

# Vulnerability & Carbon Monoxide Allowance (VCMA)

## Project Eligibility Assessment (PEA) Mobile Warm Hubs Project

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**Edward Allard**  
Customer Vulnerability Social Specialist  
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## Gas Network Vulnerability & Carbon Monoxide Allowance (VCMA) Governance Document - Project Eligibility Criteria

<b>Section 1 - Eligibility criteria for company specific projects (other than essential gas appliance repair, replacement and servicing)</b>	
In order to qualify as a VCMA project, a project must:	
VCMA Eligibility Criteria	Criteria Satisfied (Yes/No)
<b>a)</b> Have a positive, or forecasted positive Social Return on Investment (SROI), including for the gas consumers funding the VCMA project;	<b>Yes</b>
<b>b)</b> Either: <ul style="list-style-type: none"> <li><b>i.</b> Provide support to consumers in vulnerable situations, and relate to energy safeguarding, or</li> <li><b>ii.</b> Provide awareness on the dangers of CO, or</li> <li><b>iii.</b> Reduce the risk of harm caused by CO;</li> </ul>	<b>Yes - satisfies all 3 criteria</b>
<b>c)</b> Have defined outcomes and the associated actions to achieve these;	<b>Yes</b>
<b>d)</b> Go beyond activities that are funded through other price control mechanism(s) or required through licence obligations; and	<b>Yes</b>
<b>e)</b> Not be delivered through other external funding sources directly accessed by a GDN, including through other government (national, devolved or local) funding.	<b>Yes</b>
<b>Section 2 - Eligibility criteria for company specific essential gas appliance servicing, repair, and replacement projects</b>	
In order to qualify as a VCMA project, unsafe pipework and essential gas appliance servicing, repair or replacement must meet the following criteria:	
<b>a)</b> A GDN has to isolate and condemn unsafe pipework or an essential gas appliance following a supply interruption or as part of its emergency service role;	<b>N/A</b>
<b>b)</b> The household cannot afford to service, repair or replace the unsafe pipework or essential gas appliance; and;	<b>N/A</b>
<b>c)</b> Sufficient funding is not available from other sources (including national, devolved or local government funding) to fund the unsafe pipework or essential gas appliance servicing, repair or replacement.	<b>N/A</b>

### Section 3 - Eligibility criteria for collaborative VCMA projects

In order to qualify as a collaborative VCMA project, a project must:	
<b>a)</b> Meet the above company specific and boiler repair and replace (if applicable) project eligibility criteria;	<b>N/A</b>
<b>b)</b> Have the potential to benefit consumers on the participating networks; and	<b>N/A</b>
<b>c)</b> Involve two, or more, gas distribution companies.	<b>N/A</b>

## Gas Network Vulnerability and Carbon Monoxide Allowance (VCMA) Governance Document - Project Registration Table 2

Information Required	Description
<b>Project Title</b>	Mobile Warm Hubs
<b>Funding GDN(s)</b>	Cadent
<b>Role of GDN(s) *For Collaborative VCMA Projects only</b>	Not Applicable - Company Specific Project
<b>Date of PEA Submission</b>	TBC
<b>VCMA Project Contact Name, email, and Number</b>	Name: Phil Burrows, Email: phil.m.burrows@cadentgas.com Number: 07773 545451
<b>Total Cost (£k)</b>	£81,699.49
<b>Total VCMA Funding Required (£k)</b>	£81,699.49
<b>Problem(s)</b>	<p><u>Social Isolation &amp; Loneliness</u></p> <p>Social isolation &amp; loneliness poses many mental and physical health risks to residents living in this form of vulnerability.</p> <p>Recent ONS data reports that around 33% of the population in Warwickshire live in rural or semi-rural areas.</p> <p>Customers living in rural communities have a higher risk of being socially isolated due to a number of factors:</p> <ul style="list-style-type: none"> <li>• An increasing percentage of residents are elderly;</li> <li>• Facilities and transport can be limited;</li> <li>• There is often a lack of local employment opportunities,</li> </ul>

- Evidence suggests that broadband and technical support can be inadequate.

Social isolation is often more prevalent in older demographics of the population. An ONS report from 2015 reported that the number of people within the UK population aged 65 plus living in rural areas increased 37% between 2001-2015.

