



# **Guidance Document for SEAI's Energy Master Planning Dashboard**

Supporting the Sustainable Energy Communities in their Energy Master Planning through the launch of the Energy Master Planning Dashboard

**Data and Insights Department  
Ver 2.0 (February 2025)**

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## 1. Introduction

### 1.1 Sustainable Energy Communities

There are approximately 900 Sustainable Energy Communities (SECs) nationally. This Dashboard will help these SECs prepare an Energy Master Plan (EMP).

To support in the preparation of an EMP, the Sustainable Energy Authority of Ireland (SEAI) has prepared this dashboard to help visualise and summarise key residential energy related data broken down to the community level. The EMP Dashboard will allow these SECs to understand the current residential building stock within their areas in an intuitive visual way by exploring detailed data on dwellings that have had Building Energy Ratings (BER) assessments carried out. This will help communities understand, for example, the typical age of dwellings in an area, the primary type of walls used to construct those dwellings, or the primary fuel source used by homeowners to heat their homes. In addition, communities can download data into a spreadsheet for further analysis, print informative maps for reports and monitor the uptake of SEAI grant funding within their area.

### 1.2 Overview of Dashboard

The SEC-EMP Dashboard is a tool developed by SEAI to make key residential energy data available to SECs for planning and informing their Energy Master Planning.

The current release of SEAI's SEC-EMP Dashboard provides community level summaries of data in the following areas:

- **Building Energy Ratings**
- **Dwelling Types**
- **Year of Construction**
- **Fuel Types**
- **Wall Types**
- **Heat Loss Indicator**
- **Renewables**
- **Grants**

Note that the boundaries of an SEC are defined by a set of Census Small Areas.

The dashboard allows the community mentors and contractors to explore these energy topics in an intuitive visual way and download the data for their own analysis. This explanatory note aims to explain the operation of the dashboard and draw attention to any relevant technical details and caveats that may assist with the interpretation of this data.

→ SEAI's Energy Master Planning Dashboard (SEC-EMP) can be accessed [here](#)

SEAI intends to revise and extend each release of the SEC-EMP dashboard, to accommodate requests and suggestions from the communities and other users (where possible) with the data that is currently available. It will do this through direct consultation, through collecting questions, data requests and/or suggestions through our mailbox [epssu@seai.ie](mailto:epssu@seai.ie).

## 2. Interacting with the SEC-EMP Dashboard (Desktop)

→ SEAI's Energy Master Planning Dashboard (SEC-EMP) can be accessed [here](#)

### 2.1 Filter Tool

On the top right of the dashboard, you can use the Filter to Community tool to select your Sustainable Energy Community (SEC). This tool filters out the chosen community and will then zoom in on the map to this location. This is programmed to filter all tabs when you click *Apply*.

*Tip: You can type your SEC name into the filter box or use the drop-down menu to select your SEC.*

