Authors

Authors: Victoria Scott and Koser Khan

Contributors: Jin Wing Lee, Angela Broadhurst, Joan Olajide, Helen Smith

Business Intelligence Service, Oldham Council

Business Intelligence Service general enquiries: business.intelligence@oldham.gov.uk

Acknowledgements

Many thanks to Keepmoat, who provided the data analysed in this report. Also, many thanks to Angela Broadhurst and Justin Hardy from Oldham Council. Everyone was very helpful in assisting with any queries surrounding the data.
ADDITIONAL CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Executive summary</td>
<td>6</td>
</tr>
<tr>
<td>2 Introduction</td>
<td>8</td>
</tr>
<tr>
<td>2.1 Introduction</td>
<td>8</td>
</tr>
<tr>
<td>2.2 Background</td>
<td>8</td>
</tr>
<tr>
<td>2.3 Methodology</td>
<td>11</td>
</tr>
<tr>
<td>3 Respondent characteristics</td>
<td>12</td>
</tr>
<tr>
<td>3.1 Overall sample</td>
<td>12</td>
</tr>
<tr>
<td>3.2 Demographics</td>
<td>12</td>
</tr>
<tr>
<td>3.2.1 Gender</td>
<td>12</td>
</tr>
<tr>
<td>3.2.2 Age</td>
<td>12</td>
</tr>
<tr>
<td>3.2.3 Ethnicity</td>
<td>13</td>
</tr>
<tr>
<td>3.2.4 Area</td>
<td>14</td>
</tr>
<tr>
<td>3.2.5 Key health conditions</td>
<td>15</td>
</tr>
<tr>
<td>3.3 Economic characteristics</td>
<td>16</td>
</tr>
<tr>
<td>3.3.1 House tenure</td>
<td>16</td>
</tr>
<tr>
<td>3.3.2 House type</td>
<td>16</td>
</tr>
<tr>
<td>3.3.3 Ability to pay fuel bills and debt</td>
<td>16</td>
</tr>
<tr>
<td>3.4 Access routes</td>
<td>17</td>
</tr>
<tr>
<td>3.5 Citizen’s Advice Bureau (CAB)</td>
<td>18</td>
</tr>
<tr>
<td>3.6 Summary</td>
<td>18</td>
</tr>
<tr>
<td>4 Fuel poverty and income maximisation</td>
<td>19</td>
</tr>
<tr>
<td>4.1 Fuel poverty</td>
<td>19</td>
</tr>
<tr>
<td>4.1.1 Household level</td>
<td>19</td>
</tr>
<tr>
<td>4.1.2 Individual summary</td>
<td>20</td>
</tr>
<tr>
<td>4.1.1 Differences by demography</td>
<td>20</td>
</tr>
<tr>
<td>4.2 Income maximisation</td>
<td>21</td>
</tr>
<tr>
<td>4.2.1 Benefits claimed</td>
<td>21</td>
</tr>
<tr>
<td>4.2.2 Trust fund applications</td>
<td>22</td>
</tr>
<tr>
<td>4.3 Summary</td>
<td>22</td>
</tr>
<tr>
<td>5 Health and wellbeing outcomes</td>
<td>23</td>
</tr>
<tr>
<td>5.1 Overall subjective health</td>
<td>23</td>
</tr>
<tr>
<td>5.1.1 Data quality and completeness</td>
<td>23</td>
</tr>
<tr>
<td>5.1.2 Overall subjective health change</td>
<td>24</td>
</tr>
<tr>
<td>5.1.3 Differences by demography</td>
<td>25</td>
</tr>
<tr>
<td>5.2 Life satisfaction</td>
<td>25</td>
</tr>
<tr>
<td>5.2.1 Data quality and completeness</td>
<td>25</td>
</tr>
<tr>
<td>5.2.2 Overall subjective life satisfaction change</td>
<td>26</td>
</tr>
<tr>
<td>5.2.3 Differences by demography</td>
<td>26</td>
</tr>
<tr>
<td>5.3 Presence of ailment and health improvement</td>
<td>27</td>
</tr>
<tr>
<td>5.3.1 Presence of ailment</td>
<td>27</td>
</tr>
<tr>
<td>5.3.2 Health improvement</td>
<td>27</td>
</tr>
<tr>
<td>5.4 Summary</td>
<td>27</td>
</tr>
<tr>
<td>6 Cost analysis</td>
<td>28</td>
</tr>
<tr>
<td>6.1 Overall costs of scheme</td>
<td>28</td>
</tr>
<tr>
<td>6.2 Costs to Warm Homes Partners</td>
<td>29</td>
</tr>
<tr>
<td>6.3 Summary</td>
<td>29</td>
</tr>
</tbody>
</table>
Tables
Table 1: Numbers involved in Warm Homes scheme ................................................................. 12
Table 2: Number and percentage of participants by ethnic group ........................................ 13
Table 3: Number of households by tenure .................................................................................. 16
Table 4: Number of households by house type ......................................................................... 16
Table 5: Number of households by house attachment type ..................................................... 16
Table 6: Number of households by ability to pay bills ............................................................... 16
Table 7: Number of households by CAB referral reason ............................................................ 18
Table 8: Household income before and after the intervention .................................................... 21
Table 9: Number of households by trust application referral reason ......................................... 22
Table 10: Number of households by health questionnaire completeness status ...................... 23
Table 11: Number of households by life satisfaction questionnaire completeness status ......... 25
Table 12: Cost of Warm Homes scheme in Year 2 by funding type .......................................... 28
Table 13: Mean average cost per household and participant* .................................................... 28
Table 14: Mean average cost for WHO partners per household and participant ....................... 29
Table 18: Case study participants by access route ..................................................................... 30
Table 19: Additional outcomes reported by case study participants ......................................... 32
Table 20: Post questionnaire responses by outcome group ....................................................... 34

Figures
Figure 1: Circle of risk linking fuel poverty and mental health .................................................. 9
Figure 2: Model of benefits of Warm Homes scheme ................................................................. 10
Figure 3: Number of participants by age band ......................................................................... 12
Figure 4: Number of participants by ethnic group .................................................................... 13
Figure 5: Numbers of participants by ward .................................................................................. 14
Figure 6: Number of households by health condition ............................................................... 15
Figure 7: Number of households by access route ..................................................................... 17
Figure 8: Number of households by contact method ................................................................. 17
Figure 9: Percentage of households in fuel poverty before and after intervention ................... 19
Figure 10: Number of households by benefits claimed ............................................................. 21
Figure 11: Percentage of participants by subjective health change .......................................... 24
Figure 12: Percentage of participants by health category before and after intervention .......... 24
Figure 13: Percentage of participants by life satisfaction status before and after intervention ...... 26
Figure 14: Percentage of participants by life satisfaction category before and after intervention ... 26
Figure 15: Number of participants not in fuel poverty after the intervention, by age group ....... 41
Figure 16: Percentage of participants not in fuel poverty after the intervention, by age group .... 41
Figure 17: Percentage of participants not in fuel poverty after the intervention, by ethnic group .. 42
Figure 18: Subjective health change by gender ......................................................................... 43
Figure 19: Subjective health change by age group ..................................................................... 43
Figure 20: Subjective health change by ethnic group ................................................................. 44
Figure 21: Subjective health change by health condition .......................................................... 44
Figure 22: Subjective health change by boiler upgrade status .................................................. 45
Figure 23: Subjective life satisfaction by gender ....................................................................... 46
Figure 24: Subjective life satisfaction by age group ................................................................. 46
Figure 25: Subjective life satisfaction by ethnic group .............................................................. 47
Figure 26: Subjective life satisfaction change by health condition .......................................... 47
Figure 27: Subjective life satisfaction by boiler upgrade status ............................................... 48
1 Executive summary

Introduction
The Warm Homes project aims to provide physical energy improvements, behavioural advice and income maximisation for people living in fuel poverty or at risk of fuel poverty. By investing upfront in preventative measures the project seeks to improve health and wellbeing as well as making cost savings.

This final report analyses year 2 quantitative data collected by Keepmoat, the regeneration specialists who delivered the Warm Homes intervention. Keepmoat collected demographic and health and wellbeing outcomes from those involved with the scheme. The report also presents findings from qualitative case studies carried out by Oldham Council.

Scheme achievements
454 households were involved in the intervention overall, which equated to 1,324 individuals.
In total the Warm Homes project resulted in 296 boilers upgraded, 40 cavity wall installations, 91 loft installations, 70 external wall insulations, 319 other physical installations and behavioural advice.

Results from the quantitative analysis show that the Warm Homes intervention served the following demographic groups the most: children and adolescents in terms of age group, Asian or Asian British ethnicities in terms of ethnicity, people with physical illnesses in terms of health condition and house owners in terms of tenure. People were most likely to hear about the scheme via word of mouth and then contacted Keepmoat team via telephone.

Positive outcomes of the scheme included:

- **Fuel poverty**: Fuel poverty was statistically significantly reduced for households and individuals involved in the intervention. Before the intervention 9 out of 10 households lived in fuel poverty. After the intervention these figures were reversed and only 1 in 10 remained in fuel poverty.

- **Improved home environment**: Qualitative feedback demonstrated that participants felt warmer, used a greater number of rooms in their house and had better control over how they kept their home warm.

- **Subjective health and life satisfaction**: Overall, there were significant improvements in subjective health, life satisfaction and how people rated their health condition. Almost two thirds of respondents stated they felt better or their health condition had improved. Qualitative feedback also showed positive improvements in conditions experienced such as Arthritis, Asthma and pain. One fifth of participants had indicated that they no longer had the ailment they had reported at the initial point of contact with the scheme.

- **Participant views on scheme**: Results from the qualitative analysis demonstrated a general satisfaction with the scheme and the services provided. Participants recalled more practical aspects of the scheme such as the assessments of benefits, installation of boilers, radiators and controls. Participants reported positive outcomes including financial benefits, improved home environment, improved health condition and wellbeing.

Areas to consider for improvement for the scheme or evaluation

- The number of referrals sourced from health organisations could be increased, as this report shows they are quite low. Increasing health referrals may reduce the costs associated with health care for these individuals, particularly if people with depression/anxiety or other health conditions which are alleviated by the Warm Homes scheme are targeted.

- The benefits gained from income maximisation were quite low, due to only a small number of people being referred to Citizens Advice Bureau (CAB). It is recommended that a greater number of households be referred for income maximisation in the future. This has been taken on board for Year 3 with the new income maximisation partner Auriga Services.
• Qualitative feedback suggested it was felt that plastering should be part of the scheme. It is recommended that this be included in future years and has been included for Year 3 participants already.
• The data quality of the information recorded by Keepmoat could be improved overall to support data analysis and demonstrate outcomes e.g. ensuring the same health outcome response categories are used in the post questionnaire as the pre questionnaire. It is recommended that consistency is applied to all aspects of data recording.
2 Introduction

2.1 Introduction
In August 2012 Oldham Council, Oldham Clinical Commissioning Group (CCG) and Oldham Housing Investment Partnership (OHIP) signed the country’s first ‘Joint Investment Agreement’ to help tackle fuel poverty in the Borough. This is the first in a series of projects that will come out of the Public Service Reform work that Oldham Council is leading on.

