12.

However, increases in life expectancy have not been uniform across all social groups. Life expectancy has shown a marked increase for those in more affluent social groups, whilst for those in more deprived social groups, progress has been significantly slower.

Since the 1970's, the inequality gap in life expectancy between these groups has increased. Consequently, reducing inequalities in life expectancy has been a target for Public Health throughout the 1990's and 2000's and is now one of the over-arching indicators in the current Public Health Outcomes Framework (PHOF).

This update summarises the most recently available data (2010-12) for life expectancy in Wirral and our progress compared to England overall.

What does life expectancy at birth measure?

Life expectancy is, "an estimate of the average number of years a person...would survive if he or she experienced the particular area's age-specific mortality rates for that time period throughout the rest of his or her life" [2].

It is not the number of years a baby could *actually* expect to live, because it makes no allowance for probable future changes in death rates (i.e people living longer) and people moving away from the area in which they were born.

Life expectancy is a measure calculated using age-specific mortality rates. In other words, when we assess the life expectancy for an area, we are really assessing the mortality of that area in a standardised way which can be monitored and compared over time. Life tables are used to calculate life expectancy at birth using the Chiang methodology. For more information on how life expectancy is calculated, please see the section on Life Expectancy on the Office for National Statistics website.

Current data for Wirral by gender

In 2010-12, life expectancy in Wirral was 77.9 for men and 81.9 for women, compared to 79.2 years for men and 83.0 years for women in England (see **Figure 1** below).



Life Expectancy in England & Wirral, 1995 to 2012, by gender 84 82 Life Expectancy at birth (years) 80 78 76 74 72 70 1995-97 1996-98 1997-99 1998-00 1999-01 2000-02 2001-03 2002-04 2003-05 2004-06 2005-07 2006-08 2007-09 2008-10 2009-11 2010-12 Males England 74.6 74.8 75.1 75.4 75.7 76.0 76.2 76.5 76.9 77.3 77.6 77.9 78.2 78.5 78.9 79.2 73.1 73.5 73.8 73.9 74.3 74.9 75.2 75.4 75.6 75.8 75.9 76.2 76.6 77.3 77.6 77.9 Males Wirral 79.7 79.8 80 80.2 80.4 80.7 80.9 81.1 81.5 81.8 82.0 82.3 82.5 82.9 83.0 Females England 80.7 Females Wirral 79 78.8 79 79.2 79.7 79.9 80.0 80.2 80.3 80.8 81.0 81.0 81.0 81.0 81.7 81.9

Figure 1: Life Expectancy at birth, Wirral and England, 1995-2012, by gender (3 years pooled)

Source: ONS, (www.statistics.gov.uk)

Figure 1 show that life expectancy in Wirral has improved consistently since 1995 for both genders. The rate of improvement has been slightly faster for men however, with an increase of 4.8 years during the period, compared to an increase of 2.9 years for women.

This means that the gap between men and women is slowly closing, a trend which is also apparent nationally. The gap between male and female life expectancy in 1995-97 was 5.1 years in England and 5.9 years in Wirral. In 2010-12, the gap between men and women was just 3.8 years in England and 2.0 years in Wirral.

The gap between England and Wirral has fluctuated during the period, appearing to be narrowing in the early 2000's. Currently however, life expectancy in Wirral remains below that of England for both men and women.



Life expectancy by Wirral Ward

In order to produce figures which are reasonably robust for areas smaller than Wirral overall, it is necessary to aggregate data from five years (as opposed to the more usual three years).

This is because the number of deaths in each Wirral ward is fairly small per annum, so using just three years data would make the data unreliable. This would also be the case if the figures were split by gender. Again, this would mean much smaller numbers, which would mean the figures would be much less likely to be reliable.

Life expectancy figures have been produced by <u>Public Health England (for 2006-10)</u> which do show life expectancy for small areas (MSOAs, which are smaller again than wards) split by gender, but it should be noted that the confidence intervals are large (around 2 years).

In order to produce life expectancy figures which are less uncertain, deaths for Wirral have been aggregated for the five years 2007-11 to produce life expectancy figures for Wirral ward for all persons.