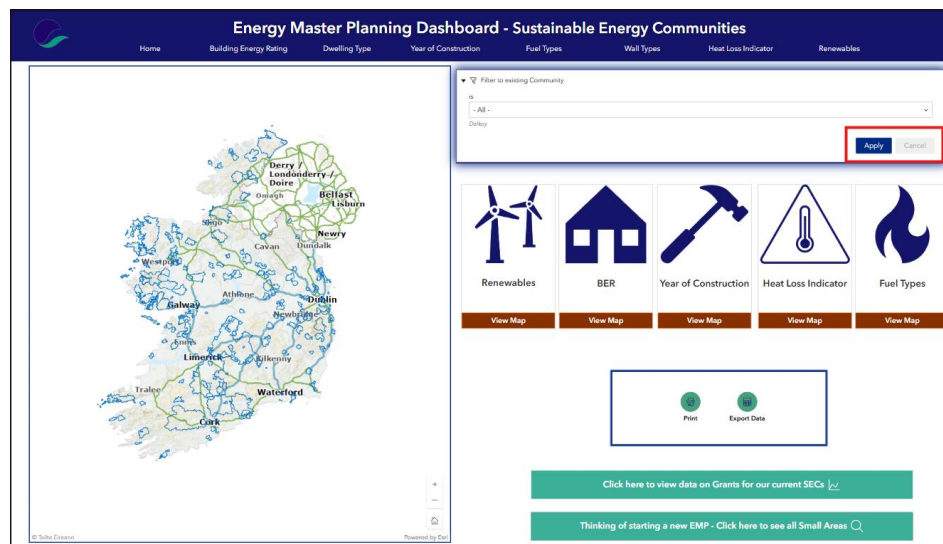


Figure 1 Home page of SEC EMP Dashboard

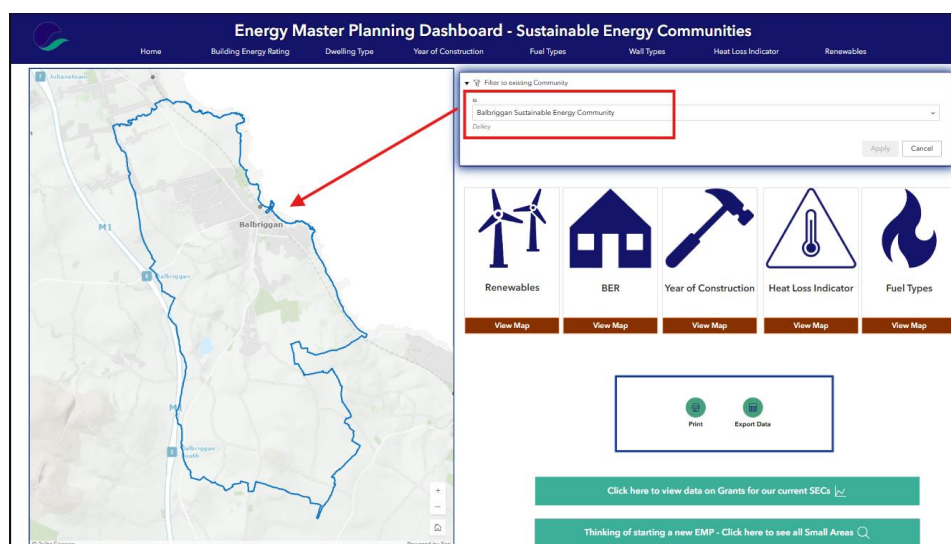


Figure 2 Balbriggan SEC - with map zoomed in on boundary outline

## 2.2 Downloading Data

When you click on the widget button *Export Data*, a table will appear on the screen. Note that if you have previously applied a filter the table will only display data for that particular SEC. There is an option to export as a csv file or a Json file. Click on the icon (4 dots highlighted in yellow) in the top right-hand corner of your table to display the exporting options.

The screenshot shows the 'Energy Master Planning Dashboard - Sustainable Energy Communities'. The dashboard includes a map on the left, a filter dropdown for 'Filter to existing Community' (set to 'Balbriggan Sustainable Energy Community'), and a table titled 'Export Data'. The table has two tabs: 'Individual BER records' and 'Small Area Aggregates'. The 'Small Area Aggregates' tab is selected, showing a table with columns: SMALL AREA, EMP\_ID, SEC\_NAME, BER\_RATING, ENERGY\_VALUE, CO2\_VALUE, YEAR\_OF\_CONSTR..., and DWELLING\_TYPE. The table contains six rows of data for Balbriggan Sustainable Energy Community. Below the table, there are buttons for 'Print' and 'Export Data' (highlighted with a red box). At the bottom, there are two green buttons: 'Click here to view data on Grants for our current SECs' and 'Thinking of starting a new EMP - Click here to see all Small Areas'.

SMALL AREA	EMP_ID	SEC_NAME	BER_RATING	ENERGY_VALUE	CO2_VALUE	YEAR_OF_CONSTR...	DWELLING_TYPE
267.002.001	EMP226	Balbriggan Sustainable En...	A2	26.57	3.4	2,022	Detached
267.002.001	EMP226	Balbriggan Sustainable En...	C1	155.59	39.35	1,940	Semi-Detached
267.002.001	EMP226	Balbriggan Sustainable En...	A2	37.31	8.09	1,890	Detached
267.002.001	EMP226	Balbriggan Sustainable En...	E2	348.94	88.31	1,762	Detached
267.002.001	EMP226	Balbriggan Sustainable En...	A2	26.57	3.4	2,022	Detached
267.002.001	EMP226	Balbriggan Sustainable En...	C1	155.59	39.35	1,940	Semi-Detached

Figure 3 Showing Table export settings

There are 2 table options to download.

- **Individual BER Ratings** – This table includes dwelling-specific data collected during a BER assessment. Each row in this table corresponds to a unique dwelling, which has been anonymised and geolocated to the census small area level. This table contains additional information on homes that is not featured within the dashboard itself.
- **Small Area Aggregates** – This table includes BER data that has been aggregated up to the level of census small area. This table contains additional information on homes that is not featured within the dashboard itself.

## 2.3 Pre-set cards on homepage

Click on the *View Map* button. This will open a new page with the associated information.

