Proving the additional costs of rurality associated with providing core local government services

Fair Funding Review

- Original consultation on Fair Funding proposed in the Foundation Formula a basic amount as well as top-ups for sparsity and deprivation (and omitted mention of density)
- Since the consultation, density has re-emerged as a consideration with MHCLG identifying Journey Time Statistics as favoured approach for capturing both sparsity and density
- Journey Time Statistics are Department for Transport data
- Three aspects identified:
  - Dispersal
  - Traversal
  - Remoteness

Journey Time Statistics

- ***Dispersal*** – journey times from households to service ‘hubs’, reflecting travel to households for service such as domiciliary social care
- ***Traversal*** – journey times between households, or very small groups of households, to reflect delivery routes for services such as waste collection
- ***Remoteness*** – additional costs incurred due separation from major markets

- MHCLG current position is that these measures would be included as part of the Area Cost Adjustment
- Sparsity and Density, in existing formula, are ‘top-ups’

Journey Time Statistics

- Journey Time Statistics (JTS) appear to provide a better proxy for the additional costs associated with serving a large rural area (as well as the costs associated with traffic congestion in more urban areas)
- As such, RSN/CCN cautiously welcome the use of JTS in any new formula subject to:
  - Equal application across all authorities with no differential weighting (as there currently is for density and sparsity)
  - The impact of Journey Time Statistics should not be nullified by other factors in the Area Cost Adjustment
  - We do not agree that Journey Time Statistics adequately reflect ‘unmet need’ or fully reflect the the additional fixed costs in rural areas to provide more ‘hubs’ and feel that this should be separately allowed for within the formula

Proving the additional costs of serving rural areas

- Government and non-rural authorities continue to point to lack of quantifiable evidence to support additional costs of service provision in rural areas
- Purpose of this study is to find such evidence
- To date, we have identified two proofs of concept
- Unmet need

Proof of Concept: Waste Collection Costs

- Waste collection is a universal service
- By using authority-level activity data and overlaying this with national statistics on rural/urban classification at output area level, we were able to calculate differentials in time taken to collect refuse from different areas within the same authority
- We have received waste collection round information from 4 North Yorkshire authorities and 1 Devon authority

