About the Chartered Institute of Environmental Health (CIEH)

CIEH is the professional voice for environmental health representing over 7,000 members, working in the public, private and third sectors, in 52 countries around the world. It ensures the highest standards of professional competence in its members, in the belief that through environmental health action people’s health can be improved.

Environmental health has an important, and unique, contribution to make to improving public health and reducing health inequalities. CIEH campaigns to ensure that government policy addresses the needs of communities and business in achieving and maintaining improvements to health and health protection.

October 2020
Background

Noise, meaning unwanted or harmful sound, has a significant impact on the well-being of citizens.

According to the National Survey for Wales 2017-18, 24% of people are regularly bothered by noise from outside their homes. Of these:

- 36% are regularly bothered by neighbours inside their homes;
- 47% by neighbours outside their homes; and
- 45% by traffic, businesses, or factories.

People who live in urban areas are more likely to be bothered by noise than those who live in rural areas. People are more likely to be bothered by noise if they live in social housing or rent privately as opposed to owning their own home. Those who live in flats, particularly converted flats, are more likely to be bothered by noise than those who live in detached or semi-detached homes, and people are more likely to be bothered by noise if they live in materially deprived households or in deprived areas. People who own their own property are more likely to be regularly bothered by noise from traffic, businesses or factories than people living in social housing, but people living in social housing are more likely to be bothered by noise from their neighbours.

Local authorities play a key role in controlling noise and it is largely Environmental Health Practitioners (EHPs) who undertake this work. The Environmental Protection Act 1990 places a duty on local authorities to investigate noise complaints. They consider the type of noise, how loud it is, and how often and what time it occurs. If they are satisfied the noise amounts to a statutory nuisance, or is likely to occur or recur, they must issue an abatement notice, prohibiting or restricting its occurrence or recurrence.

Many noise complaints are resolved informally, without the need for formal enforcement action by the local authority. For noise to be considered a statutory nuisance, it must ‘unreasonably and substantially interfere with the use or enjoyment of a home or other premises’ or ‘injure health or be likely to injure health’. Failure to comply with a noise abatement notice may result in prosecution and unlimited fine, with further fines for each day the notice is not complied with.

Further powers are available to local authorities to deal with noise:

- The Noise Act 1996 aims to deal with excessive night noise from licensed premises or residential dwellings between 11pm and 7am. Officers may enter premises where there is noise beyond prescribed levels, and remove noise making equipment.
- The Control of Pollution Act 1974 enables local authorities to control noise from loudspeakers before 8am and after 9pm and from ice-cream van chimes after 7pm or before midday, or any time they cause annoyance.
- The Anti-social Behaviour, Crime and Policing Act 2014 provides further noise powers, including civil injunctions, community protection notices and public spaces protection orders.
- The Control of Pollution Act 1974 enables local authorities to deal with construction noise by placing restrictions on working hours and the type of machinery used.
- The Clean Neighbourhoods and Environment Act 2005 enables local authorities to designate alarm notification areas to deal with noise from intruder alarms. In these areas anyone with an intruder alarm must nominate a key holder and notify the local authority. The Act also provides powers of entry for alarms to be silenced if the noise is causing or likely to cause annoyance to people working or living nearby.

Local authorities also take preventative measures to control noise, for example, through planning and licensing controls.
The Welsh Government recognises that creating healthy acoustic environments is more than simply the absence of unwanted sound, and that noise management must have a broader focus than simply clamping down on the decibels. They have set out their commitment to creating appropriate soundscapes, meaning the right acoustic environment in the right time and place. The Noise and Soundscape Action Plan 2018-2023 is the central noise policy document in Wales. It states the Welsh Government’s expectation that public bodies subject to the Well-being of Future Generations Act should follow the five ways of working in that Act when carrying out noise and soundscape management. This means:

- Pursuing long-term, enduring solutions to any existing instances of noise nuisance;
- Seeking to manage noise and soundscapes at the same time as achieving other, related outcomes;
- Taking opportunities to talk to the public about the challenges associated with exposure to noise and unhealthy soundscapes, listen to their concerns and seek their views on potential solutions and their involvement in delivering them;
- Working actively with internal and external partners to mutual benefit in the delivery of desired outcomes; and
- Keeping exposure to noise (that is, unwanted or harmful sound) as low as reasonably practicable across the whole of the population, looking out in particular for areas where noise levels might qualify as a statutory nuisance or noise action planning priority area, or where public amenity might be adversely affected by noise at some point in the future, and acting pre-emptively to prevent those things from happening.

Health effects of noise

The negative impact of noise on people mostly takes the forms of annoyance and sleep disturbance. Sleep disturbance is one of the most harmful effects of environmental noise exposure. Sufficient undisturbed sleep is necessary for daytime alertness and performance, quality of life, and health. The short-term effects of noise-induced sleep disturbance include impaired mood, increased daytime sleepiness and impaired cognitive performance.