#### Fuel Poverty in Rural Areas

Fuel poverty presents many physical and mental health risks to customers living in this form of hardship. Customers living in fuel poverty are more likely to turn their heating down below an adequate level and are more at risk of living in a cold, damp home; this carries associated health risks including:

- Respiratory & circulatory conditions,
- Cardio-vascular disease, and,
- Mental health conditions

ONS statistics report that there were 50,100 excess winter deaths in 2017-2018 and it is estimated that 10% were directly attributed to Fuel Poverty.

Many rural villages may appear affluent at face value. However, residents are not always able to access affordable sources of heat such as a gas connection and central heating, often due to their proximity to the gas network.

Furthermore, reports suggest that many customers live in large, energy inefficient homes that often score poorly in terms of EPC rating. This, coupled with the lack of local employment opportunities and insufficient affordable housing means fuel poverty can be a serious problem in rural communities.

Customers living in fuel poverty can often be more susceptible to other forms of hardship such as food poverty. Data provided by project partner WRCC reported that in April 2020, there was a 63% increase in food parcels given out in North Warwickshire and an 87% increase in South Warwickshire compared to April 2019.

#### Lack of Awareness on the Dangers of Carbon Monoxide in Rural Communities

Many rural communities experience a lack of facilities, particularly the provision of information and inadequate broadband. As such, it can be challenging for organisations like GDNs to reach rural customers with key messaging on gas safety and carbon monoxide awareness.

	<p>Finally, the impact of fuel poverty in rural areas means many customers can often not afford the cost of servicing their gas appliances or sweeping their chimneys, increasing several risk factors associated with carbon monoxide.</p>
<b>Scope and Objectives</b>	<p><u>Project Scope</u></p> <p>The Mobile Warm Hubs project has an initial duration of 18-months, running from 01/04/2021 to a project completion date of 31/09/2022.</p> <p>Mobile Warm Hubs aims to target social isolation and related hardship affecting vulnerable residents living in rural and semi-rural areas of Warwickshire and Solihull. This project, aims to create closer communities by:</p> <ul style="list-style-type: none"> <li>• Encouraging people to come together after months of isolation during the pandemic;</li> <li>• Providing people with access to energy efficiency, carbon monoxide and home gas safety advice;</li> <li>• Creating new, inclusive community activities;</li> <li>• Offering people access to a broad range of available support services by experts and carefully selected partners.</li> </ul> <p>Cadent aims to achieve this by working in partnership with rural communities' charity WRCC to repurpose an existing vehicle to deliver events that reach customers living in vulnerable situations around Warwickshire &amp; Solihull. These events will focus on tackling the issues outlined in the "Problem" section of this document through:</p> <ul style="list-style-type: none"> <li>• Creating events that promote togetherness, volunteering, and community;</li> <li>• Promoting themes of energy-efficiency and income maximisation advice to support customer living in fuel poverty; and,</li> <li>• Delivering specific events around the dangers, signs, and symptoms of carbon monoxide - this messaging will be appropriate for both homes with gas appliances and homes with solid fuel burning appliances, as is often found in these communities.</li> </ul>

The use of a vehicle will allow Cadent to reach multiple communities across the duration of the project. The project aims to visit a different rural/semi-rural community each working day of the week, ensuring a variety of locations are targeted to reach a range of demographics.

Many community venues are still adapting to the Covid-19 guidelines and navigating the road map out of several lockdowns. The Mobile Warm Hub vehicle allows community events to be delivered safely and in-line with the current Covid-19 guidelines, whilst in-door venues still adapt to a new way of operating.

As well as working alongside existing community venues, Mobile Warm Hub can target communities with a lack of existing services and venues.

Finally, the Mobile Warm Hub will become a great asset for supporting communities across Warwickshire and Solihull. Cadent and WRCC aim for the Mobile Warm Hub to support partner organisations such as local food banks, offering a means of delivering food parcels to isolated residents in rural communities.