Even with five years aggregated, the 95% confidence limits* are wider than is the case when looking at Wirral overall figures (but are less than one year, see **Table 1**).

Table 1: Life expectancy by Wirral ward, 2007-11 (95% Confidence Limits, 5 years pooled)

Ward	Constituency	Life Expectancy at birth (Years)	LCL	UCL
Rock Ferry	Birkenhead	74.1	73.2	75.1
Bidston & St James	Birkenhead	74.7	73.7	75.7
Birkenhead & Tranmere	Birkenhead	74.8	73.7	75.9
Seacombe	Wallasey	76.4	75.3	77.5
Moreton West & Saughall Massie	Wallasey	76.8	75.9	77.6
Bromborough	Wirral South	76.9	75.8	77.9
Eastham	Wirral South	77.4	76.5	78.3
Upton	West Wirral	77.7	76.7	78.7
New Brighton	Wallasey	77.7	76.8	78.7
Leasowe & Moreton East	Wallasey	78.6	77.6	79.6
Liscard	Wallasey	78.6	77.6	79.6
Claughton	Birkenhead	79.1	78.3	79.9
Bebington	Wirral South	80.1	79.2	81.0
Clatterbridge	Wirral South	80.1	79.2	81.0
Hoylake & Meols	West Wirral	80.3	79.4	81.3
Prenton	Birkenhead	80.8	79.8	81.7
Wallasey	Wallasey	81.7	80.7	82.8
Oxton	Birkenhead	82.6	81.7	83.5
West Kirby & Thurstaston	West Wirral	82.7	81.8	83.7
Pensby & Thingwall	West Wirral	82.9	81.9	83.9
Greasby, Frankby & Irby	West Wirral	84.0	82.9	85.0
Heswall	Wirral South	84.4	83.6	85.2

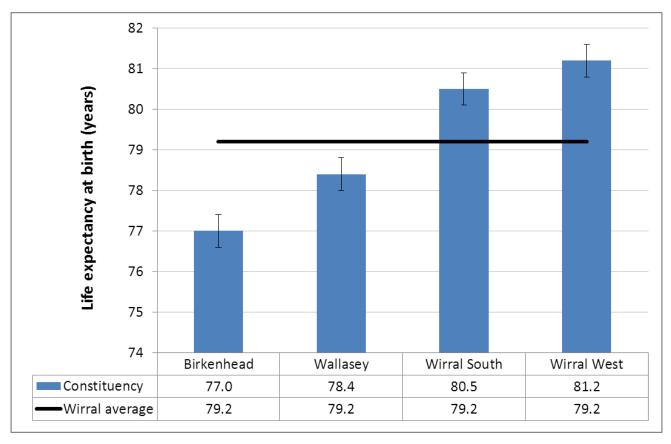
^{*}Confidence Intervals or limits indicate how accurate a value really is. Wide confidence intervals indicate a lack of certainty, whereas narrow confidence intervals indicate more precise estimates. It is most commonly expressed as '95%Cl', which means we are 95% confident that the true figure lies within the two values.



As **Table 1** shows, there is significant variation in life expectancy between wards in Wirral. There is a variation of over 10 years between Rock Ferry ward (74.1 years) and Heswall ward (84.4 years).

Life expectancy by constituency in Wirral is shown in **Figure 2** below.

Figure 2: Life Expectancy at birth (95% Confidence Limits) by Wirral Constituency, 2007-11 (5 years pooled)



As Figure 3 shows, in 2007-11, Birkenhead had the lowest life expectancy of the four Wirral constituencies, Wirral West had the highest.

Key points

- Figures from 2010-12 show that life expectancy continued to increase in Wirral
- England also continued to improve however, so the gap between England and Wirral remained
- The gap between men and women is narrowing however, this is a trend which is apparent nationally, as well as locally
- Life expectancy calculations for Wirral wards indicated that inequalities in life expectancy remain. There was around a 10 year difference in life expectancy between certain Wirral wards for 2007-11
- Birkenhead had the lowest life expectancy of the four Wirral parliamentary constituencies in 2007-11, Wirral West had the highest