The fuel poverty project was commissioned to Keepmoat (regeneration specialist) for delivery from April 2013. The project and contract was initially for one year, but has since been extended further and the scheme is in the third year of delivery.

This final report is based on the analysis of the year two data collected by Keepmoat. Keepmoat collected demographic and health and wellbeing outcomes from those involved with the scheme. The report also presents findings from qualitative case studies carried out by Oldham Council. 454 households were involved in the intervention overall, which equated to 1,324 individuals.

2.2 Background
The Warm Homes project aims to provide physical energy improvements, behavioural advice and income maximisation for people living in fuel poverty or at risk of fuel poverty. By investing upfront in preventative measures the project sought to improve health and wellbeing as well as make cost savings.

Evidence shows that whether a household feels able to afford to keep its home warm significantly affects health and wellbeing status, with considerable social and emotional burdens experienced by those struggling to pay their fuel bills\(^1\).

\(^1\) Fuel poverty. How to improve health and wellbeing through action on affordable warmth, UK Health Forum (2014)
Figure 1 below illustrates how fuel poverty can have an impact on mental wellbeing and physical health.

Figure 1: Circle of risk linking fuel poverty and mental health

Source: Fuel poverty. How to improve health and wellbeing through action on affordable warmth, UK Health Forum (2014)
There is strong evidence that supports the positive impact that fuel poverty interventions have on mental wellbeing\(^2\,^3\). Figure 2 below demonstrates the model by which improvements in physical health come from the complex relationship between mental wellbeing and physical health.

**Figure 2: Model of benefits of Warm Homes scheme**

The physical health impacts most commonly experienced by those living in cold homes are circulatory diseases and respiratory illnesses. Cold homes are more likely to be damp which encourages the growth of mould which can cause and aggravate respiratory illnesses. The cold also reduces lung function which is a risk factor in triggering asthma attacks and chronic obstructive pulmonary disease (COPD), such as emphysema and chronic bronchitis\(^4\).

The Warm Homes project was set up by partners to help people at risk of the health impacts that fuel poverty can cause. The project was delivered by Keepmoat, in partnership with the Citizens Advice Bureau (CAB) for the first two years. Oldham Council project manages the scheme and a Fuel Poverty Board (chaired by the Director of Public Health) meets regularly to monitor progress of the scheme and make key decisions. The service offers a range of support to help households out of fuel poverty, including the following:

- **Physical energy efficiency improvements** to their properties using a variety of funding methods including ECO, Green Deal Communities, Trust Fund grants and Warm Homes funding. The main physical improvements available under the scheme are:
  - Loft & cavity wall insulation
  - Solid wall insulation
  - Hard to treat cavity insulation
  - New boilers & heating controls
  - Emergency heating

- **Providing behaviour change advice and training** to householders on how to use their household energy more efficiently or understand their heating controls. This is an inherent part of the process and is offered whether or not the resident needs property improvements.

---

\(^2\) Understanding the costs and benefits of fuel poverty interventions: A pragmatic economic evaluation from Greater Manchester, Greater Manchester Public Health Practice Unit (2011)

\(^3\) Living in a cold and damp home: frameworks for understanding impacts on mental well-being, Liddell C, Guiney C (2015)

\(^4\) Fuel poverty. How to improve health and wellbeing through action on affordable warmth, UK Health Forum (2014)
• **Maximising income** of those households; this has been done in partnership with CAB for the first two years and includes helping households:
  • Get out of fuel debt (by applying for trust fund grants)
  • Help with bills/tariff switches
  • Help with getting off prepayment meters
  • Benefits checks
  • Helping residents switch energy providers and access warm homes discount
  • Emergency funds for prepayment top ups

To qualify towards the Oldham partners fuel poverty target the Oldham household must have an income of less than £40,000 and have one or more of the following:
  • Pregnancy
  • Physical disability
  • Physical illness
  • Anxiety and/or depression
  • Frail or have a long term condition

If they do not meet these criteria we would still offer them help through the scheme where possible (e.g. if they do qualify for a free boiler), but they would not qualify towards the target (and therefore would not qualify for payment by results).

### 2.3 Methodology

The following quantitative data was collected by Keepmoat and then analysed in this report:
  • Demographic data (gender, age, ethnicity, income)
  • Fuel expenditure data
  • Subjective data on overall health, life satisfaction and presence of ailment

Additional information on benefits received was collected by CAB.

The data was analysed in Microsoft Excel and the presence of statistical significant difference at a 95% level was found using confidence intervals. The Wilson Score method was used as this is the recommended method by Public Health England\(^5\). More information on confidence intervals and interpretation on them are detailed in Appendix 1.

Qualitative information was collected via case studies conducted by Oldham Council. Participants were identified by Keepmoat and in order to allow time for potential impacts to emerge only participants that had work undertaken 6 or more months ago were invited to interviews.

3  Respondent characteristics

This section provides details of scheme participants. 1,324 individuals had participated in the scheme, which made up 454 households.

3.1  Overall sample

Table 1: Numbers involved in Warm Homes scheme

<table>
<thead>
<tr>
<th></th>
<th>Baseline</th>
</tr>
</thead>
<tbody>
<tr>
<td>Participants</td>
<td>1,324</td>
</tr>
<tr>
<td>Households</td>
<td>454</td>
</tr>
</tbody>
</table>

3.2  Demographics

3.2.1  Gender
Slightly more females had accessed the scheme, with 54% of recipients being female and 46% male.

3.2.3  Age
Figure 3 below shows the age ranges of participants. A third of the participants included children aged between 0-16 years, indicating a significant number of households with resident children. There did not appear to be any significant variations between other age groups taking part, though it can be seen that there were slightly lower numbers aged 45-64 engaging in the scheme.

Figure 3: Number of participants by age band
3.2.4 Ethnicity

Figure 4 below provides a summary of the ethnic groupings of participants. It can be seen that over half of participants were from a South Asian background (54%) of which 73% were identified as Bangladeshi. The second largest number was White British making up 41% of the total scheme recipients.

**Figure 4: Number of participants by ethnic group**

![Bar chart showing ethnic group distribution]

Table 2 below shows that the other ethnic groups are less well represented in particular the Black British community. However, these findings may be more reflective of the breakdown of the general Oldham population, where the largest minority groups are from the South Asian communities.

**Table 2: Number and percentage of participants by ethnic group**

<table>
<thead>
<tr>
<th>Ethnic Group</th>
<th>No.</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>White - British</td>
<td>540</td>
<td>40.8</td>
</tr>
<tr>
<td>Asian or Asian British - Bangladeshi</td>
<td>532</td>
<td>40.2</td>
</tr>
<tr>
<td>Asian or Asian British - Pakistani</td>
<td>178</td>
<td>13.4</td>
</tr>
<tr>
<td>White - Eastern European</td>
<td>29</td>
<td>2.2</td>
</tr>
<tr>
<td>Black or Black British - African</td>
<td>18</td>
<td>1.4</td>
</tr>
<tr>
<td>Asian or Asian British - Other Asian</td>
<td>8</td>
<td>0.6</td>
</tr>
<tr>
<td>Black or Black British - Caribbean</td>
<td>5</td>
<td>0.4</td>
</tr>
<tr>
<td>Mixed - White &amp; Black Caribbean</td>
<td>4</td>
<td>0.3</td>
</tr>
<tr>
<td>Asian or Asian British - Chinese</td>
<td>3</td>
<td>0.2</td>
</tr>
<tr>
<td>Asian or Asian British - Indian</td>
<td>2</td>
<td>0.2</td>
</tr>
<tr>
<td>Mixed - Other Mixed</td>
<td>2</td>
<td>0.2</td>
</tr>
<tr>
<td>Asian or Asian British - Kashmiri</td>
<td>1</td>
<td>0.1</td>
</tr>
<tr>
<td>Mixed - White &amp; Black African</td>
<td>1</td>
<td>0.1</td>
</tr>
<tr>
<td>White - Other White</td>
<td>1</td>
<td>0.2</td>
</tr>
<tr>
<td>Total</td>
<td>1,324</td>
<td>100.0</td>
</tr>
</tbody>
</table>

Table 2 **Number and percentage of participants by ethnic group**
3.2.5 Area

Figure 5 below shows the wards that participating households sit within. The main wards that participating households were from included: Alexandra, Coldhurst, St Marys and Werneth, which fall within the 4th percent of most deprived wards in England. This is reflective of the schemes focus on areas of deprivation as well as the type of properties that had participated in the scheme.

Figure 5: Numbers of participants by ward
3.2.6 Key health conditions

Respondents were asked to identify if they or anyone in their household suffered from any specific health conditions. 278 of the households had identified one or more health conditions. This equates to over a half of participants in the scheme.

Figure 6 below illustrates the range of conditions reported. It can be seen that physical illness was reported more commonly, followed by Arthritis and high blood pressure.

**Figure 6: Number of households by health condition**

Conditions that are often exacerbated by the cold environments were also evident in the participating recipients. These include:

- Asthma
- Arthritis
- COPD
- Bronchitis
- Emphysema
3.3 Economic characteristics

3.3.1 House tenure
Table 3 shows that the majority of households were owner occupiers, with approximately a quarter being privately rented or rented from a social landlord/council.

<table>
<thead>
<tr>
<th>Tenure Type</th>
<th>No</th>
<th>% of households</th>
</tr>
</thead>
<tbody>
<tr>
<td>Owner occupier</td>
<td>332</td>
<td>73.1</td>
</tr>
<tr>
<td>Private rented</td>
<td>63</td>
<td>13.9</td>
</tr>
<tr>
<td>Social landlord / council</td>
<td>50</td>
<td>11.0</td>
</tr>
<tr>
<td>No category</td>
<td>9</td>
<td>2.0</td>
</tr>
<tr>
<td>Total</td>
<td>454</td>
<td>100.0</td>
</tr>
</tbody>
</table>

3.3.2 House type
Table 4 and Table 5 show the type of properties of the participants in the scheme. It can be seen that the majority of house types of participants accessing the scheme were classified as a house and a significant proportion were identified as terraced properties.