Proof of Concept: Methodology

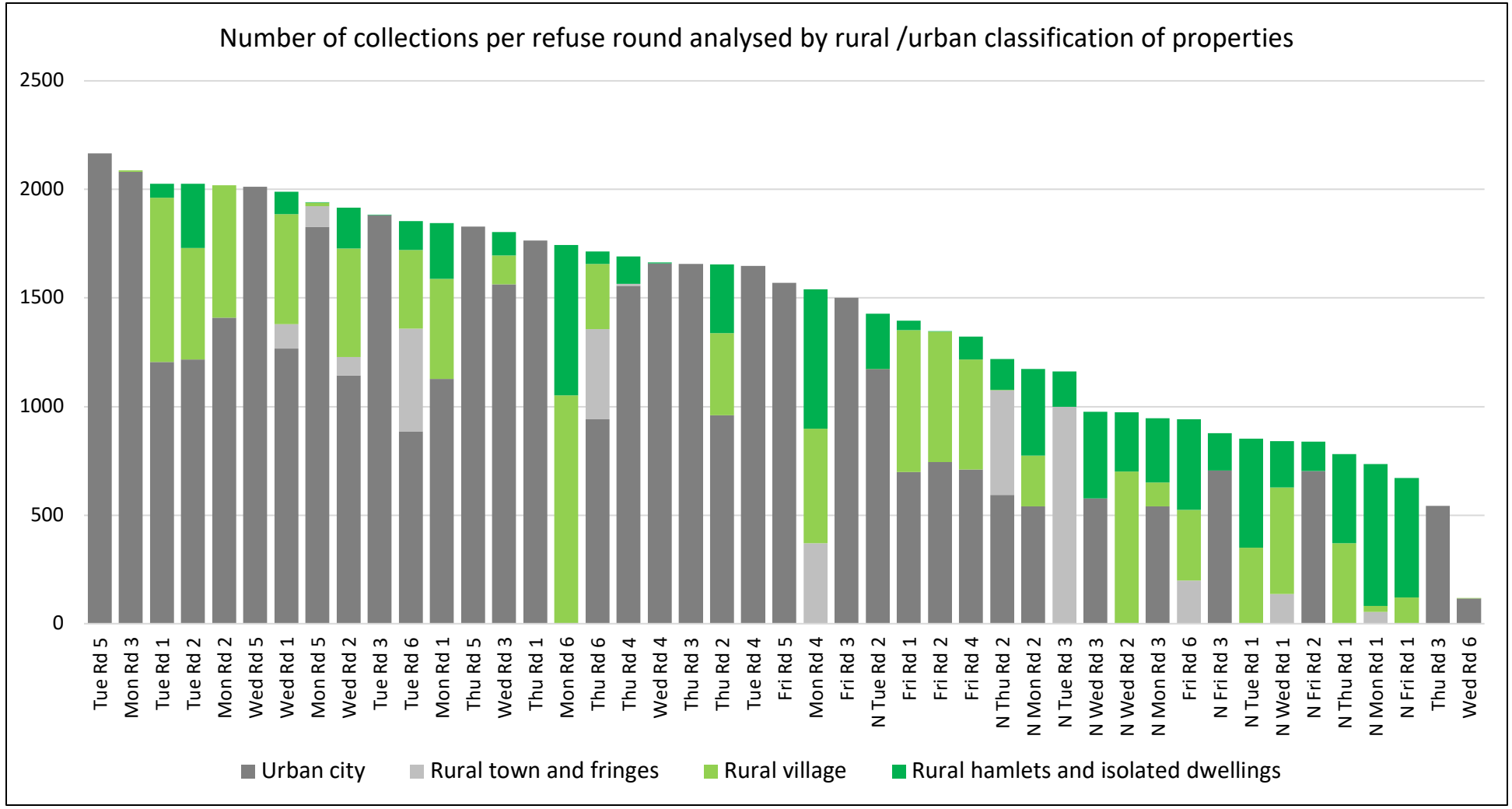
Dataset	Description	Details
Waste Collection Property Details	Local Authority Activity Information	All properties with postcode and details of collection crew and collection day
Postcode to OU lookup	A file linking all England postcodes to Output Area codes	When matched with activity data allows all properties to be assigned to an output area
OU Rural/Urban Classification	A file linking all Output Areas to their rural or urban classification.	Matches each property to one of four rural / urban classifications: • Urban city • Rural town and fringes • Villages • Rural hamlets and isolated dwellings

- Authorities sent us details of their waste collection rounds with postcode for each property
- We matched this postcode to an output area
- We were then able to designate each property with a rural or urban classification
- For each round we then calculated the number of properties from each rural / urban classifcation

Refuse Collection: Harrogate Borough Council

- HBC appear to have two types of rounds – three rounds are prefixed ‘narrow’ and these are more rural in nature and use a more narrow vehicle but have same number of personnel than other rounds
- Narrow rounds collect average of 934 properties and other rounds collect average of 1,689 properties
- The following graph shows all rounds – it shows that the rounds which collect the most properties per day tend to be in more urban settings (ie. the towns of Harrogate, Ripon and Knaresborough)

