

# Clean Air Zone Framework for Wales

## Summary

EU legislation, backed up by a High Court ruling in January 2018, requires the UK government, Welsh government and local authorities to produce plans to reduce air pollution to below legal limits in 'the shortest possible time'.

The UK government's own evidence states that charging clean air zones (CAZs) are the most effective way to achieve this goal. This is where certain pre-defined vehicles are charged to or prohibited from entering a certain area. In contrast, non-charging CAZs contain a package of measures to reduce air pollution but fail to effectively tackle pollution from motor vehicles, which produce most of the harmful pollution we breathe.

The Welsh government is therefore now consulting on a Framework of options and requirements for local authorities in Wales seeking to implement a CAZ.

**Living Streets expects to see charging CAZs presented as the first option for local authorities to implement to reduce air pollution, and for the Welsh government to require effective measures to support the CAZ to encourage modeshift towards walking, cycling and public transport. This includes ring-fencing surplus CAZ revenues for investment in active travel and public transport, which is both popular with the public and proven to be effective at tackling emissions.**

**Active travel and its public health benefits should be given greater prominence within the Framework, as switching car journeys to walking and cycling produces far more health benefits than encouraging electric vehicle take up.**

**Measures to encouraging more walking should take priority throughout the development of CAZs, and infrastructure that supports electric vehicles should never come at the expense of people walking.**

**Living Streets strongly opposes any proposal to remove traffic calming measures, as there is no evidence that this improves the flow of traffic sufficiently to reduce air pollution, but it does make streets more hostile and dangerous for people walking.**



## Detailed Responses

### **Question 1 - Do you agree that CAZs would provide an effective way of addressing air quality challenges in Wales?**

Yes. The government's own evidence, as stated within the consultation documents, states that charging clean air zones are the most effective way to reduce pollution to legal levels in 'the shortest time possible'. Additional benefits include the potential for revenue-raising to invest in walking, cycling and public transport, and the health benefits associated with modeshift away from driving, all of which support progress in line with the Wellbeing of Future Generations Act.

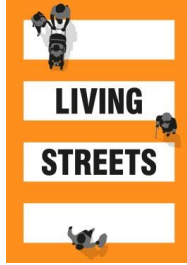
However, we are concerned that the Framework merely sets out a plan to create another plan. Furthermore, the lack of measurable targets will fail to galvanise shared action towards a specific goal. This means that Wales is at serious risk of failing to reduce air pollution in the shortest possible time. We expect to see detailed, evidence based and target driven plans for CAZ introduction as soon as possible.

### **Question 2 - Should Welsh Government direct local authorities to introduce a Clean Air Zone, and, if so, under what circumstances should it do so?**

Yes. Local authorities covering urban areas with illegal levels of air pollution should be directed to introduce charging clean air zones and to use the revenues to fund suitable alternatives for travelling everyday journeys in healthy, active and sustainable ways. This is in line with the obligation under the Directive for the Welsh government to take steps towards reducing air pollution as quickly as possible. Failing to direct local authorities to introduce charging clean air zones leaves open the likelihood that other solutions may be taken, for example based on a feasibility test, that will not make sufficiently quick progress towards tackling air pollution. Furthermore, requiring local authorities to use the revenues to fund walking, cycling and public transport supports modeshift and ensures that a charging clean air zone does not disproportionately disadvantage communities who need to travel but cannot afford a charge.

### **Question 3 - Do you consider the options/advice at section 5 to be suitable and effective elements of a CAZ?**

Most of the options/advice in section 5 are suitable and effective elements of a CAZ. Whilst we broadly agree with the measures more emphasis needs to be placed on creating modal shift by enabling alternatives to car travel such as walking, cycling and public transport. In addition, more



emphasis should be made on the use of a Clean Air Zone Framework to achieve improvements in public health. Below we have highlighted the priority areas and issues for consideration.