<table>
<thead>
<tr>
<th>House Type</th>
<th>No</th>
<th>% of households</th>
</tr>
</thead>
<tbody>
<tr>
<td>House</td>
<td>410</td>
<td>90.3</td>
</tr>
<tr>
<td>Bungalow</td>
<td>22</td>
<td>4.8</td>
</tr>
<tr>
<td>Flat</td>
<td>15</td>
<td>3.3</td>
</tr>
<tr>
<td>Maisonette</td>
<td>2</td>
<td>0.4</td>
</tr>
<tr>
<td>No category</td>
<td>5</td>
<td>1.1</td>
</tr>
<tr>
<td>Total</td>
<td>454</td>
<td>100.0</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>House attachment type</th>
<th>No</th>
<th>% of households</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mid terraced</td>
<td>237</td>
<td>52.2</td>
</tr>
<tr>
<td>Semi-detached</td>
<td>129</td>
<td>28.4</td>
</tr>
<tr>
<td>End terraced</td>
<td>70</td>
<td>15.4</td>
</tr>
<tr>
<td>Detached</td>
<td>8</td>
<td>1.8</td>
</tr>
<tr>
<td>No category</td>
<td>10</td>
<td>2.2</td>
</tr>
<tr>
<td>Total</td>
<td>454</td>
<td>100.0</td>
</tr>
</tbody>
</table>

3.3.3 Ability to pay fuel bills and debt
Participating households were asked to identify if they were currently having any difficulties paying fuel bills or in debt. Table 6 shows that 11% of households identified themselves as being unable to pay bills, with a smaller percentage (7%) indicating they were in debt. The responses to these questions may have been impacted by the direct question and the possible unwillingness of individuals to share such information.

<table>
<thead>
<tr>
<th>Yes</th>
<th>%</th>
<th>No</th>
<th>%</th>
<th>No response</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Unable to pay fuel bills</td>
<td>50</td>
<td>11.0%</td>
<td>399</td>
<td>87.9%</td>
<td>5</td>
</tr>
<tr>
<td>In debt</td>
<td>32</td>
<td>7.0%</td>
<td>410</td>
<td>90.3%</td>
<td>12</td>
</tr>
</tbody>
</table>
3.4 Access routes

Scheme participants had found out about the warm homes scheme through a variety of routes as shown in Figure 7 below. The four main routes were word of mouth, the council website, referral and promotion through door knocking. Considerably smaller numbers of households had been made aware of the scheme through health services or the CAB.

**Figure 7: Number of households by access route**

![Chart showing access routes]

Once receiving information through these avenues participants had made contact with the scheme using the approaches shown in Figure 8 below. The main form of contact was via the telephone, with 59% of participating households reporting using this method.

**Figure 8: Number of households by contact method**

![Chart showing contact methods]
3.5 Citizen's Advice Bureau (CAB)

37% of households had been referred to CAB for additional support or advice. Table 7 provides a breakdown of referral reasons for each household.

Table 7: Number of households by CAB referral reason

<table>
<thead>
<tr>
<th>Referral reason</th>
<th>No</th>
<th>% of applications</th>
</tr>
</thead>
<tbody>
<tr>
<td>Benefits check</td>
<td>60</td>
<td>38.2</td>
</tr>
<tr>
<td>Debt</td>
<td>25</td>
<td>15.9</td>
</tr>
<tr>
<td>Boiler</td>
<td>22</td>
<td>14.0</td>
</tr>
<tr>
<td>Prepayment meter removal</td>
<td>20</td>
<td>12.7</td>
</tr>
<tr>
<td>Other</td>
<td>13</td>
<td>8.3</td>
</tr>
<tr>
<td>Trust fund</td>
<td>12</td>
<td>7.6</td>
</tr>
<tr>
<td>Further assistance payment</td>
<td>5</td>
<td>3.2</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>157</td>
<td><strong>100</strong></td>
</tr>
</tbody>
</table>

3.6 Summary

Results from the analysis show that the Warm Homes intervention served the following demographic groups the most: children and adolescents, Asian or Asian British ethnicities, people with physical illnesses and house owners. People were most likely to hear about the scheme via word of mouth and then contact via telephone.
4 Fuel poverty and income maximisation

This section describes the level to which fuel poverty was reduced and income maximised for households and individuals involved in the Warm Homes scheme. In this report the definition of fuel poverty is that the household spends 10% or more of its annual income on heating their home.

4.1 Fuel poverty

4.1.1 Household level

At the beginning of the scheme, out of the 454 households surveyed 91.6% (416 households) where in fuel poverty, 8.1% (37) where not in fuel poverty and 0.2% (1) are unknown. After the scheme ended, 9.9% (45) were in fuel poverty, 89.9% (408) were not in fuel poverty and 0.2% (1) were unknown. Figure 9 below shows the confidence intervals around the fuel poverty levels before and after the intervention. This demonstrates that levels of fuel poverty have significantly reduced. Of all 416 households that were originally in fuel poverty 89.2% (371) were lifted out of fuel poverty and 10.8% (45) remained in fuel poverty. Out of the 45 households who remained in fuel poverty 51% (23) of these had their fuel bill reduced by a third.

Figure 9: Percentage of households in fuel poverty before and after intervention

Key findings about reduction in fuel poverty were:

- The median average reduction in the percentage of household income spent on fuel was 6.4%
- The median average savings per household from behaviour change, income maximisation and physical works carried out was £834
- The median average saving from behaviour change was £335
- The median average of £0 saving was made from tariff switching. Although 241 households had a tariff switch 134 of these had £0 recorded as an estimated saving which resulted in the low median average saving. This is because in these cases the resident has wanted to complete the switch themselves after the home visit, so in these cases a £0 is recorded as we do not know the savings. Savings ranged from £0 to £600. For Year 3 we are now using an independent Energy Switching service (in partnership with Auriga), so this should improve the energy switch savings and reporting mechanisms.
- In addition to this, 297 households applied for a Warm Homes Discount of £140 on their electricity bill of £41,580 in total.
4.1.2 Individual summary

At the beginning of the scheme 91.0% (1,205) individuals out of the 1,324 surveyed were in fuel poverty, 8.6% (114) were not in fuel poverty and 0.4% (5) were unknown. After the scheme had finished 5.1% (68) were in fuel poverty, 94.5% (1,288) were not in fuel poverty and 0.4% (5) were unknown. This is a significant reduction. Of all 1,205 individuals that were originally in fuel poverty 94.4% (1,137) were lifted out of fuel poverty and 5.6% (68) remained in fuel poverty.

4.1.1 Differences by demography

A summary analysis is presented here. A more detailed analysis is available in Appendix 2 – Fuel poverty by demography.

There was a significant difference for the following groups:

- Those aged below 65 were significantly more likely not to be in fuel poverty after the intervention compared to those aged 65+.
- People from Asian Bangladeshi and Pakistani ethnic groups were significantly more likely not to be in fuel poverty after the intervention compared to those from the White – British ethnic group

There is not enough evidence to demonstrate a significant difference for the following:

- By gender
- By different physical interventions
- By Warm Homes discount status
4.2 Income maximisation

Table 8 below shows that over three quarters of households involved in the scheme had an income below £16,000 before the intervention. This did not change after the intervention, meaning that there was not enough evidence to show a significant difference in income. The mean average income slightly increased but the median average stayed the same. This is mostly due to income increase only occurring for a relatively small number of households (32). It is worth noting that the Warm Homes discount (for 297 households) comes off the energy bill rather than increasing their income. Eighty three per cent of the households involved in the intervention lived below the poverty line (£17,357 per household).

Table 8: Household income before and after the intervention

<table>
<thead>
<tr>
<th></th>
<th>Before</th>
<th></th>
<th></th>
<th>After</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No.</td>
<td>%</td>
<td></td>
<td>No.</td>
<td>%</td>
</tr>
<tr>
<td>&lt; £16,000</td>
<td>348</td>
<td>77%</td>
<td></td>
<td>343</td>
<td>76%</td>
</tr>
<tr>
<td>&gt; £16,000</td>
<td>106</td>
<td>23%</td>
<td></td>
<td>111</td>
<td>24%</td>
</tr>
<tr>
<td>Total</td>
<td>454</td>
<td>100%</td>
<td></td>
<td>454</td>
<td>100%</td>
</tr>
</tbody>
</table>

Mean average £13,382 £13,559
Median average £13,000 £13,000

4.2.1 Benefits claimed

102 benefit checks were conducted which resulted in 33 individuals securing additional income. The total increase income for these households was £88,157.80 with the average6 household income increase equating to £3040.55. Figure 10 below shows a breakdown of the type of benefits claimed by respondents.

Figure 10: Number of households by benefits claimed

---

6 Only for the 33 individuals/households who secured additional benefits
4.2.2 Trust fund applications

46 trust fund applications were made, resulting in 45 successful applications totalling £36,290. Table 9 below provides details of why applications were made. The two main reasons were for boiler installations and debt support.

Table 9: Number of households by trust application referral reason

<table>
<thead>
<tr>
<th>Referral reason</th>
<th>No.</th>
<th>% of applications</th>
</tr>
</thead>
<tbody>
<tr>
<td>Boiler</td>
<td>21</td>
<td>46</td>
</tr>
<tr>
<td>Debt</td>
<td>14</td>
<td>30</td>
</tr>
<tr>
<td>Cooker</td>
<td>4</td>
<td>9</td>
</tr>
<tr>
<td>Other</td>
<td>3</td>
<td>7</td>
</tr>
<tr>
<td>Full heating system</td>
<td>2</td>
<td>4</td>
</tr>
<tr>
<td>Washing machine</td>
<td>2</td>
<td>4</td>
</tr>
<tr>
<td>Total</td>
<td>46</td>
<td>100</td>
</tr>
</tbody>
</table>

4.3 Summary

Fuel poverty significantly reduced for households and individuals involved in the intervention. Before the intervention 9 out of 10 households lived in fuel poverty. After the intervention this figure was reversed. People below the age of 65 were significantly more likely to not be in fuel poverty after the intervention compared to those age 65+.

People from Asian Bangladeshi and Pakistani ethnic groups were significantly more likely to be brought out of fuel poverty compared to those from the White – British ethnic group.

There was not enough evidence to show any significant difference for those not in fuel poverty between the different interventions. There was also not enough evidence to show that the Warm Homes scheme had any significant impact on income maximisation except for a small number of households. One third of households were referred to the Citizen’s Advice Bureau, mainly for benefits checks which resulted in a small number gaining extra income.
5 Health and wellbeing outcomes

This section assesses the extent to which any significant change in health and wellbeing outcomes were achieved after the intervention.

Keepmoat endeavoured to ask the health and wellbeing questions to the same person in the household after the intervention as before the intervention but there is no guarantee that this always happened. This means that for a small number of households assessing change may be unreliable.

Movement between categories has been coded as either “Worse”, “The same” or “Improved” for both overall health and life satisfaction questions.

5.1 Overall subjective health

This section assesses the extent to which there was any significant change in overall health determined by the answer to the question “Would you say that on the whole, your health has been excellent, very good, good, fair, poor?” before and after the intervention.