All Harrogate Rounds



Harrogate Rounds – mileage information

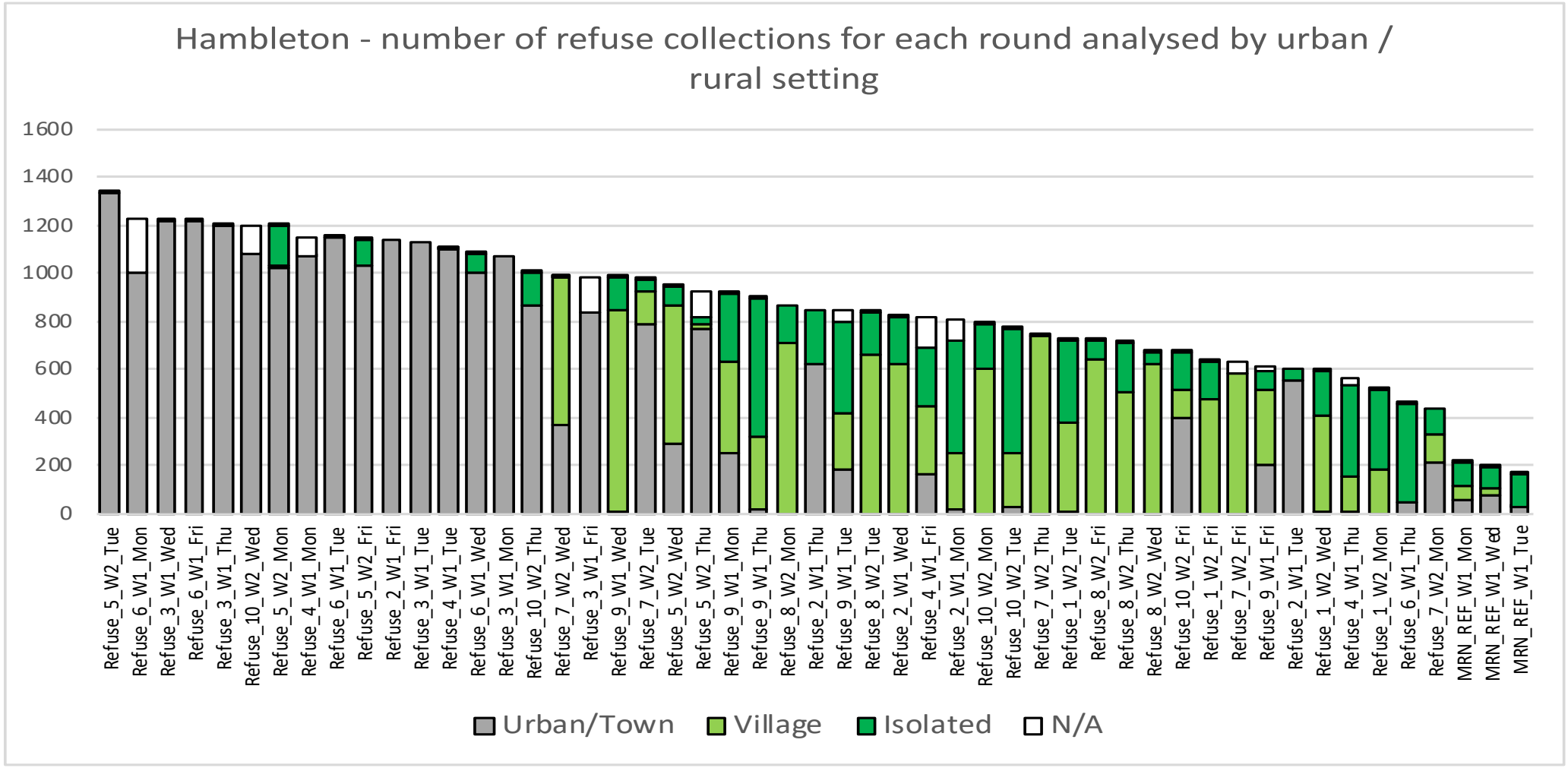
Round	Annual Km	Properties per year	Average distance between properties (metres)	Percentage of hamlets and isolated dwellings properties
Narrow 1	32,124	100,906	318	50%
Narrow 2	26,011	146,354	178	21%
Narrow 3	23,520	133,146	177	20%
Refuse 1	26,196	165,724	158	20%
Refuse 2	27,160	204,516	133	11%
Refuse 3	25,792	234,494	110	5%
Refuse 4	23,071	232,284	99	1%
Refuse 5	21,297	246,740	86	0%
Refuse 6	20,038	233,038	86	9%