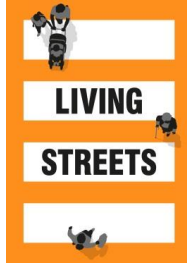
Most significantly, we strongly disagree with the suggestion of removing speed bumps, even where it is judged to be safe, and the reference to removing these should be removed. The evidence that removing speed bumps will reduce air pollution is very weak. In fact, guidelines from NICE – the National Institute For Health and Clinical Excellence – released in June last year says the evidence does not back up removing speed bumps to lower air pollution. There is no evidence to suggest this would reduce air pollution on the most polluting roads and such interventions would discourage walking and modal shift as safety would be reduced on the roads most suited to shorter walking journeys.

Air pollution hotspots arise from high volumes of traffic, not traffic-calmed neighbourhoods. Low traffic neighbourhoods', where through motor vehicle traffic has been reduced or removed through 'modal filters', are low cost and can have an immediate impact on the air quality of local streets, as well as encouraging more people to walk and cycle.

Living Streets agrees that traffic calming should promote steady speeds, however evidence shows that 20mph speed limits, complemented by traffic calming measures, is the best way to ensure steady speeds and minimise fuel consumption in urban areas ([http://www.theaa.com/public\\_affairs/news/20mph-roads-emissions.html](http://www.theaa.com/public_affairs/news/20mph-roads-emissions.html)). This is due to limited acceleration and bunching at junctions. It should be emphasised within the Framework that CAZs should have 20mph speed limits as default in urban areas, complemented by traffic calming measures, to reduce emissions and encourage modeshift.

In line with the Active Travel (Wales) Act 2013, Living Streets would expect the Welsh government to require, as opposed to simply recommend, that surplus revenue is directed towards walking, cycling and public transport. This requirement will help ensure that the CAZs implemented are the most effective possible, by maximising modeshift, and as noted guaranteeing this use of revenues boosts public support for road pricing. Polling from Ipsos Mori shows that using road pricing revenues to fund public transport is clearly popular with residents. They recorded a baseline level of support for 'road pricing' (congestion charging, and clean air zones are examples) at around 40%. But, when it was guaranteed that revenues will be invested in public transport, the balance swung to 60% in favour. ([https://www.ipsos.com/sites/default/files/publication/1970-01/sri\\_transport\\_road\\_pricing\\_at\\_the\\_crossroads\\_102007.pdf](https://www.ipsos.com/sites/default/files/publication/1970-01/sri_transport_road_pricing_at_the_crossroads_102007.pdf))

Living Streets would expect to see incentives for travelling actively and by public transport prioritised above incentives to switch to ULEVs. For example, a targeted diesel scrappage scheme particularly to lower income drivers and small businesses could offer a vehicle exchange in return for free public transport season tickets or e- bike purchase loan. Furthermore, any incentives encouraging ULEV uptake should never come at the expense of people walking:

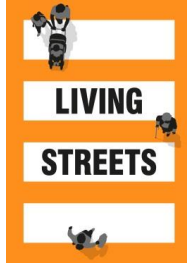


- Charging infrastructure should never be placed on the footway, as this restricts clearance and is dangerous particularly for wheelchair users or families with pushchairs, who may be forced into the road.
- Restricted parking and loading bays should be provided using space from the road, not the footway, to preserve pedestrian comfort space.
- Restricted traffic lanes for ULEVs should not take space from the footway or from bus lanes, as this will reduce bus reliability, which in turn could affect bus ridership and revenues for the council. Furthermore, adding traffic to lanes directly next to the footway will make the walking environment less safe and more hostile, increasing chances of a collision and discouraging walking.
- We strongly oppose any suggestion of opening up pedestrianised roads to ULEVs. This would send the message that walking is not a priority in Wales, and is fundamentally against the spirit of the Active Travel (Wales) Act 2013. Furthermore, as ULEVs become more widespread, these streets will become more congested and hostile for people walking and cycling, as well as cause more fine particulate pollution, released by wear and tear of brakes and tyres.
- There must be a default ban on all vehicles parking on the footway, as this deters people walking and is a safety hazard for wheelchair users, blind people and families with pushchairs in particular. Minimum recommended footway clearance is 2m, according to Pedestrian Comfort Guidance, but note this is a minimum and in high foot traffic areas the clearance will need to be higher in order to avoid pavement overcrowding.

Local authorities can also support schools to incentivise active travel to school through initiatives such as WOW – the year-round walk to school challenge – which leads to a 23% modeshift towards walking to school and a corresponding drop in cars at the school gates (<https://www.livingstreets.org.uk/what-we-do/projects/wow>).