5.1.1 Data quality and completeness

Table 10 below shows that approximately two fifths of households completed the post intervention questionnaire for the question.

<table>
<thead>
<tr>
<th>Completed status</th>
<th>No.</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>No</td>
<td>269</td>
<td>59%</td>
</tr>
<tr>
<td>Yes</td>
<td>185</td>
<td>41%</td>
</tr>
<tr>
<td>Total</td>
<td>454</td>
<td>100%</td>
</tr>
</tbody>
</table>

In the pre intervention question the responses were recorded in one of the following categories:

- Excellent
- Very good
- Good
- Fair
- Poor

However, for the same question the post intervention responses were recorded in a greater number of categories as follows:

- Excellent
- Very good
- Very satisfied
- Good
- Fairly good
- Fairy satisfied
- Fair
- Fine
- Poor

For analysis purposes it is important that the same categories are used pre and post intervention. Therefore the assumption has been made that “Very satisfied” is the same as “Excellent” and “Fairly good, Fairly satisfied, Fair and Fine” are the same as “Fair”.

5.1.2 Overall subjective health change

Figure 11 below shows that people were significantly more likely to rate their overall health as either the same or improved compared to worse after the intervention was completed. Over three quarters of participants in the sample rated their overall health as either the same or improved. Participants who rated their health as worse could have felt their health deteriorated regardless of a Warm Homes intervention. This could be due to having long term health conditions or changes in their circumstances and in some cases physical improvements to their homes may not have been possible through the scheme.

Figure 11: Percentage of participants by subjective health change

Figure 12 below shows the movement between health categories before and after the intervention.

Figure 12: Percentage of participants by health category before and after intervention
5.1.3 Differences by demography

A summary analysis is presented here. A more detailed analysis is available in Appendix 3 – Health change by demography.

There was a significant difference for the following groups:
- People who did not have a boiler upgrade were significantly more likely to rate their health as having improved compared to those who did have a boiler upgrade. This could be due to different factors that may affect the two groups. Participants from the group of people who had a boiler upgrade were almost twice as likely to be aged 60+ compared to those who did not have a boiler upgrade. It is probable that this means that their health condition is less likely to improve compared to those from the younger age group. However, if you ignore the comparison to the no boiler upgrade group, then participants who had a boiler upgrade were still more likely to rate their health as staying the same or improved compared to becoming worse.

There is not enough evidence to demonstrate a significant difference for the following:
- By gender
- By age group
- By ethnic group
- By health condition

5.2 Life satisfaction

This section assesses the extent to which there was any significant change in life satisfaction as determined by the answer to the question “All things considered, how satisfied or dissatisfied are you with your life as a whole nowadays?: Very satisfied, fairly satisfied, neither satisfied nor dissatisfied, fairly dissatisfied, very dissatisfied?” before and after the intervention.

5.2.1 Data quality and completeness

Table 11 below shows that approximately two fifths of households completed the post intervention questionnaire for the question.

<table>
<thead>
<tr>
<th>Completed status</th>
<th>No.</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>No</td>
<td>270</td>
<td>59%</td>
</tr>
<tr>
<td>Yes</td>
<td>184</td>
<td>41%</td>
</tr>
<tr>
<td>Total</td>
<td>454</td>
<td>100%</td>
</tr>
</tbody>
</table>
5.2.2 Overall subjective life satisfaction change

Figure 13 below shows that people were significantly more likely to rate their overall life satisfaction as improved compared to the same or worse. Two thirds of the sample rated their life satisfaction as having improved. They were also significantly more likely to rate their life satisfaction as the same compared to worse.

**Figure 13: Percentage of participants by life satisfaction status before and after intervention**

![Bar chart showing percentage of participants by life satisfaction status before and after intervention.]

Figure 14 below shows the movement between life satisfaction categories before and after the intervention. Most people were fairly satisfied with their life before and after the intervention but a large amount of people were very satisfied rather than neither satisfied nor dissatisfied after the intervention.

**Figure 14: Percentage of participants by life satisfaction category before and after intervention**

![Bar chart showing percentage of participants by life satisfaction category before and after intervention.]

5.2.3 Differences by demography

A summary exploring if there is evidence to support differences between demographic groups is presented here. A more detailed analysis is available in Appendix 4 – Life satisfaction by demography.

There is not enough evidence to demonstrate a significant difference for the following:

- By gender
- By age group
- By ethnic group
- By health condition
- By boiler upgrade
5.3 Presence of ailment and health improvement

5.3.1 Presence of ailment
22.7% (103 of the 454) households responded after the intervention to the question:
Last time you told us you suffered from <insert ailment> which is made worse from a cold home. Do you
still have the ailment?

16.5% responded saying they felt the no longer had the ailment and 83.5% responded saying they did still
have the ailment. This means that there is a significant percentage that reports that they still have the
ailment.

5.3.2 Health improvement
20.5% (93 of the 454) households responded after the intervention to the question:
Do you feel these conditions have improved as a result of your involvement with the project?

69.9% responded saying they felt their health condition had improved and 30.1% responded saying it had
not improved. This is a significant percentage that report that their health condition has improved.

5.4 Summary
Overall, there were significant improvements in subjective health, life satisfaction and how people rated
their health condition. However, there was no significant difference in whether the individual still had the
ailment they reported at the beginning of the scheme. In general, there was not enough evidence to support
any difference between the demographic groups.

Individuals were significantly more likely to rate their overall health as either the same or improved
compared to worse after the intervention was completed. Most people rated their health as either good or
fair before and after the intervention. There was not enough evidence to demonstrate significant differences
between genders, age groups and ethnic groups.

People were significantly more likely to rate their overall life satisfaction as improved compared to the same
or worse. They were also significantly more likely to rate their life satisfaction as the same compared to
worse. Most people were fairly satisfied with their life before and after the intervention but a large amount of
people were very satisfied rather than neither satisfied nor dissatisfied after the intervention. There was not
enough evidence to demonstrate a significant difference between genders, age groups, ethnic groups and
people who had a boiler upgrade and those who did not.

A significant percentage of people reported still having the health condition they had at the beginning of the
scheme. This is to be expected, given the long term nature of many of the health conditions. However, a
significant percentage reported that they felt their health condition had improved after the scheme.
6 Cost analysis
This section provides analysis of the overall costs of the Warm Homes.

6.1 Overall costs of scheme

The partnership investment into the scheme totalled £300,000 in Year 2, the scheme then utilises funding from a number of sources to enable energy efficiency measures to be installed into residents’ homes. The main source of this funding is ECO – which is funding available through utility companies. The total amount of funding invested into the scheme and people’s homes over year 2 was over £1.3 million – Table 12 below breaks down where this funding came from and the amounts.

Table 12: Cost of Warm Homes scheme in Year 2 by funding type

<table>
<thead>
<tr>
<th>Funding description</th>
<th>£</th>
</tr>
</thead>
<tbody>
<tr>
<td>Value of ECO grant funding invested</td>
<td>£685,332</td>
</tr>
<tr>
<td>Value of Green Deal (cash back &amp; communities funding)</td>
<td>£228,000</td>
</tr>
<tr>
<td>Value of additional Council capital funding invested in homes (solid wall insulation)</td>
<td>£60,000</td>
</tr>
<tr>
<td>25 trust fund grants secured</td>
<td>£41,881</td>
</tr>
<tr>
<td>Warm Homes Partner investment</td>
<td>£300,000</td>
</tr>
<tr>
<td>Total Warm Homes Year 2</td>
<td>£1,315,213</td>
</tr>
</tbody>
</table>

Table 13 below shows that if the overall cost of the scheme (i.e £1,315,213) is divided by the number of households (454) in the scheme, then the cost per household is £2,897 and the cost for an individual is £993. If cost to partners only is considered (i.e Warm Homes Partner investment), then the cost per household (£300,000/454) would be approximately £661 while the cost for an individual would be approximately £227.

Table 13: Mean average cost per household and participant*

<table>
<thead>
<tr>
<th>No.</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Households in scheme</td>
<td>454</td>
</tr>
<tr>
<td>Households lifted out of fuel poverty</td>
<td>371</td>
</tr>
<tr>
<td>Individuals in scheme</td>
<td>1,324</td>
</tr>
<tr>
<td>Individuals lifted out of fuel poverty</td>
<td>1,137</td>
</tr>
<tr>
<td>Total individuals qualifying for payment by results*</td>
<td>1,205</td>
</tr>
</tbody>
</table>

*This includes individuals lifted out of fuel poverty + 68 individuals who were not lifted out of fuel poverty but still had their fuel bill reduced by a third or more

Figures in table are slightly different to those reported in original ‘Outcomes report’ written for Year 2, we think this is down to data cleansing that has taken place for the detailed analysis.
6.2 Costs to Warm Homes Partners

If the same calculations used in the previous section are applied to just the investment from Warm Homes partners (£300,000) then this results in a much lower cost per household/individual, as shown below in Table 14.

<table>
<thead>
<tr>
<th>No.</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Table 14: Mean average cost for WHO partners per household and participant

6.3 Summary

Analysis of Warm Homes cost data showed that the intervention cost £2,897 per household, or £993 per individual. If only the Warm Homes Partners investment is included then the intervention costed £661 per household, or £227 per individual.
7 Qualitative analysis

This section includes information relating to the case studies conducted as part of the evaluation. Information collected through each interview has been summarised as an individual case study to demonstrate how participants came into contact with the scheme and what impact this had on their circumstances and homes. Case studies are provided in Appendix 5 – Case studies. A summary that brings together key findings from of all the case studies is provided below in section 7.1.

7.1 Case Studies

Case study participants were identified by Keepmoat and in order to allow time for potential impacts to emerge only participants that had work undertaken 6 or months ago were invited to interviews. Participants were then contacted by phone asking if they wished to take part in an interview.

12 interviews were conducted; these consisted of 7 face to face and 5 telephone interviews. The initial aim was to include a sample of individuals across specific health conditions and include key groups. As participation was voluntary not all identified individuals wished to take part in the evaluation. A brief profile of participants is included in each written case study but to summarise the following criteria were met:

- Bangladeshi and Pakistani ethnic groups
- Individuals with health conditions: Arthritis, COPD, Asthma, Anxiety
- Single parent
- Couple with young children
- Elderly/frail

Of the 12 interviews 10 have been included as case studies. The two excluded provided feedback that has been included in the areas for improvement section.

Table 15 below summarises how case study participants became aware of the scheme.

<table>
<thead>
<tr>
<th>Access route</th>
<th>No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Family/friends</td>
<td>3</td>
</tr>
<tr>
<td>Age UK</td>
<td>2</td>
</tr>
<tr>
<td>Keepmoat contact/publicity</td>
<td>3</td>
</tr>
<tr>
<td>CAB</td>
<td>1</td>
</tr>
<tr>
<td>Landlord</td>
<td>1</td>
</tr>
</tbody>
</table>

Generally all participants were very positive about the scheme both in terms of how it was delivered and the impacts/outcomes for them or their homes. The following sections describe some of the elements of the scheme and the impacts for participants.