- Mileage data shows that those rounds with a higher proportion of hamlets and isolated dwellings had a greater average distance between properties
- Narrow Round 1 travels almost 4 times the length between properties than do the mainly urban refuse 5 and 6 rounds
- This is not only more expensive in terms of fuel but also in terms of the unproductive travel time of the loaders

Harrogate Rounds – summary

- The Harrogate analysis shows that there is an additional ‘traversal’ cost (ie. unproductive journey time between households) in relation to waste collection for isolated properties and properties in hamlets
- Mileage analysis supports this conclusion highlighting a greater distance travelled between properties on those rounds with a greater proportion of hamlets and isolated dwellings

Hambleton District Council



Extending the analysis

- The waste collection analysis received so far shows clear additional ‘traversal’ costs associated with collecting waste from rural areas
- We have developed a methodology, using authority activity data, which matches a post code to a rural/urban classification
- Having developed this methodology, which works effectively, with waste collection, we are looking to apply it to other services where we can show ‘traversal’ (travelling between properties) and ‘dispersal’ (travelling from a service hub to a property) costs

Proof of Concept: Fire Stations Analysis

- It is often the case that rural authorities which serve large dispersed areas provide more local ‘hubs’ in order to provide better access to services
- This results in higher level of fixed costs
- We believe that the provision of additional local hubs reduces ‘dispersal’ costs as it cuts down the travel required by both service user and provider where services are provided from a hub
- However, MHCLG has looked at this as part of remoteness
- The consultation indicates that the fixed costs allowance, important to smaller authorities, is no longer being considered as part of the formula
- We looked at nationally available data on fire stations to prove the concept