## Project Objectives

The Mobile Warm Hub project contains a series of objectives that success will be measured against:

- To support customers living in vulnerable situations across Warwickshire & Solihull.
- To provide services to isolated customers living in communities that may not have the venue or facilities to be able to benefit from a static Warm Hub.
- To generate a positive social return on investment (SROI) on funding provided by Cadent through the Vulnerability & Carbon Monoxide Allowance (VCMA).
- To provide key messaging on gas safety, carbon monoxide awareness and in-home energy efficiency advice to isolated customers across Warwickshire & Solihull.
- To support communities to tackle loneliness and isolation being faced by their residents.

Knowledge by our partner and public data on the different types and levels of vulnerability will be used when selecting locations for the delivery of

	Mobile Warm Hub sessions. This will ensure that the project is both inclusive, benefiting a wide range of customers, and that the project demonstrates key traits contained within the VCMA framework.
<b>Why the Project is Being Funded Through the VCMA</b>	<p>Cadent is proposing to fund this project via the VCMA due to:</p> <ul style="list-style-type: none"> <li>• The use of the Mobile Warm Hub vehicle presents an innovative way of engaging hard to reach customers who stand to benefit most from the gas safety, carbon monoxide and energy efficiency messaging. This goes beyond existing incentives funded by other price control mechanisms.</li> <li>• Issues with fuel poverty, poor existing facilities and inadequate internet can mean that some rural communities struggle to access information relating to energy and awareness on the dangers of carbon monoxide. This project looks to bridge that gap by creating a platform to issue information to customers in rural communities.</li> <li>• Through consultation with partners at WRCC and SROI experts, Cadent believes that delivering the following services has the potential to provide a positive social return: <ul style="list-style-type: none"> <li>○ Support with managing fuel and improving a home's energy efficiency to reduce the risk of cold related illness.</li> <li>○ Increasing resident's understanding on the dangers of carbon monoxide.</li> <li>○ Offering inclusive community activities that support lonely and isolated customers.</li> </ul> </li> </ul>
<b>Evidence of Stakeholder/Customer Support</b>	<p>Cadent conducted extensive stakeholder and customer engagement as part of its business plan formation.</p> <p>Cadent sought feedback from national rural communities charity ACRE on our proposals, particularly how we ensure that rural communities stand to receive benefit from Cadent's management of the VCMA.</p> <p>ACRE supported Cadent's strategy of using the Warm Hub concept to promote togetherness in rural communities. The charity also supported Cadent's strategy of tackling isolation, fuel poverty and promoting awareness of carbon monoxide,</p>



	<p>recognising these as important issues in rural communities.</p> <p>Project partner WRCC also engaged local stakeholder Stratford-Upon-Avon district council around the potential need for this service in their constituency. The council pointed to their recent Social Inclusion Statement 2019-2024 which shares many overlaps with the Mobile Warm Hubs project:</p> <p>The district council's social inclusion statement named the following as priority issues in the area:</p> <ul style="list-style-type: none"> <li>• Combating social/rural isolation;</li> <li>• Supporting older people;</li> <li>• Empowering communities to help themselves;</li> <li>• Improving mental wellbeing;</li> <li>• Raising awareness of services and support.</li> </ul> <p>Cadent and its project partner WRCC also obtained stakeholder's perspective on the unique challenges presented by the Covid-19 pandemic that the Mobile Warm Hub project looks to tackle.</p> <p>The July 2020 Coventry and Warwickshire Joint Strategic Needs Assessment reported on the impact of Covid-19 across the region as:</p> <p><i>"Lockdown and social distancing measures as a result of COVID-19 have had substantial impact on the wellbeing of individuals and communities, from mental health, to financial concerns, to access to important sources of support from family and friends. This is particularly true for more vulnerable individuals who are shielding, people facing domestic abuse, and people facing financial difficulties. The longer-term effect of this on health and wellbeing is yet to be fully known."</i></p> <p>The Mobile Warm Hubs project looks to support some of the most severely impacted groups identified by the Coventry and Warwickshire Joint Strategic Needs Assessment, namely isolated customers and those facing financial difficulties exacerbated by fuel poverty.</p>
<b>Outcomes, Associated Actions and Success Criteria</b>	<p><u>Project Outcomes</u></p> <p>The Mobile Warm Hubs project aims to achieve the following outcomes:</p>



- The delivery of essential safeguarding services, as well as advice on in-home energy efficiency to isolated customers living in rural/semi-rural communities.
- To deliver a positive social return on investment through offering support to customers that minimises the risks of health issues associated with isolation, cold related illness, and exposure to the dangers of carbon monoxide.
- To bring sustainable activities to rural/semi-rural communities that currently have a lack of existing support for customers.