7.2 Interventions received

7.2.1 Behavioural Advice

There appeared to be limited recall on the behavioural advice that was provided as part of the assessment process. This may have been affected by the time that had lapsed since the work was undertaken and participants being interviewed. Only participants that had work completed 6 or more months ago were invited to take part. Nevertheless one participant identified the information she received as ‘useful tips’ to keep warm and followed the advice she was given.
7.2.2 Benefits checks
All participants recalled their benefits being checked during the assessment process. For the majority this resulted in assurance that they were receiving what they were entitled to. Outcomes for participants resulting in increased income are provided in the financial impacts section below.

7.2.3 Adaptations
All 12 participants had had new boilers installed in their homes, with one participant indicating the installation of a complete central heating system. This participant previously did not have central heating in the home.

7.3 Perceived outcomes/impacts

7.3.1 Financial impacts
Participation in the scheme resulted in financial impacts for individuals. These impacts were reflected in:

- **Savings**: Some participants had reported an impact on the amount they were spending to heat their homes and indicated spending less and making a saving. This was linked to having a new heating systems installed.
- **Increase in household income**: One participant had qualified for additional income through the scheme resulting in pension credits being awarded and another received a fuel reduction grant.
- **Affordability**: It was evident that some participants would not have been able to afford to pay for a new boiler or get their old boilers repaired. The scheme enabled access to a new boiler that they would otherwise not have been in a position to purchase.

“Before the work it was costing £1500 and now its £1000...Overall our fuel bills have gone down, what with the doors, roof and boiler - it's definitely part of the boiler, probably the main thing the boiler.” …it's just a big worry out of the way, could never have afforded it.”

“I'm saving about £15 a month and I've also had a rebate. My bills are better than before.”

7.3.2 Health impacts
A number of positive health and well-being impacts were reported by participants and these included:

- **General health**: Participants perceived a positive impact on their health by having a warm home even if they could not pin point a specific health impact.
- **Improved management of conditions**: Participants reported that a cold environment often aggravated conditions such as back/leg pain, arthritis, COPD and Reynaud’s disease and that the warmer home environment had helped their conditions. An improvement in pain/mobility was indicated and one participant also reported a reduction in the painkillers she was taking for her Arthritis.
- **Improvement in children’s health**: some positive impact on child health was also reported this related to a child's asthma and improved breathing, less coughs and children not having as many colds.
- **Well-being**: Participants mentioned feeling happier, less anxious and less worried about costs of heating their home.
“I feel better because my home is warmer. I’m not as restricted as before. I no longer have to stay in one room with the heaters on, now the whole house is warm and it makes you feel comfortable. It’s nice to be able to move around the house.”

“It’s cut my tablets in half, which is good. I’ve still needed painkillers but not in the quantity I was taking them. My doctor asked me what the difference was and I said, well it’s surprising what you get when you have a brand new boiler put in isn’t it? He agreed it’s because of the heat.”

7.3.3 Improved home environment
A number of participants had made reference to cold rooms and it not being easy to keep their homes warm. All participants reported their homes felt warmer now, with some indicating better use of other rooms within the house a result and others mentioning changes in behaviour and how they kept warm.

“When I go to bed at night the bedroom is nice and cosy you know before it was freezing in the bedroom I had a 14.5 duvet and now I only have a 10.5 so that is better isn’t it.”

“We were backwards and forwards to my mum’s because it was so cold. We had the electric heater but it just dried the air out and we only had that downstairs. It’s made a huge difference, definitely.”

“We don’t have to sit around the gas fire to get warm and then go to bed with hot water bottles and stuff, we don’t need do that anymore so it’s more relaxing going to bed.”

7.3.4 Other impacts
Other outcomes reported by case study participants have been summarised in Table 16 below.

Table 16: Additional outcomes reported by case study participants

<table>
<thead>
<tr>
<th>Outcome</th>
<th>Context/Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Warmer home:</td>
<td>Participants had referred to their homes being cold before the installation of the new boiler/heating system. Homes were now</td>
</tr>
<tr>
<td></td>
<td>considered warmer and easier to heat.</td>
</tr>
<tr>
<td>Better use of rooms within house:</td>
<td>Participants mentioned not utilising rooms the home due to the cold</td>
</tr>
<tr>
<td>Better control over the temperature in their</td>
<td>Participants previously reported limiting the use of the heating system and having the home warm at certain times only. The thermostat now enable</td>
</tr>
<tr>
<td>home and how they kept their home warm:</td>
<td>d a more economical temperature to be set</td>
</tr>
<tr>
<td></td>
<td>Participants also reported now being able to set the heating for when the house was empty.</td>
</tr>
</tbody>
</table>
### Outcome

**Access to hot water/ instant hot water:**
Some participants had reported that they had no hot water due to faulty boilers or due to costs did not keep the water warm continuously.

Participants mentioned previously boiling water in a kettle to do dishes or take baths. Also although some participants had access to hot water it was not instant and took time to warm up. The new boilers allowed access to instant hot water.

**Easier to shower and bath:**
No longer having to wait for water to be heated, or boil kettle to heat water and warmer bathrooms.

**No longer reliant on electrical heaters to keep rooms warm:**
Some individuals were using electrical heaters to keep warm in particular one participant had no central heating system in her home before the installation of the new boiler.

**No longer worrying about the expense of heating the home and using the heating system:**
Participants talked about previously limiting their use of the heating and hot water due to the expense and not affordability but were now able to make better use of their heating systems.

**Taking part in recreational activities:**
One participant talked about now being able to sit and read something which she did not previously do as she felt it was too cold to sit in one place and preferred to move around the house and keep busy to stay warm.

**Increased storage space:**
Where old boilers/water tanks had been removed participants reported utilising the space for storage etc.

**Improved living conditions**
One participant reported an improvement in the damp and condensation experienced in the home.

---

**“Compared to before massively different, we knew it was inefficient so we tended it use it more wisely, more putting it on couple of hours in the morning and couple in the evening but now we feel we don't need to worry about that.”**

**“I was really depressed before, I know its only boiler but every property I have lived in I have had problems with the heating it was just like will I ever move into somewhere that has got actual heating that works. Obviously when I had this I was over the moon I know it's only a boiler.”**

### 7.4 Service Delivery

Participants were on the whole very positive about their experience with the scheme and contact that they had, had with Keepmoat staff and workmen.

Overall all participants felt that the work completed was done to a good standard and within a good time frame. Many participants commented on the speed of the scheme with over half of the participants reporting that a member of the team went to visit them the very next day following their initial enquiry with Keepmoat and the boiler being fitted in less than a month after this. Participants felt that this was extremely positive and were extremely satisfied with the service.

It was felt the scheme could potentially benefit other people in similar situations particularly those who may not be able to afford to replace boilers or heating systems.
When asked if there was anything about the scheme that could be improved, the majority of participants did not feel the scheme could be improved further. However, some areas for consideration were identified by a couple of participants:

- **Pipework and brick work being left exposed after boiler installation:** It was felt that plastering it up should be part of the job and that not everyone can afford to do this work themselves; this was of particular concern for more elderly/vulnerable recipients. If this could not be provided, the scheme could consider advising on company that recipients could be referred to in order to access a cost-effective/reliant person.

- **Shower replacement:** One participant mentioned having to pay for a new shower system as his old shower was not compliant with the new boiler system.

- **Draught/cold getting into house:** One participant indicated that when the older boiler was removed, the hole left was not sealed properly and was allowing air into the kitchen, making her kitchen cold.

- **Water not warm:** Perception that water was not getting warm as fast as it did with the previous system (this was because the household had gone from a hot water cylinder (instant hot water) to a combi-boiler for the first time).

### 7.5 Additional qualitative information

A number of comments made by participants were also recorded by the Keepmoat team as part of the post scheme follow-up questions. These comments related to the question *Do you feel these conditions have improved as a result of your involvement with the project?* Where possible, these have been coded to demonstrate scheme outcomes as perceived by participants.

82 comments were recorded and have been grouped in Table 17 below. It can be seen from the table that over a half of the comments received indicated that respondents now felt they had a warmer home, a smaller number also reported that it was easier to heat their homes. Almost two-thirds of respondents stated they felt better or their health condition had improved. This was also reflected in the case studies undertaken.

<table>
<thead>
<tr>
<th>Reported outcome</th>
<th>No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Warmer home</td>
<td>48</td>
</tr>
<tr>
<td>Easier to warm home</td>
<td>8</td>
</tr>
<tr>
<td>Improved health/condition</td>
<td>9</td>
</tr>
<tr>
<td>Feeling better</td>
<td>7</td>
</tr>
<tr>
<td>Reduced anxiety</td>
<td>7</td>
</tr>
<tr>
<td>Improved well-being</td>
<td>3</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>82</strong></td>
</tr>
</tbody>
</table>
Other outcomes included improved health. This included participants reporting improvements in Asthma and blood pressure, reduced anxiety and worry over heating the home or paying bills.

“Yes, the asthma has eased”
“Much better now house is warmer”
“Yes my blood pressure is improving may stop taking tablet”
“Absolutely fantastic feel loads better”
“Heart condition is better now my house is much warmer”

7.6 Summary
Feedback collected through the case studies and additional comments demonstrates a general satisfaction with the scheme and the service provided. Participants recalled more practical aspects of the scheme such as the assessments of benefits, installation of boilers, radiators and controls. There was less recollection of the behavioural advice that was offered. This could be due to the duration of time from initial advice being offered and interviews taking place. However for those that could recall it was considered useful.

Participants reported a number of positive outcomes as a result of their involvement with the scheme, such as:

- Financial benefits which included both increased in income and savings made on fuel spend as well as cost of new boilers/heating systems
- Improved home environment through homes being considered warmer, allowing utilisation of rooms better, less damp and cold rooms
- Easier to heat home and control temperature within home
- Easier to take baths and wash dishes – access to instant hot water
- Improvements in health conditions such as Asthma, Arthritis and pain experienced
- Improved well-being and feeling happier
- Reduced anxiety and worry about keeping their homes warm and paying for bills

The only areas for improvement identified related to the installation of boilers and this included the preference for exposed brick and pipe work to be covered up as part of the installation process, ensuring that boiler spaces were sealed properly to prevent drafts and support for additional costs such as replacing showers that were no longer compliant with the new boilers. In response to the feedback some changes have now been implemented for Year 3. In partnership with Age UK Oldham we have agreed that their handyperson scheme will complete any ‘making good’ of heating installs where necessary so this should not be a negative anymore. Also, showers will be paid for where needed.
8 Conclusion

Oldham Warm Homes scheme has demonstrated that it has met its aims in relation to:

- Working with low income households with one or more of the house members having been physically or mentally unwell
- Bringing families/individuals out of fuel poverty
- Improving subjective health status and life satisfaction
- Providing good value for money
- Providing home improvements through installation of warm home interventions.

