

Cross Party Group Clean Air Act for Wales Grwp Trawsbleidiol Deddf Aer Glan Gymru Microsoft Teams

16th October 2023, 10am-11am

### **Attendees:**

#### MSs:

Huw Irranca-Davies MS (chair) Delyth Jewell MS

## Non-MSs:

Ioan Bellin Huw Brunt

Deborah Butler

Joseph Carter

**Ben Coates** 

Josephine Cock

Haf Elgar

Cllr Jeremy Hurley

Delyth Jewell

**Paul Lewis** 

Steve Manning

Rhian Nowell-Phillips

Verity Pownall

**Rhian Williams** 

## **Apologies:**

Llyr Gruffydd MS Mark Isherwood MS Peredur Owen Grffiths MS

1. Huw-Irranca-Davies MS – Welcome and Introductions

**Huw Irranca-Davies MS** welcomed attendees to the meeting, and introductions to members of the Senedd were made.

2. Huw-Irranca Davies MS – Minutes of the last meeting

The minutes were formally approved after the meeting.

3. Joseph Carter, Healthy Air Cymru – Matters arising

There were no matters arising from previous meeting of the CPG. However, **Joseph Carter** reflected on the discussion held in June's meeting and noted that members of the CPG could expect a more detailed update on the Environment Bill at the next meeting of the CPG.

4. Prof. Paul Lewis, Clean Air Champion, Clean Air Programme – Update on Domestic Burning



**Paul Lewis** gave a presentation that provided an overview of the contents and outputs from the Domestic Burning Workshop held 28 June 2023. The aim of the workshop was to bring together experts to review current evidence related to domestic wood burning, sources of PM 2.5 emissions, health impacts, public knowledge and awareness of the impact of wood burning stoves on air quality, as well people's behaviour patterns around domestic burning. The workshop aimed to find out what solutions may exist to lower exposure of people to poor air quality stemming from domestic burning.

The event was well attended, with representation from a diverse group of stakeholders, including academics from both the UK and the Republic of Ireland, government representatives, public health officials, local authorities, non-governmental organizations, and public advocates.

**Paul Lewis** noted that the workshop had two sessions of presentations. The first session looked at the sources of fine particulates from domestic solid fuel burning both indoors and outdoors. The second session looked at the health impacts of domestic burning and the behaviour patterns behind burners. Following these two presentation sessions, the event held an open discussion with attendees, focusing on considering potential solutions to tackle the challenge of domestic burning.

**Paul** first spoke to the presentation given by Dr Gary Fuller at the workshop, who shared data from two studies conducted in London. The first of these was the London Wood Burning Project study, with another study that mapped hotspots of air pollution. The London Wood Burning Project demonstrated the impact of domestic burning inside the home was having on PM2.5 levels outside of the home, as the peaks indoors and outdoors were clearly correlated. This is useful as it informs our understanding that exposure levels (to PM2.5) are related to people's actions and behaviours in using their wood burners.

**Paul** then discussed another study that was presented at the June workshop by Rohit Chakraborty from the University of Sheffield. In the study, Chakraborty placed sensors in the vicinity of woodburning stoves in 20 different homes, as well as outdoors outside those same homes, recording data over a period of 4 weeks. The data demonstrated a pattern that showed that some through the use of some wood-burning stoves, average levels of PM2.5 concentrations in the room can increase by nearly 200% compared to not having a stove and using it.

The study also showed that when the stoves are used, PM2.5 levels can increase over 400%. The study also looked at whether outdoor PM2.5 levels were influencing levels of PM2.5 indoors. Chakraborty found that there was no correlation in this regard, meaning that we can reasonably conclude that the wood burning being used inside a home will be the primary cause of PM2.5 concentrations inside the home.

The second session of the workshop looked at health impacts and behaviour patterns. Dr Karen Exley, who leads on air quality and public health at the UK Health Security Agency, presented her work which looked at exposure to residential solid fuel burning and the subsequent health impacts. Her group looked at exposure to indoor and outdoor solid fuel combustion and respiratory outcomes in both children and adults. These were 2 systematic reviews that the UK Health Security Agency carried out where they looked at a whole range of studies from across developed countries.