Proof of Concept: Fire Stations Analysis

- From MHCLG paper (July 2018): Remoteness

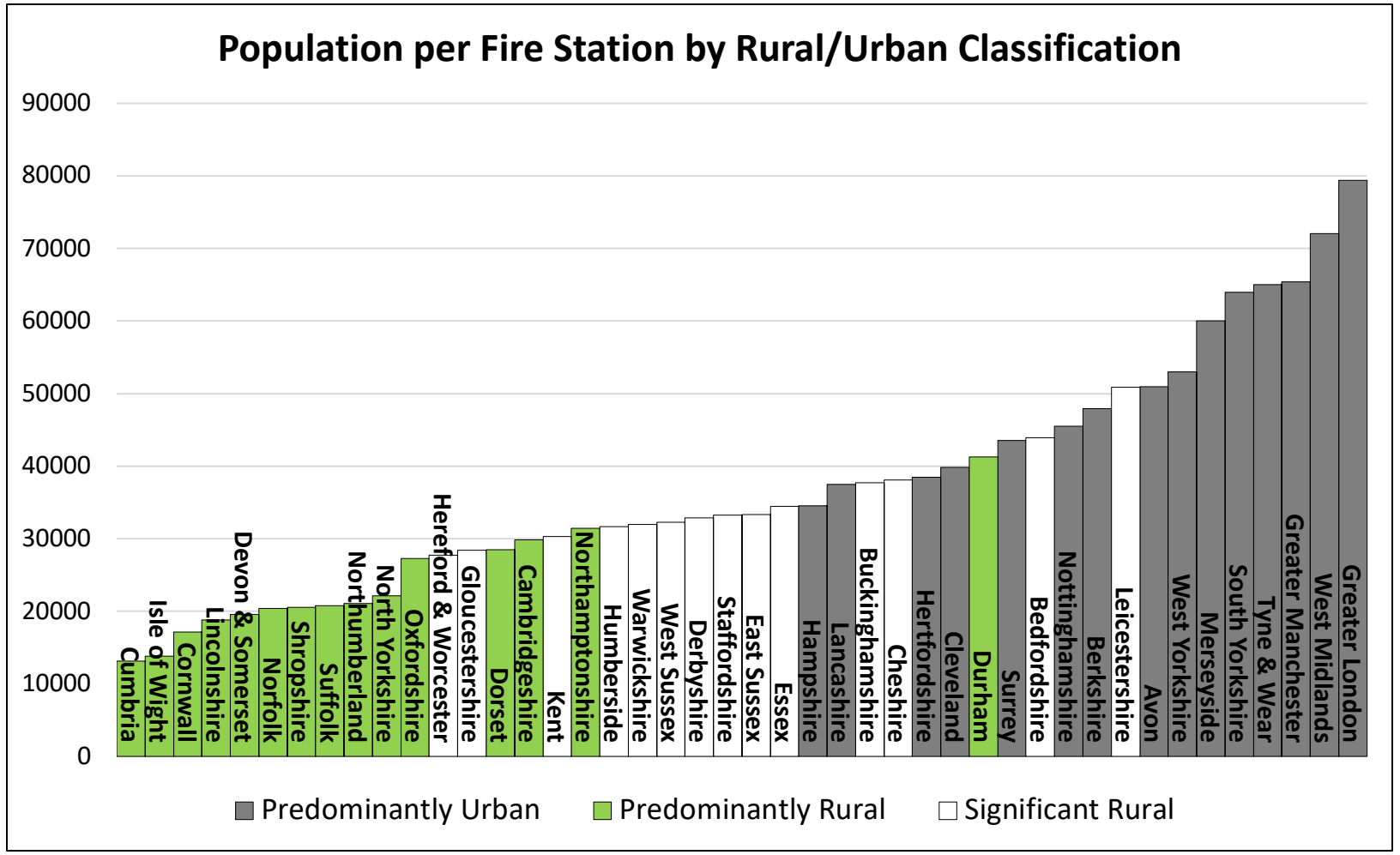
Authorities may choose to support production at a smaller scale, for example if this is less costly than providing transport to or from major markets. Adjusting for remoteness by assuming that journeys are made to or from major markets compensates authorities while maintaining their incentive to deliver services at the lowest possible cost.

Proof of Concept: Fire Stations Analysis

- From national fire statistics covering number of fire stations across 44 fire authorities
- From this information, we calculated the average population served by each fire station
- Calculated this for predominantly rural, predominantly urban and significant rural