Living Streets strongly supports the recognition that promoting public transport take up is vital in improving air quality and increasing the number of active travel stages. We would encourage the Welsh government to consider introducing a smart ticketing system across Wales or across urban areas to act as a trip generator by making public transport more convenient and attractive. Preserving and building dedicated bus lanes for buses and emergency vehicles only will be key factor in promoting public transport in Wales, both in areas with a CAZ and areas without. Travel to school will also be a key element of reducing air pollution in urban areas, and Living Streets strongly supports moves to enable more children to walk to school. Our recent report, [‘Swap the School Run for a School Walk’](#), contains recommendations for how schools and local authorities can work together to transform the school walk for every child.

Living Streets supports the proposal to consider charging workplaces for parking provision to fund walking, cycling and public transport (a ‘workplace parking levy or WPL’), and would recommend this proposal be given greater significance and weight in the Framework. The evidence is clear that



workplace parking levies are a highly effective method of improving local air quality and encouraging more people to commute actively. Nottingham City Council has introduced a WPL which during the next period will mean employers will pay £402 per place per year if they have 11 or more employee parking space. The WPL generates around £9m per year from more than 24,800 registered parking spaces, with only 5% of that going towards the cost of running the scheme. The rest is ringfenced for investment in public transport, including the highly successful tram scheme, extending the bus and rail network, and investing in electric buses. This has been successful at reducing air pollution, encouraging mode-shift, and funding public transport improvements. (<http://www.nottinghamcity.gov.uk/transport-parking-and-streets/parking-and-permits/workplace-parking-levy/>)

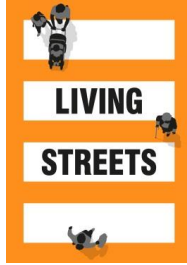
Evidence from the WWF says that 40% of journeys to work in Nottingham are now by public transport, far above the England average of 19% (National Travel Survey), and there has been a 33% fall in carbon since 2005, of which 13% can be attributed to the WPL. (<https://www.wwf.org.uk/sites/default/files/2016-12/nottingham%20case%20study%20-%20Workplace%20parking%20levy.pdf>)

#### **Question 4 - Do you agree that the minimum emissions standards outlined in Annex 2 of the CAZ Framework should be applied to determine road vehicle access in Welsh CAZs, and that these standards should be tightened over time in order to apply more rigorous real-world emissions data?**

Yes. As vehicles gradually become more efficient and environmentally friendly, the standards should be raised to continue encouraging more walking, cycling and public transport, and to preserve any revenue for investment in active travel and public transport. This also will help ensure that congestion does not increase as more polluting vehicles are replaced by efficient ones – electric and hybrid vehicles will need to be restricted to tackle congestion and particulate pollution in the long term.

#### **Question 5 - Do you agree that Local Authorities should have flexibility to target only those vehicles that may be presenting the biggest air pollution problems locally, or should access restrictions apply to all categories of vehicle, wherever CAZs may be introduced in Wales?**

To ensure clarity of understanding for people across Wales, the same access restrictions for vehicles should apply wherever CAZs are introduced in Wales. Furthermore, evidence from London shows that excluding certain categories of vehicles can, in the long run, result in increased traffic



congestion as more of those vehicles travel within the zone. In London, private hire vehicles have historically been exempt from the congestion charge, and have caused traffic increases in London in recent years, despite the congestion charge. (<http://content.tfl.gov.uk/travel-in-london-report-10.pdf>)

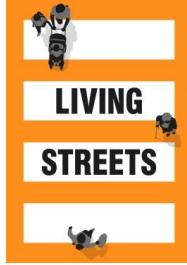
In the UK, swapping just one urban car journey in four to walking and cycling could save more than £1.1bn in health costs due to pollution, compared to £360mn by swapping journeys to electric vehicles. (<https://www.independent.co.uk/environment/cars-air-pollution-cost-nhs-vans-vehicles-health-bills-lung-disease-a8384806.html>) The only way to sustainably reduce traffic and encourage the greatest modeshift towards walking, cycling and public transport is to restrict access by all vehicle categories. Additionally, having universal restrictions will help to ensure that the costs of driving are as equal across Wales as possible, preventing some areas feeling more disadvantaged by the changes than others.