Through the systematic reviews, Exley's review looked at risk of asthma data from 40 different studies. They found that the data was conflicting in terms of outcomes. In the earlier studies which



were considered, these tended to show that there was no increased risk of asthma at all as a consequence of solid-wood burning. However, some of the later studies showed that there was an increased risk of childhood asthma when exposed to wood burning, with this risk sometimes being significant. They concluded that that air pollutants from wood burning indoors does cause a range of health effects, especially respiratory conditions, but the extent to which the health effects are due to exposure is currently unclear, as a result of the conflicting evidence base. The study did find that the epidemiological evidence shows some associations with adverse respiratory effects in both children and adults, as a result of exposure to wood-burning, but additional and better studies are needed to identify clear relationships and enable more reliable quantifications.

**Paul** then went onto explain the work presented at the workshop by Dr James Heydon from Nottingham University. These primarily concerned enforcement around smoke control areas, as well population behaviours towards wood-burning in areas subject to a smoke control orders.

Heydon had discussion with local authority officers responsible for enforcing smoke control orders, who felt that escalation of smoke control areas would be difficult due to numerous obstacles around evidence gathering. For example, enforcement around burning at night is difficult due to local authority officers working only in the day, which means they cannot monitor high levels of PM2.5 at night. Local authority officers did, however, think that the introduction of 'no burn days' across the UK as long as there were appropriate monitoring systems in place and effective communications.

Officers also highlighted that smoke control areas are beneficial as they encourage more efficient stoves and lower levels of burning. However, **Paul Lewis** stressed that there was a significant catch with smoke control orders. By encouraging more efficient stoves, smoke control areas actually result in the normalisation of wood-burning and other unhelpful behaviours around domestic burning. If people think their actions — wood-burning — are normal because they've got the most efficient equipment and abide by the rules laid out through smoke control areas, they don't see wood-burning as a harmful behaviour.

Another study was also discussed at the meeting, which was based on a web-based system for 'burning alerts'. The system enabled users to make an informed choice on whether to light their fire or not by receiving alerts when PM2.5 was high in their localities. The system was very successful, 72% of the people who participated in the study – by voluntarily opting in – avoided lighting a fire at least once as a result of being notified of moderate or high levels of PM2.5 in their area. Similarly, 33% of those who lit their stoves did so for a shorter duration following the receipt of an alert informing them of moderate or high levels of PM2.5.

The final section of **Paul Lewis's** presentation discussed the open discussion held at the workshop, chaired by Larissa Lockwood from Global Action Plan. The discussion at the workshop centred around the following questions:

- 1) What solutions exist to mitigate harmful exposures to domestic burning?
- 2) How can awareness and understanding of domestic burning be improved by wood burners for wood burners and the general public?
- 3) What evidence is available for behavioural change strategies?

The discussion also, however, became focused on how little evidence existed around domestic burning, especially around solutions for overcoming the challenges around it. The two key topics discussed, prompted by the above questions, were the issues around views of stove use (public



behaviour and knowledge) and potential solutions for reducing emissions and exposure to woodburning. The discussion also noted that the majority of people who burn stoves are doing it for lifestyles reasons, rather than out necessity to heat their homes. Additionally, the results of regular polling conducted by Global Action Plan showed that the majority of people didn't know that wood burning causes air pollution or believe that it has negative health consequences.

Turning to solutions, discussion focused on enforcement and regulations, as well as other direct solutions, such as the implementation of a campaign by national government to influence behaviour and denormalise wood-burning, backed up by clear evidence. The workshop also noted that there were significant challenges around enforcement at the local authority level, with greater support for enforcement officers needed. Another poll conducted by Global Action Plan showed that only 37% of the public would support a ban on wood-burning stoves. The workshop also noted that a scrappage scheme for burners might also be a viable solution for reducing burning. Lastly, there was agreement at the workshop that there needs to be far better labelling on wood burning stoves, highlighting to consumers of the environmental and health consequences of using stoves.

## 5. Josephine Cock – Presentation on Domestic Burning from Patient's Perspective

Unfortunately, due to a technical issue, **Josephine Cock** was unable to deliver her planned presentation during the meeting. In lieu of this, a transcript of the presentation that Josephine had intended to present will be shared alongside the minutes of the meeting of the CPG on Clean Air.