The main groups accessing the scheme included children and adolescents, Asian or Asian British ethnicities. The majority of households were owner occupiers and a significant number fell within the Alexandra, Coldhurst and St Mary’s wards. Over half of the households reported suffering from one or more health conditions with the main conditions being identified as physical illness, Arthritis, Blood pressure and Asthma.

Fuel poverty: The findings demonstrate the scheme interventions were successful in reducing fuel poverty experienced by households and individuals. Before the interventions 9 out of 10 households lived in fuel poverty whereas after the intervention this was reversed, with only 1 in 10 remaining in fuel poverty. People from Asian Bangladeshi and Pakistani ethnic groups were significantly more likely to be brought out of fuel poverty compared to those from the White – British ethnic group.

There is strong research evidence to support the fact that where fuel poverty has been eliminated there have significant improvements in mental health and well-being.7

Subjective health and life satisfaction: Significant improvements in subjective health and well-being were reported. More participants were likely to rate their overall health as either the same or improved after the scheme intervention.

Most people rated their health as either good or fair before and after the intervention. There was not enough evidence to demonstrate significant difference between genders, age groups or ethnic groups. Of those participating in the post questionnaire approximately three quarters reported improvements in their health conditions during their participation. These findings were further reinforced in the case studies, with participants highlighting improvements in conditions experienced such as Arthritis, Asthma and pain.

The long term nature of many of the conditions meant that, as expected, many of the participants still had these conditions after the intervention. Nevertheless one fifth of participants had indicated they no longer had the ailment they had reported at the initial point of contact with the scheme.

Qualitative feedback also indicated reduced anxiety and stress, with participants indicating no longer worrying as much about heating their homes. Evidence has shown that whether a household feels able to afford to keep its home warm significantly affects health and well-being, resulting in considerable social and emotional burdens experienced by those struggling to pay fuel bills.8 Therefore it would be expected that interventions offered as part of the warm home scheme that aim to bring people out of fuel poverty would reduce the social and emotional burdens faced by such individuals.

---

8 How to improve health and wellbeing through action on affordable warmth, UK Health Forum (2014)
People were significantly more likely to rate their overall life satisfaction as improved compared to the same or worse. Most people were fairly satisfied with their life before and after the intervention but a large amount of people were very satisfied rather than neither satisfied nor dissatisfied after the intervention.

Other impacts: Feedback from case studies and additional comments indicate the scheme has had many positive impacts for individuals and their homes. Participants reported having warm homes and finding it easier to heat their homes as result of the interventions they had received. Other benefits included better use of rooms in the house and improved living conditions.

Cost benefits: Based on the Warm Homes Partner investment, the cost per household is approximately £661 while the cost for an individual is approximately £227.

Feedback from participants demonstrated financial benefits such as increased income and savings made on fuel spend. Participants reported spending less money to heat their homes and reducing their fuel bills. In terms of income maximisation the number of individuals reporting an increase in income was not considered significant. This may have been a result of limited CAB input due to issues with service delivery or there was little impact on income for households generally. However the scheme did demonstrate for those individuals accessing additional welfare benefits their household income was also increased.
9 Recommendations

In summary the recommendations from the findings in this report are as follows:

- The number of referrals sourced from health organisations could be increased, as this report shows they are quite low. Increasing health referrals may reduce the costs associated with health care for these individuals, particularly if people with depression/anxiety or other health conditions which are alleviated by the Warm Homes scheme are targeted.

- The benefits gained from income maximisation were quite low, due to only a small number of people being referred to CAB. It is recommended that a greater number of households be referred for income maximisation in the future. This has been taken on board for Year 3 with the new income maximisation partner Auriga Services.

- Qualitative feedback suggested it was felt that plastering should be part of the scheme. It is recommended that this be included in future years and has been included for Year 3 participants already.

- The data quality of the information recorded by Keepmoat could be improved overall to support data analysis and demonstrate outcomes e.g. ensuring the same health outcome response categories are used in the post questionnaire as the pre questionnaire. It is recommended that consistency is applied to all aspects of data recording.
10 Glossary

CAB    Citizen’s Advice Bureau
RLO    Residential Liaison Officer
Appendix 1 – Confidence intervals

The following information is taken from Public Health England Technical Briefing 3:

A confidence interval is a range of values that is used to quantify the imprecision in the estimate of a particular value. Specifically it quantifies the imprecision that results from random variation in the estimation of the value; in these instances the imprecision arises not as a result of sampling variation but of ‘natural’ variation. The indicator is considered to be the outcome of a stochastic process, i.e. one which can be influenced by the random occurrences that are inherent in the world around us. In such instances the value actually observed is only one of the set that could occur under the same circumstances."

For a given level of confidence, the wider the confidence interval, the greater the uncertainty in the estimate. If the target or benchmark value is outside the confidence interval it can be inferred that the difference between the estimate and the target is statistically significant at the corresponding significance level. For instance, if the target value is outside the 95% confidence interval then the difference is significant at the $\alpha = 5\%$ level ($P < 0.05$). Whilst it is safe to assume that non-overlapping confidence intervals indicate a statistically significant difference, it is not always the case that overlapping confidence intervals do not.

In the context of the Warm Homes project the figure below gives an example of how to interpret confidence intervals.

Overall subjective health change

The confidence intervals on “Worse” and “The same” bar chart columns do not overlap. This means that they are significantly different.

The confidence intervals on “The same” and “Improved” bar chart columns overlap. This means that there is not enough evidence to support any significant difference between them.

Wider confidence intervals are generally the result of a small population/sample size of respondents.

The confidence intervals are indicated by the bars which extend above and below the actual value. The bar shows that we can be 95% certain that the true value lies between these bars.
12 Appendix 2 – Fuel poverty by demography

12.1.1 Gender
There is not enough evidence to demonstrate a significant difference in the percentage of males and females not in fuel poverty after the intervention (93% - females, 95% males). However, there were 82 more females not in fuel poverty after the intervention. This is reflective of the fact that there were more females in the scheme originally.

12.1.1 Age group
As Figure 15 below shows the majority of people not in fuel poverty after the intervention were aged between 0-44 years old. This is mostly just reflective of the large numbers of people in these age groups who were part of the intervention.

Figure 15: Number of participants not in fuel poverty after the intervention, by age group

Figure 9 below shows that the majority of people, across all age groups, were not in fuel poverty after the intervention. However those aged below 65 were significantly more likely not to be in fuel poverty after the intervention compared to those aged 65+.

Figure 16: Percentage of participants not in fuel poverty after the intervention, by age group
12.1.1 Ethnicity

Figure 17 below shows that people from Asian Bangladeshi and Pakistani ethnic groups were significantly more likely not to be in fuel poverty after the intervention compared to those from the White – British ethnic group. 91% of people with a White – British ethnicity were not in fuel poverty after the intervention whereas the figures for Asian ethnicities range from 97% to 99%.

Figure 17: Percentage of participants not in fuel poverty after the intervention, by ethnic group

12.1.2 Intervention type

There was not enough evidence to demonstrate a significant difference in the percentage of people not in fuel poverty after the intervention for individuals who had:

- a boiler upgrade (95%) and those who did not have a boiler upgrade (94%).
- solid wall insulation installed (95%) and those who did not (94%).
- any other physical intervention (95%) and those who did not (93%)
- applied for Warm Homes discount (94%) and those who did not (95%)

The lack of difference might indicate that the most appropriate intervention was used for each household rather than the intervention not being effective.

Every household involved in the Warm Homes scheme received some behavioural advice so there is no comparison that can be made between those that received behavioural advice and those that did not.
13 Appendix 3 – Health change by demography

13.1.1 Gender
Figure 18 below shows that there is not enough evidence to demonstrate a significant difference between the genders in how they rated any change in their overall health.

Figure 18: Subjective health change by gender

13.1.2 Age
Figure 19 below shows that there is not enough evidence to demonstrate a significant difference between the age groups in how they rated any change in their overall health.

Figure 19: Subjective health change by age group

13.1.3 Ethnicity
Figure 20 below shows that there is not enough evidence to demonstrate a significant difference between the ethnic groups in how they rated any change in their overall health.
13.1.1 Health condition

Figure 21 below shows that there is not enough evidence to demonstrate a significant difference between the health conditions in how they rated any change in their overall health.

13.1.2 Boiler upgrade

Figure 22 shows that people who did not have a boiler upgrade were significantly more likely to rate their health as having improved compared to those who did have a boiler upgrade. This may be due to additional underlying factors affecting those who had a boiler upgrade. Individuals who had a boiler upgrade where significantly more likely to rate their health as being the same compared to those who did not have a boiler upgrade. There was no evidence to show any significant difference in the percentage of people who rated their health as worse.
Figure 22: Subjective health change by boiler upgrade status

![Bar chart showing subjective health change by boiler upgrade status.](image-url)
14 Appendix 4 – Life satisfaction by demography

14.1.1 Gender
Figure 23 below shows that there is no evidence to support a significant difference in subjective life satisfaction change between males and females.

Figure 23: Subjective life satisfaction by gender

14.1.1 Age group
Figure 24 below shows that there is no evidence to support a significant difference in subjective life satisfaction change between the different age groups.

Figure 24: Subjective life satisfaction by age group

14.1.1 Ethnicity
Figure 25 below shows that there is no evidence to support a significant difference in subjective life satisfaction change between the different ethnic groups.
14.1.1 Health condition

Figure 26 below shows that there is no evidence to support a significant difference in subjective life satisfaction change between the different health conditions.

14.1.2 Boiler upgrade

Figure 27 below shows that there is no evidence to support a significant difference in subjective life satisfaction change between the group of people who had a boiler upgrade and those who did not have a boiler upgrade.
Figure 27: Subjective life satisfaction by boiler upgrade status
### Case Study 1

**Profile:** Aysha aged 31 is married and works part-time. She has two young children aged 1 and 7 and lives in her own property.

**Involvement with the scheme and work undertaken:**

Aysha got involved with the scheme when her boiler had broken and she was shopping around for boiler quotes. A friend had informed her about the scheme and that a grant for a free new boiler may be available.

Aysha then contacted Keepmoat who arranged to go and see her the following day and the outreach worker went through all information and discussed Aysha's income to see if she was eligible. Keepmoat contacted Aysha the day after the appointment to say that she was eligible for a new boiler and arranged for the work to be undertaken.

Before the new boiler was installed Aysha’s old boiler was tested to ensure that it did need replacing rather than fixing. When it was tested it was revealed that the boiler was faulty and a potential hazard as it wasn’t releasing water and was not functioning properly. Aysha said: *“I was really impressed as the team did a really thorough check, I was really, really happy with the service that I got.”*

As well as assessing Aysha’s eligibility for a new boiler also the outreach worker went through Aysha’s utility bills with her to see what she could save and also discussed the warm home grant with Aysha but she was already in receipt of it.