## Project Associated Actions

In order to achieve the project outcomes, Cadent will work with project partner WRCC to deliver the following actions:

- Work with local stakeholders such as Act on Energy and Orbit Housing to ensure links are created between local groups and Mobile Warm Hubs. This will ensure that we reach a significant number of customers that stand to benefit most from the project.
- Ensure that Mobile Warm Hub venues are supported with training and resources in order to create a sustainable benefit that continues beyond the initial 18-month project.
- Make innovative use of social mapping data and engagement with local stakeholders to ensure Mobile Warm Hubs targets communities that stand to benefit most from the project's messaging.
- Cadent will provide support with carbon monoxide awareness training, literature and audible alarms to ensure that customers at risk of exposure to CO are protected through the project.

## What will success look like?

Mobile Warm Hubs aims to visit up to 30 communities during the initial 18-month project period. This will include a mixture of weekly and monthly visits, with the vehicle operating 5 days per week, 48 weeks per year.

	<p>Each Mobile Warm Hub session will reach an average of 10 residents, with sessions held five days per week. This equates to a weekly reach of 50 people, with a total reach of 3,600 customers when scaled up across a 72-week project.</p> <p>As well as aiming to reach a target number of customers, Cadent and WRCC will review the qualitative benefits/indicators of the project as part of the final evaluation.</p> <p>Meeting of the below indicators will help Cadent determine the success of the project:</p> <ul style="list-style-type: none"> <li>• Reduce social isolation: <ul style="list-style-type: none"> <li>a. Are attendees taking part in new activities?</li> <li>b. Do attendees report having more friends/connections as a result of the project?</li> <li>c. Are attendees accessing new forms of community support/public services?</li> </ul> </li> <li>• Uptake in energy efficiency and/or home gas safety information: <ul style="list-style-type: none"> <li>a. Are eligible attendees using carbon monoxide alarms and do they understand the signs, symptoms, and dangers of CO?</li> <li>b. Do attendees feel warmer and safer at home?</li> <li>c. Do attendees report energy cost savings as a result of the information issued under the project?</li> </ul> </li> </ul>
<p><b>Project Partners and Third Parties Involved</b></p>	<p>Cadent's primary project partner will be rural community charity Warwickshire Rural Community Council (WRCC). A member of the ACRE network, WRCC tackle inequality and support resilience and initiatives in rural Warwickshire communities.</p> <p>WRCC aim to bring a range of expertise and skills to the partnership:</p> <ul style="list-style-type: none"> <li>• Experience in engaging and supporting customers that live in rural/semi-rural communities.</li> <li>• An established network of contacts across the project geographic area - these contacts</li> </ul>

	<p>can facilitate access to previously "closed" communities.</p> <ul style="list-style-type: none"> <li>• An organisation recognised and respected by many potential customers across the project geographic area.</li> </ul> <p>WRCC will be working in collaboration with volunteering charity VASA to help deliver the project.</p> <p>VASA are to provide volunteers to help deliver Mobile Warm Hub events, and their team possess many skills in running similar themed events and engaging customers.</p> <p>Cadent's partnerships with WRCC and VASA will indirectly engage many other local 3rd parties able to support successful delivery of the project. WRCC and VASA hold great relationships with West Midlands based charity Act on Energy and Warwickshire CAVA, a community and voluntary action charity.</p>
<p><b>Potential for New Learning</b></p>	<p>The Mobile Warm Hubs project offers many potential areas of learning that Cadent can adopt for other VCMA-funded projects in RIIO-GD2.</p> <p>Firstly, one of the main drivers behind launching the project was its focus on supporting rural/semi-rural communities. Many of Cadent's projects naturally focus on more urban areas and we wanted to ensure that rural customers received benefit from the VCMA.</p> <p>This project will deliver learning on the best methods, communication channels and services to engage rural customers living in vulnerable situations.</p> <p>Secondly, the project focuses on tackling loneliness and isolation, as well as other energy safeguarding issues. Many customers living in isolation (particularly those that display other vulnerabilities) may be hesitant to re-engage with their local community following the pandemic. This project will offer learning on how Cadent as a GDN can best support customers who may still have concerns around social interaction following Covid-19.</p> <p>The project will offer an insight into rural customer's awareness of Cadent as a gas distribution network and the role we play in transporting energy to heat homes. Cadent are typically more visible in urban communities, where a greater concentration of our planned and reactive works take place. The Mobile Warm Hubs project will offer Cadent the chance to</p>