### 6. Q&A Session on Domestic Burning Presentation

Before opening up to questions on **Paul Lewis's** presentation, **Huw Irranca-Davies MS** shared his agreement with the points made within the presentation the meeting heard, particularly around developing the evidence both on the environmental and health impacts of wood-burning, but also on finding solutions to deliver the messages around domestic burning that will lead to improved knowledge and behavioural change in the public.

**Delyth Jewell MS** asked **Paul Lewis** how we can bring about the changes we need to see in domestic burning in a way that's equitable. She noted that due to poor public knowledge, many people who have purchased wood-burning stoves believe that they have made a choice that is beneficial for the planet, which is contrary to the evidence we have. Jewell also stressed it will be important to deliver the message in a way that doesn't make people feel like they are being punished. **Paul Lewis** agreed that change needs to happen equitably and that the message needs to be delivered in a way that will ensure people are engaged with the information. He also concurred that the lack of public awareness on the impact of wood-burning is a key challenge that needs to be overcome.

Steve Manning wondered whether that the reduction in domestic burning could be developed as part of a focus on indoor air quality, given the evidence presented at the workshop that showed the significant impact that wood-burning has on indoor air pollution. Paul Lewis pointed to the study from James Hayden, outlined above, on the process of denormalisation. The key to overcoming the challenge will be building greater awareness in the population on the negative impact of wood-burning, with James Hayden's study demonstrating a useful potential approach for this, through direct and relevant messages and information on the air quality in people's localities. Steve Manning also argued that we needed to call out schemes that incentivise uptake in the use of 'acceptable' and 'approved' equipment that produce PM2.5, citing biomass boilers as an example of this.

Responding, Paul Lewis argued that if the Welsh Government reformed planning system around



such systems, that this would likely cause a lot of anger in the public. Instead, argued that there should be a focus on reducing the usage of the heating systems that are out there now. **Paul Lewis** argued that the 'flooding effect' – the significant increases of air pollution within the home when activating and using a wood-burning stove – needs to be a key element of the public awareness campaign that the workshop called on national government to deliver.

**Huw Irranca-Davies MS** informed attendees that **Josephine Cock's** presentation will have to be moved to a future meeting, to be determined, due to technical issues at the meeting. He also noted that we would share the presentation that **Josephine** had intended to deliver.

## 7. Joseph Carter – Update on the Environment Bill

**Joseph Carter** then provided an update on the Environment Bill's progress through the Senedd, which had recently moved beyond Stage 2 and into Stage 3 scrutiny. He highlighted the amendments that the Welsh Government had tabled and reflected on some of the amendments that opposition Members of the Senedd had tabled at Stage 2. **Joseph Carter** particularly welcomed the reference to the World Health Organisation limits on air pollution on the face of the Environment Bill.

Huw Irranca-Davies MS noted the impact that the members of the Cross Party Group on Clean Air had made in shaping some of the amendments tabled at Stage 2 of the Environment Bill. **Delyth**Jewell MS noted the level of consensus within the Climate Change, Environment and Infrastructure Committee (CCEI Committee) and hoped that the Welsh Conservative's in the Senedd could support the Bill at later stages of the Bill, in order to continue the cross-party support for the Bill shown so far. Huw Irranca-Davies MS concurred on the high levels of consensus on the Committee, however, he noted that there was some political division regarding the Bill, concerning elements of the Bill giving powers around the introduction of trunk road charging schemes.

## 8. Joseph Carter, next meeting and future work programme

**Joseph Carter** informed members that the next meeting was scheduled for the end of February, as a result of Healthy Air Cymru hosting a reception in the Senedd to celebrate the passing of the Environment Bill. **Joseph** then relayed to members an outline of the agenda at the reception, noting that we are expecting the Deputy Minister will give a speech.

To note: since the meeting, it has been agreed with the Chair's office that this meeting will now take place in early May 2024.

It was agreed that **Paul Lewis** would pull together the outputs of the June workshop into a note to share with members of the CPG. Further, it was agreed that **Ben Coates** would then take this note and draft a letter to the Deputy Minister, requesting an update on Welsh Government's progress on the domestic burning agenda.

# 9. Huw Irranca-Davies MS – Any other business

There was no other business to discuss.

## **Next meeting**



The next meeting of the CPG will be in April or May and will trialed as a hybrid meeting. The date has not been agreed yet.