**Impact of the scheme:**

Before the new boiler was installed Aysha was reliant on using the kettle to heat water for her washing and was also using an electric heater downstairs whilst her boiler was broken and felt it was costing more in electricity.

*“I don't know how much I've saved exactly, but had I not had the boiler it would've cost me a lot. I was using the shower to bathe the kids, as well as myself and my husband using it. I'd use the kettle to do the washing up, every time you boil it that’s an extra expense.”*

When asked about what impact the new boiler had had on her home Aysha mentioned it had *“made a huge difference to my home.”* Before the boiler had been replaced the house was cold and Aysha felt it was not a suitable environment for the family. Aysha explained it was a cold time of year when her boiler broke and she had two young children, one of them was a new born. Aysha said: *“we were backwards and forwards to my mum’s because it was so cold. We had the electric heater but it just dried the air out and we only had that downstairs. It’s made a huge difference, definitely.”*

As well as the home being warmer Aysha also said that having access to hot water was a major improvement for her family. *She said: “when my children are washing their hands I'm not worried about them using cold water and getting a cold after it.”*

Aysha was very positive about the scheme and summarised her experience as *“A to Z it was brilliant, it was quick as well so I’m really, really pleased, I can’t fault it at all.”*
Case Study 2

**Profile:** Mr Smith aged 58 he recently retired early due to a stroke and redundancy. He lives with his partner in their own property.

**Involvement with scheme and work undertaken:**

Mr Smith was made redundant and went to the CAB to find out what support he was entitled to. He qualified for pension credit and was advised that this may also grant him access to the Councils Warm Homes scheme. The CAB advisor gave Mr Smith a contact number to ring. Mr Smith rang and spoke to someone at Keepmoat about the scheme who asked for further information. Following this an outreach worker came out to Mr Smith's home who advised that his boiler was not fit for purpose and that he qualified for a new boiler. Mr Smith explained “The boiler was 30 odd years old, was cracked, casing that was leaking.”

Mr Smith did not recall receiving any energy advice but mentioned he already had loft insulation and used energy saving bulbs.

The boiler was replaced within a three weeks and Mr Smith was impressed with how quickly the work was undertaken.

**Impact of the scheme:**

Mr Smith was very positive about getting a new boiler “Got this new boiler which is great.” When asked what impact he felt having a new boiler had made Mr Smith indicated that it would be difficult to measure due to other home improvements he had done to the property himself. However, he mentioned that they were now paying less to heat their home. “Before the work it was costing £1500 and now its £1000...Overall our fuel bills have gone down, what with the doors, roof and boiler - it's definitely part of the boiler, probably the main thing the boiler”

Mr Smith now considered his house easier to heat and felt it warmed up quicker than previously. “It's pretty instant heat where the old tank system, you were literally waiting half an hour for the radiators to get warm.”

Other positive impacts included now having more control over how he and his wife heated their home. Being able to use the thermostat setting meant they could control the temperature in their home and not worry about using the heating.

“Compared to before massively different, we knew it was inefficient so we tended it use it more wisely, more putting it on couple of hours in the morning and couple in the evening but now we feel we don’t need to worry about that.”

Mr Smith also indicated it had reduced their anxiety in relation to heating their home and financial implications.

“You are not worrying the same, as we are getting older, the other boiler could have gone anytime and we never had the cash to buy a new boiler at the time.” ... Nice to know that it is more energy efficient and there is no worry about it breaking down” “it’s just a big worry out of the way, could never have afforded it.”
Case Study 3

Profile: Shaleena Begum aged 44 is a single parent who works full-time. She lives in her own property with 2 children aged 18 and 15.

Involvement with scheme and work undertaken:

Shaleena had heard of the scheme through her family and friends who had advised her to apply as she claimed family tax credits. She was given a number to contact and mentioned that her brother looked into it as he worked in housing this lead to a visit from someone from the Council. Shaleena explained that the person took details about her wage and benefits. “Then everything got rolling and they [Keepmoat] came and took measurements and said I am entitled to it.”

Shaleena’s home did not have a central heating system, she had a gas heater that needed to be replaced and was reliant on electric heaters to keep her house warm. A new boiler and central heating system was installed in the house by Keepmoat.

Shaleena also mentioned she was given a leaflet and information on how to use the central heating, which she found ‘very useful.’

Impact of the scheme:

Shaleena now felt her house was warmer and the damp in the house had improved as a result of having a central heating system in the home. “Before my house was damp and cold, because it never had heat…It was cold and wet [condensation] but now there’s none of that.” The family felt the bathroom was also now easier to use as it was warmer “no one is shivering when they get out.”

How the family kept themselves warm had also changed and become easier. “We don’t have to sit around the gas fire to get warm and then go to bed with hot water bottles and stuff, we don’t need do that anymore so it's more relaxing going to bed.”

Shaleena also mentioned she now had constant hot water and that they no longer had to wait for hours for the water to heat up, this had made life easier in terms of washing and using the shower. “We’re just a normal happy family because we have got hot water…it does have a massive impact without knowing it.”

Being able to have access to hot water first thing in the morning was considered to have a positive impact on the health of her family. More specifically Shaleena mentioned her daughter often had some trouble breathing and coughed a lot but “I noticed through this winter she has not had any coughs or minor colds or anything like that.”

Having a central heating system meant that Shaleena was now able to control how she heated her home and that she could come home to a warm home “I can switch the temperature on and it will turn the heat on.”

Through being involved in the scheme an electric fault in the wiring was also picked up by Keepmoat. Shaleena had been told her house had been at risk of a fire. Keepmoat were able to resolve the issue leaving Shaleena feeling safe and reassured. “Now I feel safe…its warm, safe and I feel I don’t have to touch anything because it’s all been done.”
Case study 4

Profile: Sarah is a single parent aged 36 who lives with her 7 year old son in rented accommodation. She suffers from anxiety and back pain.

Involvement with scheme and work undertaken:

Sarah heard about the scheme through her landlord when she moved into the property. She then got in touch with Keepmoat. “I just phoned up and said I need a new boiler, he told me what they offered and I had to fill some forms in.”

Keepmoat came out to see Sarah and assessed her property; she already had insulation and heating system. However her boiler was not considered to be fit for purpose and she qualified for a new boiler. Sarah was very positive about the service “I am really happy and it was all pretty quick, the guys that actually came out were really, really nice and they explained it all properly to me.”

Impact of the scheme:

Sarah felt her house was now a lot warmer: “Has made a difference it's more warmer...you can feel the heat in every room now, with the old boiler there weren't a lot of heat coming so there is big difference. I know when the heating is on”

The new boiler allowed Sarah to have instant hot water. “I can have hot water on constantly with the other boiler it took 4 hrs for it to actually get warmed up so that was a big difference.”

She mentioned with her old system that if she had previously wanted hot water the heating would also come on costing her more. “It was costing a hell of a lot more”. “Its costings as much obviously I am using a card and I have noticed a difference I am putting £10 less in than I was.”

Sarah now felt she had more control over how she heated her home and used hot water. Having a bath has been made considerably easier. “If I want a bath I can have a bath and my after my son can have one and you don't have to wait”. “I would be getting in but I would be freezing, having baths now is warmer.”

Sarah explained that she had an operation on her back and suffers from pain when it is cold “when I am cold it doesn't help so I have benefitted from that as well as it's not as cold as no more. I am not freezing I can feel the heat even when I turn it off there is warmth in the house so I am not tensing up as much…”

Sarah described the impact on her well-being and how she felt a lot happier “I was really depressed before, I know its only boiler but every property I have lived I have had problems with the heating it was just like will I ever move into somewhere that has got actual heating that works. Obviously when I had this I was over the moon I know it's only a boiler”

She is also felt that there was a general impact on their health and mentioned no longer waking up with stuffy noses. “Know we are feeling a lot better with this new one.... it means a lot to have a warm home.”
Case Study 5

Profile: Sue Howarth aged 45 lives with her two young children aged 11 and 9 in rented accommodation. One of her children suffers from Asthma

Involvement with the scheme and work undertaken:

Sue got involved in the scheme after a member of the team from Keepmoat knocked on the door and told her about the opportunity of having her boiler replaced if she was eligible. At the time Sue refused because she had already had a boiler installed from Warm Front. However, a few days later her existing boiler broke.

Sue phoned Keepmoat who arranged to go out and replace the boiler with a brand new one.

Sue was happy with the work which was carried out: “the old boiler was on a different wall but it had to be moved because of a vent above it. They moved the piping and did a really tidy job.”

As well as fitting a new boiler the team from Keepmoat also did a check on whether Sue was receiving all the benefits she was entitled to. She was assured she was receiving what she should be.

Impact of the scheme:

Sue found that the scheme had benefitted her considerably; she mentioned “my home is now a lot warmer, I save a lot of money on gas, around £120 a year and it is really easy to use.”

Sue explained that her home is now easier to heat and her children who were no longer having to wear layers to keep warm. “I turn the heating on at night for an hour then it’s so warm I have to turn it off but then it stays warm for most of the night. My children were always cold, normally they had pyjamas and dressing gowns but now they just wear pyjamas.”

As well as making her home warmer, Sue mentioned that the new boiler had also helped with her daughter’s health. “My daughter has asthma, when she was visiting before she was finding it hard to breathe. Now she seems a lot better because I don’t have the radiators on as much because of the warmth and when it does warm it up it doesn’t dry the air up as much.”

Sue was very positive about the scheme and extremely happy with her new boiler. The new system provided her with more control over how she kept her home warm. “I'd definitely recommend it, the system itself is so easy to use, it's a lot better. As the thermostat is portable you can take it upstairs with you when you go to bed so that you can always control the temperature.”

On the whole Sue found that the scheme worked well for her. She reported that her home was warmer, her children were now more comfortable and the new boiler had, had a very positive impact on her daughter’s health. Sue said she would recommend the scheme to others: “definitely the elderly.”
Case Study 6

Profile: Mr Pollard is a 68 year old pensioner who lives alone in his own property. He is living with a disability after having his leg amputated.

Involvement with the scheme and work undertaken:

Mr Pollard received a phone call from a member of the Warm Homes Oldham scheme who explained about the possibility of a new boiler being installed. One of the members of the team then went to visit Mr Pollard at his home to explain the scheme in more detail.

Mr Pollard knew that his existing boiler was old and was therefore at risk of breaking and him being without heating and hot water. “My old boiler was 22 years old and you can't get the parts for it anymore.”

As well as the boiler being old Mr Pollard also said his living conditions were poor at the time due to the cold and lack of hot water. “The boiler was slow at heating up, the house was cold and the hot water was slow to come on.”