### **Question 6 - Should local authorities have the flexibility to vary the times that CAZ restrictions should operate, or would full-time operation provide the most desirable solution in terms of meeting air quality challenges?**

To ensure clarity of understanding for people across Wales, full-time operation will be most effective at tackling air pollution without too many fines being issued due to confusion. Furthermore, the experience of London's congestion charge has shown that traffic spikes in the hour immediately before and after the charging period, adding significantly to congestion and air pollution during these periods. These spikes were reduced following extensions to the size of the congestion charging zone and to the hours of operation, showing longer charging periods are beneficial for traffic management. (<http://content.tfl.gov.uk/central-london-congestion-charging-impacts-monitoring-sixth-annual-report.pdf>)

### **Question 7 - Should Welsh Government consider options for mandating either a charging or a non-charging CAZ structure in Wales, or should this be left to local authority determination depending on evidence of which of the two may be the most effective means of reducing airborne pollution locally?**

To ensure that all local authorities introduce schemes that will have the most significant impact on air pollution by encouraging modeshift toward walking, cycling and public transport, the Welsh



government should mandate charging CAZs where the revenue is used to fund walking, cycling and public transport. Not only does the government's evidence show that this is the most effective way to reduce air pollution in the shortest time possible, but evidence also shows that this proposal is politically popular. Polling from Ipsos Mori shows that using road pricing revenues to fund public transport is clearly popular with residents. They recorded a baseline level of support for 'road pricing' (congestion charging, and clean air zones are examples) at around 40%. But, when it was guaranteed that revenues will be invested in public transport, the balance swung to 60% in favour. ([https://www.ipsos.com/sites/default/files/publication/1970-01/sri\\_transport\\_road\\_pricing\\_at\\_the\\_crossroads\\_102007.pdf](https://www.ipsos.com/sites/default/files/publication/1970-01/sri_transport_road_pricing_at_the_crossroads_102007.pdf))

### **Question 8 - Would a part-charging model bring any benefits over the alternatives of a total ban on non-compliant vehicles, or a charging system with full coverage within the CAZ?**

Living Streets would only support a total ban or full charging model, as these have been identified as the most effective way to reduce pollution in the shortest possible time. Furthermore, part charging has the potential to introduce confusion and a lack of clarity to the CAZ, potentially reducing compliance and effectiveness.

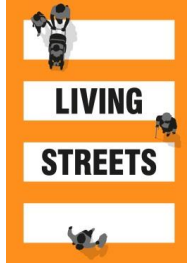
### **Question 9 - Should local authorities have full flexibility to determine the level of any access charges they may apply, or should Welsh Government establish national criteria for local authorities to refer to?**

To ensure clarity of understanding for people across Wales, the same access restrictions for vehicles should apply wherever CAZs are introduced in Wales. Additionally, this will help to ensure that the costs of driving are as equal across Wales as possible, preventing some areas feeling more disadvantaged by the changes than others.

### **Question 10 - Do you agree with the proposed vehicles and categories of drivers that should be exempt from meeting published access requirements within a CAZ?**

ULEVs should not be exempt from CAZ restrictions, as they still release harmful fine particulate matter, and the evidence is unequivocal that encouraging modeshift to walking and cycling everyday journeys is the best way to reduce the health costs of air pollution. In the UK, swapping just one urban car journey in four to walking and cycling could save more than £1.1bn in health costs due to pollution, compared to £360mn by swapping journeys to electric vehicles. (<https://www.independent.co.uk/environment/cars-air-pollution-cost-nhs-vans-vehicles-health-bills->





[lung-disease-a8384806.html](#)) Furthermore, historic and specialist vehicles that cannot be upgraded should not be exempt, as these are frequently the most polluting vehicles.

### **Question 11 - Do you think sufficient consideration has been given to non-road sources of air pollution in the Framework?**

Yes. Road transport is the single biggest source of nitrogen dioxide concentrations at roadside (80%) and should therefore be given greatest prominence in the Framework.