Environmental noise has been ranked by the World Health Organization (WHO) as the second biggest environmental contributor to the burden of disease in Europe after air pollution, and in 2011 they published Burden of disease from environmental noise: Quantification of healthy life years lost in Europe. The report estimates that at least one million healthy life years are lost every year from environmental noise in the western part of Europe. In Wales, noise maps produced by the Welsh Government suggest that the homes of more than 200,000 people are exposed to road traffic noise levels exceeding the WHO’s 2009 night noise guidelines.

Aircraft noise is linked to an increased risk of cardiovascular disease, including stroke and diabetes mellitus, and to an increased risk of hospital admission and mortality. There is also evidence that road traffic noise is linked to an increased risk of hypertension and a small but consistent risk of coronary heart disease. However, it should be noted that EHPs do not have powers to deal with complaints about aircraft or road traffic noise. They refer these complaints to the appropriate authorities.

With 24% of people in Wales reporting that they are regularly bothered by noise from outside their homes, some groups are more sensitive and vulnerable to noise, including chronically ill and elderly people, children and nightshift workers. Low income households, including those in student accommodation, are also more vulnerable as inadequate housing conditions are associated with increased risk factors for noise.

The Chief Medical Officer for Wales’ annual report 2016/17 highlights local noise pollution as an environmental health inequality and states that investment in environmental public health surveillance can help to shape priorities for future action and facilitate joined-up working to protect and improve the health of current and future generations.
About the survey

The CIEH Noise survey provides the only source of data on the vital contribution made by EHPs working to resolve noise complaints in England and Wales. CIEH has been running its noise survey since 2000. * Northern Ireland and Scotland have separate arrangements in place to quantify the demand for local authority noise services.

Methodology

The 2018/19 CIEH Noise Survey collected data from local authorities in England and Wales. All 22 local authorities in Wales responded to the survey, a response rate of 100%.

Data collected from local authorities included:

- The total number of noise complaints received
- The total number of notices served
- Staffing levels for noise related work
- The total number of prosecutions
- Breakdown of the sources of noise complaints by sector

This report presents the findings for Wales. The findings for England were published separately and are available here.

* We did not collect data for the years 2016/17 and 2017/18 as we worked to improve the method of data collection.
Key findings

These figures represent data from all 22 local authorities in Wales for the year 2018/19. It should be noted that one local authority, Newport City Council, provided partial data due to changes in the way noise complaints were recorded during the year.

- In total 18,567 noise complaints were recorded, 59 complaints for every 10,000 population
- The number of noise complaints ranged from 13 per 10,000 population in Anglesey to 122 per 10,000 population in Swansea
- 446 notices were served by local authorities, 1.4 for every 10,000 people
- There were 23 noise-related prosecutions
- The number of staff allocated to noise varied. Several local authorities reported difficulties providing the number of FTEs as staff typically carried out other work in addition to noise investigations.

* Partial data. Full years data not available.
Table of results

<table>
<thead>
<tr>
<th>Local authority</th>
<th>Total population (Mid-year estimate 2018)</th>
<th>Total number of noise complaints</th>
<th>Number of noise complaints per 10,000 population</th>
<th>Number noise notices served</th>
<th>Number prosecutions related to noise</th>
<th>Full Time Equivalent (FTE) staff working on noise and nuisance</th>
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<tr>
<td>Anglesey</td>
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<td>1434</td>
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<td>35</td>
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<tr>
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<td>3615</td>
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<td>188</td>
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<td>10</td>
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<tr>
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<td>4</td>
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<td>0</td>
<td>0</td>
<td>8 (amongst other duties)</td>
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<td>485</td>
<td>41</td>
<td>16</td>
<td>1</td>
<td>4</td>
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<td>42</td>
<td>8</td>
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<td>2 – 2.5</td>
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<tr>
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<td>0.3</td>
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<tr>
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<td>40</td>
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<td>0</td>
<td>5.6 (part of role)</td>
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<tr>
<td>Neath Port Talbot</td>
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<td>822</td>
<td>58</td>
<td>13</td>
<td>2</td>
<td>1 – 2 (difficult to give an exact number as officers do not solely deal with nuisance; they cover a wide range of functions)</td>
</tr>
<tr>
<td>Newport</td>
<td>153,302</td>
<td>467*</td>
<td>30</td>
<td>30</td>
<td>0</td>
<td>2.5</td>
</tr>
<tr>
<td>Local authority</td>
<td>Total population (Mid-year estimate 2018)</td>
<td>Total number of noise complaints</td>
<td>Number of noise complaints per 10,000 population</td>
<td>Number noise notices served</td>
<td>Number prosecutions related to noise</td>
<td>Full Time Equivalent (FTE) staff working on noise and nuisance</td>
</tr>
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<td>--------------------------</td>
<td>-------------------------------------------</td>
<td>---------------------------------</td>
<td>-----------------------------------------------</td>
<td>-----------------------------</td>
<td>-------------------------------------</td>
<td>---------------------------------------------------------------</td>
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<td>540</td>
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<td>6</td>
<td>0</td>
<td>11.3</td>
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<td>35</td>
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<td>0</td>
<td>5</td>
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<tr>
<td>Rhondda Cynon Taf</td>
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<td>56</td>
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<td>0</td>
<td>4.7</td>
</tr>
<tr>
<td>Swansea</td>
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<td>3003</td>
<td>122</td>
<td>70</td>
<td>17</td>
<td>6</td>
</tr>
<tr>
<td>Torfaen</td>
<td>93,049</td>
<td>326</td>
<td>35</td>
<td>4</td>
<td>0</td>
<td>1</td>
</tr>
<tr>
<td>Vale of Glamorgan</td>
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<td>677</td>
<td>51</td>
<td>9</td>
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<tr>
<td>Wrexham</td>
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<td>41</td>
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<td>Wales</td>
<td>3,138,631</td>
<td>18,567</td>
<td>446</td>
<td>23</td>
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<td></td>
</tr>
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</table>