As well as arranging for a new boiler to be installed the team also looked if there were any financial savings Mr Pollard could make. “A member from the team phoned up my energy supplier and asked them if there were any further benefits I can claim but as I'm over 65 I already get all the benefits I'm entitled to.”

Impact of the scheme:

Mr Pollard said that his house was now warmer and that this had, had a positive impact on his health. “Because I've had my leg amputated, when the house was very cold this affected my overall health.” Mr Pollard also explained that he needs to maintain a certain temperature in his house otherwise the cold affects his leg. The new boiler enabled him control the heat in his home and no longer rely on an electric heater to keep warm. “With the old boiler I couldn't keep the house warm so I used to sit near an electric heater all the time.”

Mr Pollard also appreciates how easy the new system is to use. “I can use the digital setter, I can set at 18 degrees Celsius, it will get to a certain temperature and then it will switch off.”

As well as finding it easy to control when the heating switches off Mr Pollard also found that the new system means his home doesn't get too cold either: “It's easy to keep your home warm. If it falls below a certain temperature, it'll automatically switch on.”

Mr Pollard is now enjoying being able to keep his home heated and described “I'm nice and warm now.” Mr Pollard talked positively about the scheme and the service he had explaining that when he had encountered a problem with his new boiler it was quickly resolved.

“Having a boiler replaced is good, I'm quite happy because a lot of people can't afford a new boiler. Everything is warmer and I'm happy.”
Case Study 7

Profile: Mrs Akhter aged 37 suffers from anxiety and lives in her own property with her three children aged 16, 15 and 9.

Involvement with the scheme and work undertaken:

After a friend recommended the scheme to Mrs Akhter, she phoned the council after her boiler broke to see if she would be eligible for any help in getting a replacement “I was asked about my income to see if I could get a boiler for free.” A member from the Keepmoat scheme visited Mrs Akhter to assess her situation and to take proof of her income.

“Someone came round and checked my details, after a week they phoned me and said I would be eligible for a new boiler.”

Impact of the scheme:

Before the boiler was installed Mrs Akhter described “the house was cold and we had no hot water.” The new boiler meant Mrs Akhter was now able to heat her home and have access to hot water.

Mrs Akhter also discussed the impact this had on her family as her son has autism: “we have to bath him all the time but because the water was cold, we had to keep filling kettles up and it was a problem.” The new boiler made bathing her son easier and less time consuming.

Mrs Akhter felt that the team were very sympathetic to her family situation and said: “when someone initially came to talk to me about it, I told them about my son as well and they did the work really quickly for me.”

The work was completed within a week and a half and Mrs Akhter reports feeling the benefits of the new boiler instantly: “as soon as they’d done it, they put the heaters on and the whole house was warm.” Mrs Akhter feels that the work was a success: “it hasn’t given us any problems since being installed.” In terms of financial savings Mrs Akhter reported that her energy bills have remained the same but she saved a lot of money having a new boiler installed free of charge.

Overall Mrs Akhter feels that the scheme extremely beneficial: “it’s made a big difference to how my home feels, it feels really good and warm.” Mrs Akhter also feels that the scheme would be very beneficial to others: “lots of my friends have also had help and it’s made a big difference to them.”
Case Study 8

Profile: Mrs Birrell aged 77 is a widowed pensioner who lives alone and suffers from Arthritis and high Blood Pressure.

Involvement with the scheme and work undertaken:

Mrs Birrell was aware that her boiler was old and would eventually need replacing: “the old boiler was as old as the house and the parts were becoming obsolete.” Initially she contacted Age UK who referred her onto the council. Following this a member of the Keepmoat scheme went to see Mrs Birrell to see if she was eligible for the scheme. Mrs Birrell qualified for a new boiler.

The outreach worker from the scheme also assessed Mrs Birrell’s benefits and as a result of this she is now claiming extra pension credit which she is entitled to but was not claiming previously.

The work was carried out soon after Mrs Birrell was approved for the scheme without any problems: “fitting the boiler was straightforward, everything was ok.”

Impact of the scheme:

Mrs Birrell described how she used to heat her home before the new boiler. She indicated that she would always time how long she had the heating on for to ensure she kept her energy bills low. She mentioned her old boiler was not heating the whole house sufficiently and she had to rely on using an electric heater.

“I had an electric heater and when I went to bed I used to have one upstairs but I'd switch it off after a set time to control my bills. I would be very controlled so I knew what I was spending.”

Mrs Birrell finds the new system easy to use and more efficient in terms of keeping a track on how much energy is being used: “the new system uses a temperature control which turns itself off once it reaches a certain temperature. I prefer it like this as instead of having it running, I can control it myself.”

Mrs Birrell discussed her health issues: “I have osteoarthritis and when you get damp and cold you start aching.” Now her home is warmer she is feeling the benefit, not only on her health but also feeling less confined in her home: “I feel better because my home is warmer. I'm not as restricted as before. I no longer have to stay in one room with the heaters on, now the whole house is warm and it makes you feel comfortable. It's nice to be able to move around the house.”

Another improvement Mrs Birrell discussed was the financial savings she was now making as a result of the scheme: “I'm saving about £15 a month and I've also had a rebate. My bills are better than before.” Mrs Birrell income had also increased as result of the scheme and she was now accessing an extra £77 per week through pension credit.

Overall Mrs Birrell was really pleased with the scheme with her health and finances having benefitted greatly from having a new boiler fitted. Mrs Birrell said: “you're doing a very good job. I think it's really good. You've worked very hard and I appreciate that.”
Case study 9

Profile: Jean Walsh is an elderly widow aged 66 who lives alone in her own home. She suffers from COPD and Reynard’s disease.

Involvement with scheme and work undertaken:
Mrs Walsh had been getting calls about boiler replacements asking for payments that she could then reclaim from the government. She had mentioned this to her daughter who got in touch with Age UK. Age UK provided information about the councils warm home scheme and gave her the contact details for Keepmoat. Following this Mrs Walsh received a phone call from Keepmoat who then visited her to make an assessment. Mrs Walsh qualified for a new boiler and this was installed within 2 months. She also had heating controls added to her existing radiators.

Mrs Walsh was also offered a benefit check and recalled receiving advice on how to keep warm in her home. “Keep doors shut proper, closing the blinds and curtains, little tips. I draw my blinds every night and draw the curtains, make sure my windows are shut.”

Impact of the scheme:
Mrs Walsh explained that before her new boiler if she had wanted hot water she used to heat water in the kettle. She would limit the use of her boiler as she could not afford to pay the heating bills. The thermostat now enabled her to keep the boiler on a low setting, something she could not do previously. The new boiler now allowed her access to hot water when she needed it.

She also mentioned that she had little control over the old central heating system but now. “I can now turn them (radiators) on and off, valve with numbers on.” This meant that Mrs Walsh could control the temperature in her home. “It’s nice and convenient to put on and off when I want.”

Mrs Walsh now considered her home to be warmer and she was able to do move around the house and do what she wanted. When asked what her house was like before she said it was cold in between the times she had turned the heating off. “I mean in the afternoon before I had this boiler when it was cold in the house I couldn't sit and read because it was so cold but now i put the boiler on, I can sit and have a read.”

“When I go to bed at night the bedroom is nice and cosy you know before it was freezing in the bedroom I had a 14.5 duvet and now I only have a 10.5 so that is better isn't it”

In terms of costs Mrs Walsh felt it was hard to say at this point if it was cheaper but through the scheme she had been informed of a fuel payment grant for pensioners. She had qualified for this (£135) and also mentioned she used to pay £116 but was now paying £100 on her bills.

Mrs Walsh mentioned her COPD is affected by the cold. “I suppose it’s helped in that respect I can turn it [heating] up and although I could turn up the other one it was expensive.”

Mrs Walsh also explained she had Reynard Disease in her hands and the heating helped her circulation. “I can put my on hands on the radiator to get the circulation going it has helped me.”

Mrs Walsh was happy with the service she received and felt very positive about the scheme. “Personally it has been a really good thing, I didn’t know about the scheme...could be of benefit to other people; you are warmer.”
Case Study 10

Mrs Jenkins aged 50 is a disabled widow who lives alone in a rented property. She suffers from Arthritis and depression.

Involvement with the scheme and work undertaken:

Mrs Jenkins saw a stall on the inside market where the Keepmoat scheme was being promoted. The team asked Mrs Jenkins if she was in receipt of any benefits and as she did they said she might qualify for the scheme.

Following this a member of the Keepmoat team went to visit Mrs Jenkins to assess if she would qualify for the scheme and she did. Mrs Jenkins said: “they came and knocked on the door, took some measurements and a month later a new boiler was being installed.”

Impact of the scheme:

Prior the boiler being installed by Keepmoat Mrs Jenkins had been without a boiler for 18 months. Her husband was still alive at the time but he was severely disabled and had suffered from a stroke. Mrs Jenkins described their situation “we weren’t going to bed at night, we were leaving the fire in the living room on and sleeping next to it, we used to sit with quilts on shivering. With the old boiler we used to have it on all day but it didn’t have any impact, as soon as you moved from one room to the next you knew you’d moved.”

Mrs Jenkins felt there had been many benefits from having a new boiler fitted this included both financial and health benefits. “I’ve saved a lot on gas and electric. Previously I was using an electric heater and whenever I was in the kitchen I was putting the electric oven on to warm the kitchen up, whilst I was in there.” Mrs Jenkins indicated that she was saving on average £10 a month.

Mrs Jenkins mentioned that she is registered disabled and “riddled with arthritis.” She explained that she had been prescribed painkillers for this and used to take a lot of them as being cold aggravated her arthritis. However since having the new boiler fitted this had changed. “It’s cut my tablets in half, which is good. I’ve still needed painkillers but not in the quantity I was taking them. My doctor asked me what the difference was and I said, well it’s surprising what you get when you have a brand new boiler put in isn’t it? He agreed it’s because of the heat.”

Mrs Jenkins was now able to access instant hot water when she wanted and was no longer having to wait for water to be heated to suitable temperature making having a bath and washing up easier. Mrs Jenkins said: “with the old boiler to get hot water you would have to put the heating on half an hour before you wanted the water. You couldn’t wash up and have a bath with the water, it would go cold. Whereas now, within 5/10 seconds it’s there.”

The house was now considered warmer by Mrs Jenkins and even her family who visited “My grandson even asked if he could move in, I asked why, he said your house is warmer than mine.”

Overall Mrs Jenkins said she was really pleased with the scheme and felt it would be very beneficial for people with disabilities and contributed to improving quality of life. “I think a lot of people, like I found, if you’re taking painkillers in the quantity like I do, I think it will really benefit them. If you’re not taking a tablet and you’re feeling alright, or the best that you can be, it’s adding to the quality of your life. So I think it’s a really good scheme.”