([https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment\\_data/file/633270/air-quality-plan-detail.pdf](https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/633270/air-quality-plan-detail.pdf)) This applies to all but one of the areas of illegal air pollution in Wales and therefore reducing road transport should be considered the priority action for tackling air pollution.

### **Question 12 - How best should information about a CAZ be made publicly available in order to ensure the clearest and widest possible notice of what access restrictions will mean to those travelling within the area?**

Access to clear information about the operation, restrictions and alternative modes of transport is vital for achieving modal shift and ensuring compliance with a CAZ. This is why we would recommend a national framework for the operation and charging structure for CAZs to provide clarity to road users across Wales.

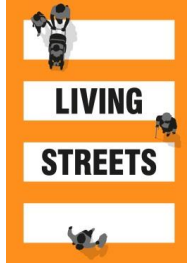
We would also recommend a national awareness raising campaign, with input from Public Health Wales and third sector organisations, to design an off the shelf campaign for local authorities to communicate the health, social and economic impacts of air pollution and the action being taken by National and Local Government.

There should be sufficient use of social media, print media, use of public billboards and bus advertising that clearly outline the impact of air pollution and the action being taken, including the introduction of a CAZ. These messages should be tailored to local communities and audience groups in order to achieve maximum impact.

However, messaging around the risks of pollution should not deter people walking, as there is no clear evidence that people are protected from pollution inside the car, but they will lose out on the benefits of physical activity.

### **Question 13 - Do you have any views on how the impact/success of a CAZ should be measured, and how this information should be used to**





## **develop a local CAZ over time to ensure the widest ongoing possible benefits for air quality?**

Although much of the implementation will take place at the local level the government must be responsible for evaluation of impact. It would be an unrealistic burden on local communities to evaluate impact and for the evaluation to be consistent, well-resourced or thorough enough.

That said, some element of local evaluation can form part of the evidence base, such as community pollution monitoring initiatives, but the evaluation of a CAZ should not rely on this evidence alone. Investment needs to be made in air quality monitoring along active travel routes, to ensure full reliability and provide effective benchmarks for monitoring progress. This data should be used to determine if the CAZ should be made more stringent and restrict more vehicles, for example when pollution levels plateau and stop falling.

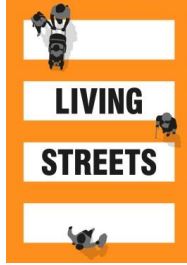
Additional data should include monitoring the level of traffic entering and leaving the CAZ, as well as modal share of everyday journeys such as the commute to work or school. Increasing the number of pupils walking to school is a clear, tangible target that helps to tackle both air pollution on the route to school and outside the school gates. As children are particularly vulnerable to air pollution related harm, this should be a priority target. These targets will identify whether the CAZ is reducing congestion and promoting modeshift towards healthy and clean forms of transportation, which will have a wider health benefit than pollution reduction alone. Monitoring modal share and modeshift should be used to prioritise CAZ surplus revenue spending to maximise the opportunity to benefit from investing in different modes of transportation.

Living Streets would strongly encourage the Framework to require local authorities to set measurable targets on a range of data sources against which to monitor the effectiveness of their CAZ. We would also expect the Welsh government to set its own targets for pollution reduction and increases in active travel. These targets will help to galvanise action towards a clear and specific goal, as well as encourage local authorities to consider the wider impacts of a CAZ on active travel and congestion, as well as pollution.

## **Question 14 - Could the advice in the draft Framework have any positive or adverse effects on the Welsh language, and how could the document increase the former/mitigate the latter?**

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## **Question 15 - Do you wish to make any further comments about the Clean Air Zone Framework for Wales?**



We are concerned that the Framework merely sets out a plan to create another plan. Furthermore, the lack of measurable targets will fail to galvanise shared action towards a specific goal. This means that Wales is at serious risk of failing to reduce air pollution in the shortest possible time. We expect to see detailed, evidence based and target driven plans for CAZ introduction as soon as possible.

We are also concerned that the Framework is not sufficiently joined up with other legislation, in particular planning regulations in Wales. Active and sustainable travel needs to be designed in from the start, and we would expect the Framework to require local authorities to prioritise active travel in planning decisions.

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**June 2018**