* Partial data. Full years data not available.
Sector breakdown

We asked local authorities to indicate the source of noise complaints received by sector. Thirteen local authorities provided this information.

![Pie chart showing sector breakdown]

- **Residential**: 66%
- **Other**: 19%
- **Commercial or leisure**: 9%
- **Construction site**: 4%
- **Industrial**: 2%

*Fig. 2: Source of noise complaint by sector.*
Noise from residential premises accounts for the largest proportion of noise complaints. This is the case across all local authorities.

Industrial noise accounts for the lowest proportion of noise complaints compared to other sectors. This is the case in all local authorities except Flintshire, Gwynedd, Anglesey, Pembrokeshire and Rhondda Cynon Taf where construction noise accounted for the lowest proportion of complaints.

Other sources of noise complaints recorded by local authorities included noise in the street, vehicles, machinery and equipment, traffic and aircraft noise.

<table>
<thead>
<tr>
<th>Local authority</th>
<th>Industrial premises</th>
<th>Commercial or leisure premises</th>
<th>Residential premises</th>
<th>Construction sites</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>Blaenau Gwent</td>
<td>1</td>
<td>49</td>
<td>299</td>
<td>5</td>
<td>24</td>
</tr>
<tr>
<td>Bridgend</td>
<td>6</td>
<td>10</td>
<td>960</td>
<td>60</td>
<td>73</td>
</tr>
<tr>
<td>Caerphilly</td>
<td>34</td>
<td>198</td>
<td>562</td>
<td>67</td>
<td>467</td>
</tr>
<tr>
<td>Swansea</td>
<td>28</td>
<td>47</td>
<td>1935</td>
<td>98</td>
<td>895</td>
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<tr>
<td>Conwy</td>
<td>3</td>
<td>32</td>
<td>250</td>
<td>11</td>
<td>89</td>
</tr>
<tr>
<td>Flintshire</td>
<td>10</td>
<td>25</td>
<td>398</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td>Gwynedd</td>
<td>21</td>
<td>78</td>
<td>207</td>
<td>16</td>
<td>57</td>
</tr>
<tr>
<td>Anglesey</td>
<td>3</td>
<td>2</td>
<td>48</td>
<td>2</td>
<td>34</td>
</tr>
<tr>
<td>Monmouthshire</td>
<td>8</td>
<td>66</td>
<td>223</td>
<td>27</td>
<td>50</td>
</tr>
<tr>
<td>Newport*</td>
<td>13</td>
<td>227</td>
<td>227</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Pembrokeshire</td>
<td>32</td>
<td>55</td>
<td>325</td>
<td>25</td>
<td>103</td>
</tr>
<tr>
<td>Rhondda Cynon Taf</td>
<td>49</td>
<td>100</td>
<td>1061</td>
<td>40</td>
<td>92</td>
</tr>
<tr>
<td>Torfaen</td>
<td>8</td>
<td>29</td>
<td>264</td>
<td>11</td>
<td>14</td>
</tr>
<tr>
<td>Total</td>
<td>216</td>
<td>918</td>
<td>6759</td>
<td>365</td>
<td>1898</td>
</tr>
</tbody>
</table>

* Partial data. Full years data not available.
References

1. National Survey for Wales April 2017 to March 2019
2. Environmental Protection Act 1990
4. Control of Pollution Act 1974
6. Clean Neighbourhoods and Environment Act 2005
Appendix

List of participating authorities:

Blaenau Gwent County Borough Council
Bridgend County Borough Council
Caerphilly County Borough Council
Carmarthenshire County Council
Ceredigion County Council
City and County of Swansea
City of Cardiff Council
Conwy County Borough Council
Denbighshire County Council
Flintshire County Council
Gwynedd Council
Isle of Anglesey County Council
Merthyr Tydfil County Borough Council
Monmouthshire County Council
Neath Port Talbot Council
Newport City Council
Pembrokeshire County Council
Powys County Council
Rhondda Cynon Taf County Borough Council
Torfaen County Borough Council
Vale of Glamorgan Council
Wrexham County Borough Council