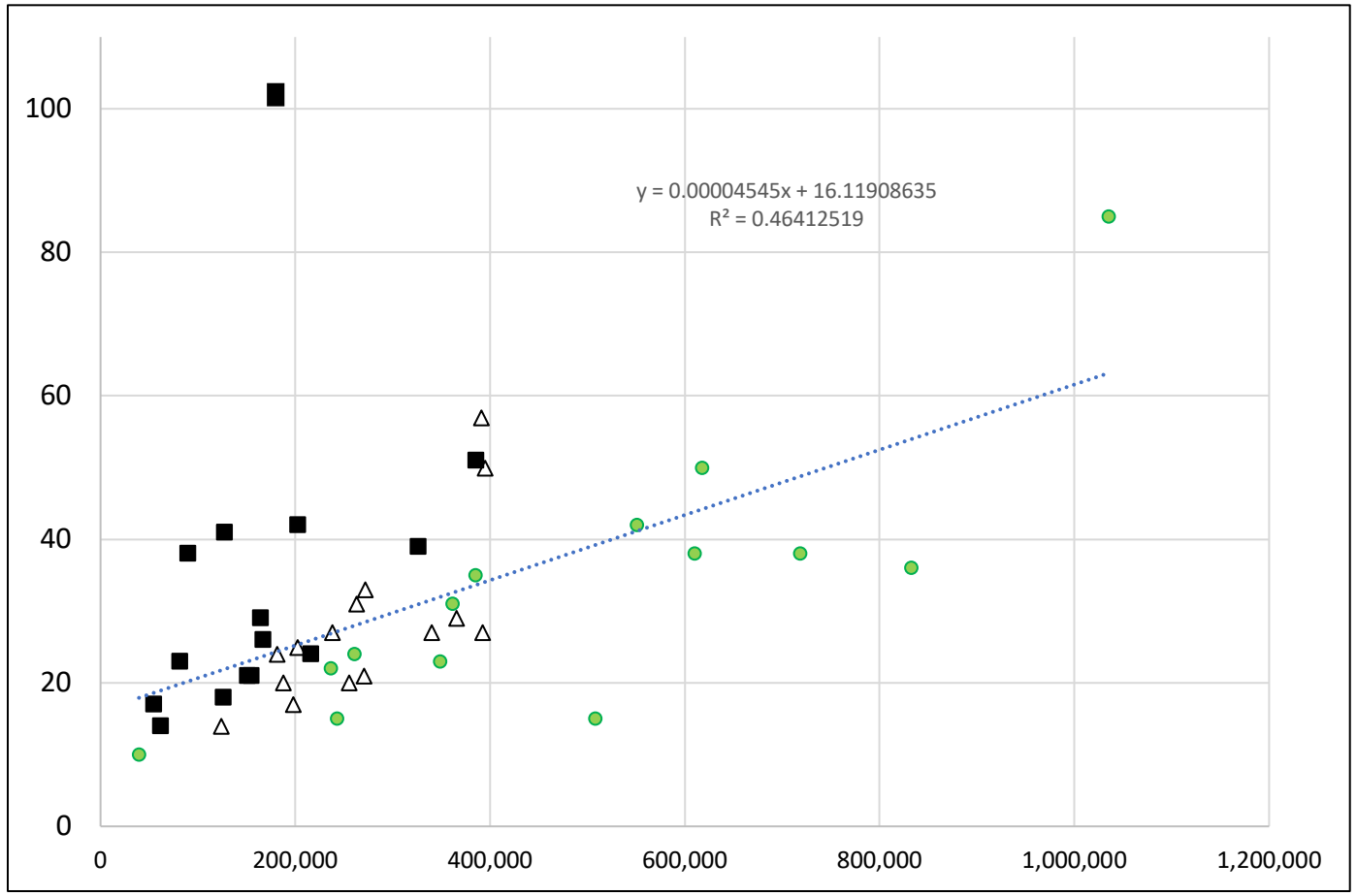
Type of Fire Authority	Average Population per Fire Station
Predominantly Rural	22,226
Significant Rural	33,920
Predominantly Urban	56,607

Proof of Concept: Fire Stations Analysis



- Rural fire authorities provide significantly more fire stations to provide the required coverage

Relationship between number of fire stations and areas served in hectares



Black Square – Urban
Triangle – Significant Rural
Green Circle – Predominantly Rural

The greater the area the more fire station hubs required

What other services might follow this pattern?

- Libraries
- Leisure Centres
- Social Care Homes

Can we get the evidence?

Summary: Fire Stations Analysis

- The analysis supports the assertion that in rural areas, more service hubs are required to serve more sparse and remote areas
- This translates to higher costs associated with those additional hubs
- Which other services does this ‘additional hub’ concept apply?
  - Council Offices
  - Social Care establishments
  - Libraries
  - Leisure Centres
- Does the data exist at a national level or across a number of authorities or within a single authority?

Unmet Need

- A commonly held view is that ‘unmet need’ exists more in rural areas
- ‘Unmet need’ are needs that have never been fulfilled due to little or no funding
- Related to service hubs argument – rural authorities have to provide more local hubs in order to meet need (and therefore avoid unmet need)
- Public transport is the area where unmet need is most clearly demonstrated – very low expenditure on bus travel and concessionary travel due to low funding but clearly there is a need.
- We are working to demonstrate ‘unmet need’ in other areas