	<p>engage rural customers on the role we play as a GDN, and the steps they should take when encountering a gas emergency/suspect CO.</p> <p>Finally given the success of the mobile warm hub project to date in a relatively small section of our network, our intention is to extend the number of them such that we'll be able to access far greater numbers of our customers to provide support and advice to. The lessons learnt from this warm hub will inform how we market them, where we position them, how we engage with customers, which services that we offer add the greatest benefits, etc. All of these learnings will ensure that future warm hubs are able to maximise their benefits potential.</p>
<p><b>Scale of VCMA Project and SROI Calculations</b></p>	<p>Mobile Warm Hubs aims to visit up to 30 communities during the initial 18-month project period. This will include a mixture of weekly and monthly visits, with the vehicle operating 5 days per week, 48 weeks per year. Based on this number of visits, we forecast to reach at least 3,600 customers across the 18-month project.</p> <p>We believe that first testing the mobile concept on this scale will provide valuable learning that can be applied to wider roll out in other rural areas of Cadent's network(s).</p> <p>We also believe that the investment required to deliver the project (£81,699.49) represents an effective spend of Cadent's VCMA, reaching approximately 3,600 customers that were previously difficult to engage.</p> <p><b>Social Return on Investment</b></p> <ul style="list-style-type: none"> <li>• Forecasted social return on investment = £125,829.86</li> <li>• Project Investment = £81,699.49</li> <li>• Total gross present value generated by the project = £207,529.35</li> <li>• 18-month gross present value from tackling loneliness = £82,800</li> <li>• 5-year gross present value of avoided harm caused by CO = £6,873.35</li> <li>• 5-year gross present value from issuing home energy advice = £117,856</li> </ul> <p><u>The Cost of Loneliness</u></p>

	<p>The Mobile Warm Hubs project will reach customers living in rural areas of Cadent's network.</p> <p><sup>1</sup>Age UK's 2018 Rural Ageing (England) report found that 24.3% of England's rural population are aged 65 or over.</p> <p><sup>2</sup>Rural England 2016's research project reports that 10.5% of residents aged 65 and over reported feelings of loneliness.</p> <p><sup>3</sup>London School of Economics' 2017 briefing paper reported that the cost to individuals, their families and society that arises from loneliness related poor health could be estimated conservatively at £6000 in older people. This figure was across a 10-year period and equates to an annual cost of £600.</p> <p>The Mobile Warm Hubs project aims to reach 3,600 rural customers, 24.3% of which will be aged 65 and over. This equates to 875 customers.</p> <p>Rural England's research suggests that 92 individuals (10.5%) within this aged 65 and over group may have feelings of loneliness.</p> <p>London School of Economics' research suggests a potential saving of £600 per annum for each older customer supported that was previously experiencing feelings of loneliness.</p> <p>The Mobile Warm Hubs project will run for 18-months, equating to a saving of £900 per customer.</p> <p>This equates to an overall benefit of £82,800 across the entire customer group supported through the project.</p> <p><u>The Avoidance of Harm Caused by Carbon Monoxide</u></p> <p>Cadent and WRCC aim to issue audible CO alarms to 350 customers across the course of the 18-month project. Customers will also receive education on the signs, symptoms, and dangers of carbon monoxide.</p>
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<sup>1</sup> [https://www.ageuk.org.uk/globalassets/age-uk/documents/policy-positions/housing-and-homes/ppp\\_rural\\_ageing\\_uk.pdf](https://www.ageuk.org.uk/globalassets/age-uk/documents/policy-positions/housing-and-homes/ppp_rural_ageing_uk.pdf)

<sup>2</sup> <https://ruralengland.org/wp-content/uploads/2016/04/Final-report-Loneliness-and-Isolation.pdf>

<sup>3</sup> <https://www.lse.ac.uk/business/consulting/assets/documents/making-the-economic-case-for-investing-in-actions-to-prevent-and-or-tackle-loneliness-a-systematic-review.pdf>

Cadent forecasts that a 5-year gross present value of £6,873.35 will be achieved through avoidance of harm caused by CO - details below:

The issuing of audible CO alarms:

- a. Avoided A&E visits = £40.48
- b. Avoided long term hospital stays = £43.27
- c. Cost of time off work = £3.34
- d. Avoided deaths caused by CO = £3,655.78
- e. Avoided ambulance calls = £75.51

Providing customers with CO education:

- a. Avoided A&E visits = £32.38
- b. Avoided long term hospital stays = £34.62
- c. Cost of time off work = £2.94
- d. Avoided deaths caused by CO = £2,924.63
- e. Avoided ambulance calls = £60.41

Supporting calculations can be found in the attached document.

[Carbon Monoxide SROI Analysis.pdf](#)

Support with Home Energy Advice

Mobile Warm Hubs attendees will receive simple, practical energy advice. The energy advice will be issued to customers through a variety of channels including expert speakers, literature and signposting to other sources of information.

The energy advice issued on the project will focus on practical low-cost tips that customers can easily implement in their homes e.g., efficient use of appliances, heating and radiator controls and condensation and damp support.

Cadent has calculated the social benefit created by the issuing of energy advice as follows:

- Recent analysis conducted by SIA Partners suggested that the following 5-year gross present values could be achieved through discussing efficient use of appliances, heating and hot water controls and condensation/damp support:
- Efficient use of appliances = £367.77
- Heating and hot water controls = £332.33
- Condensation and damp = £183.82
- Advice will be issued to Mobile Warm Hub customers dependent on their individual needs. As such, Cadent forecasts that

	<p>customers will receive advice on at least one topic as a benchmark.</p> <ul style="list-style-type: none"> <li>• The average 5-year gross present value of these energy advice topics is £294.64.</li> <li>• Cadent and WRCC forecast that 400 households will receive support with energy saving advice over the course of the 18-month project.</li> <li>• This equates to a total 5-year gross present value of £117,856.</li> </ul>
<b>VCMA Project Start and End Date</b>	<p>Project start date = 01/04/2021 Project end date = 30/09/2022</p>
<b>Geographical Area</b>	<p>The Mobile Warm Hub project will run across rural/semi-rural areas of Warwickshire &amp; Solihull - located in Cadent's West Midlands network.</p> <p>Particular attention will be given to areas with:</p> <ul style="list-style-type: none"> <li>• Higher levels of social isolation;</li> <li>• A higher concentration of need based on the volume of customers registered to the PSR;</li> <li>• Areas with a lack of existing infrastructure and facilities more suited to the Mobile Warm Hub model;</li> <li>• Higher levels of deprivation including fuel poverty and relative poverty;</li> </ul>
<b>Remaining Amount in the Allowance at Time of Registration</b>	<p>TBC upon project registration.</p>



## Gas Network Vulnerability and Carbon Monoxide Allowance (VCMA) Governance Document - PEA Control Table

In order to ensure that a VCMA project is registered in accordance with the Ofgem VCMA governance document (incl. project eligibility assessment), the below table should be completed as part of the project registration process.	
Stage 1: Sustainability & Social Purpose Team PEA Peer Review	
Date Immediate Team Peer Review Completed:02/02/2022	Review Completed By: Gemma Norton
Stage 2: Sustainability & Social Purpose Team Management Review	
Date Management Review Completed: 2/02/2022	Review Completed By: Phil Burrows
Step 3: Director of Sustainability & Social Purpose Sign-Off: Mark Belmega	
Director of Sustainability & Social Purpose Sign-Off Date:03/02/2022	
Step 4: Upload PEA Document to the Website & Notification Email Sent to Ofgem (vcma@ofgem.gov.uk)	
Date that PEA Document Uploaded to the Website: March 2022	
Date that Notification Email Sent to Ofgem: March 2022	

## Gas Network Vulnerability and Carbon Monoxide Allowance (VCMA) Governance Document - Project Registration Process