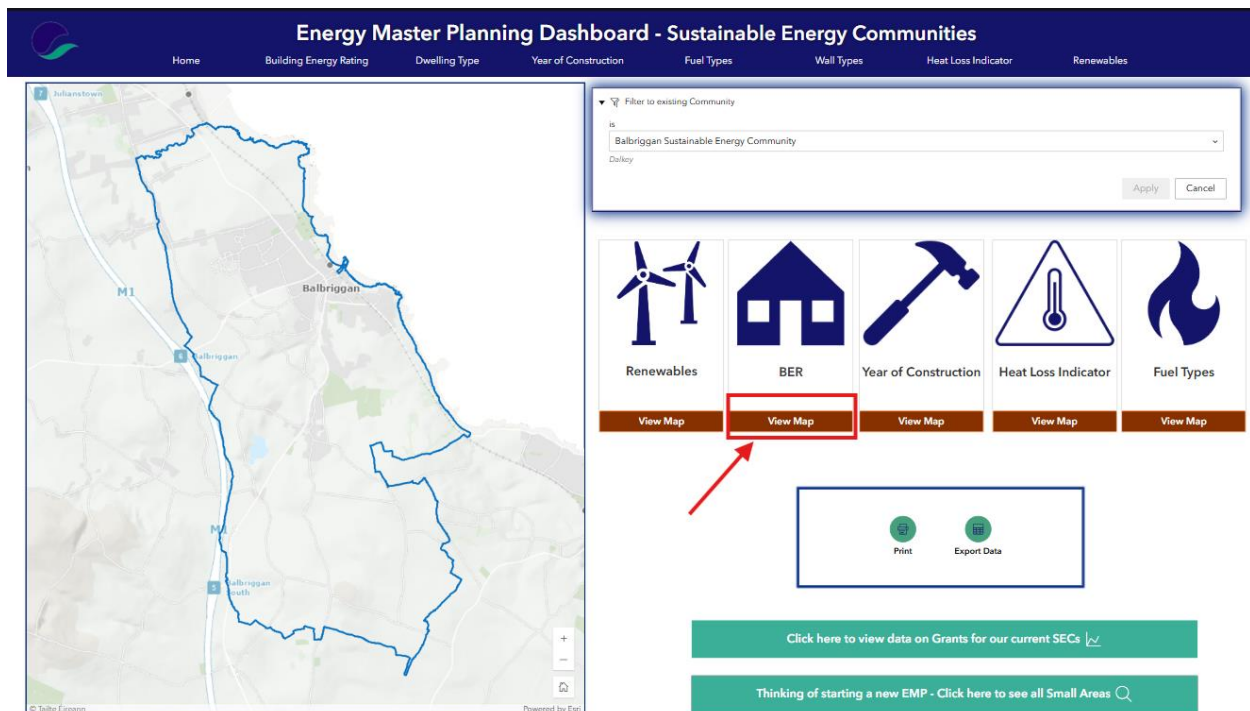
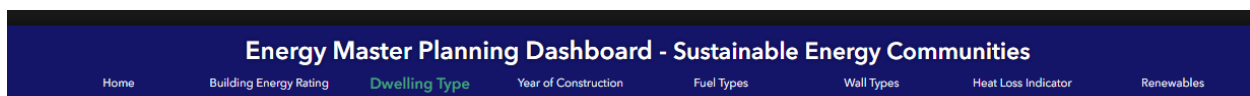


Figure 4 Cards on Homepage

*Tip: An alternative option to direct you to a page is through the tabs at the top of the dashboard. The page you are currently viewing will have the text coloured in green. Click through all of these to view the various energy related pages. See section 2.5 for more information*



## 2.4 Printing/Exporting Map Images

Click on the Print widget button to open the print options. Each of these print icons are linked to the associated map within the page. You can toggle the settings in this tool, for example changing the map title, adding a scale bar or North Arrow. This is useful if you wish to export a map for adding into a report. Click print at the bottom of the settings and check your results.

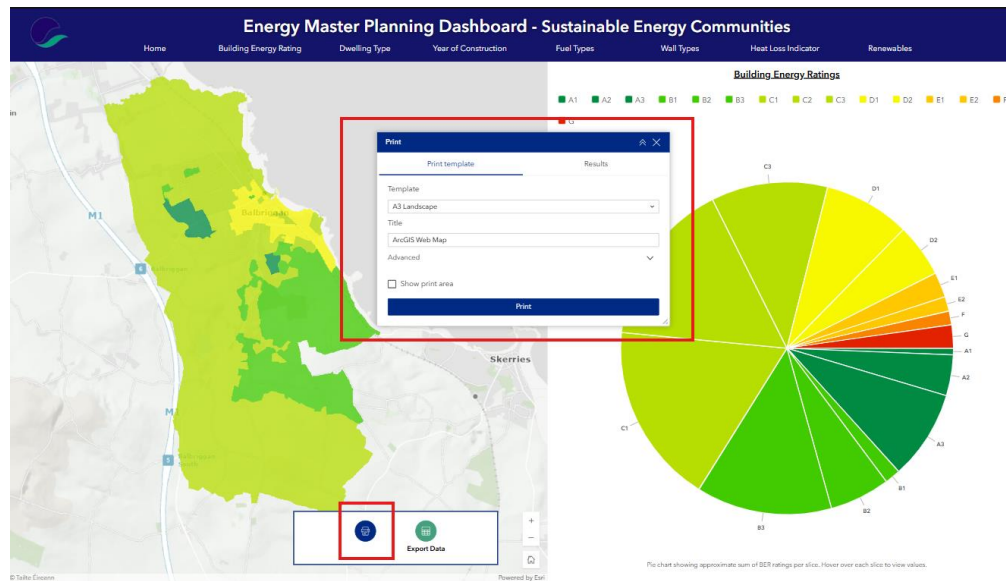


Figure 5 Printing Widget box

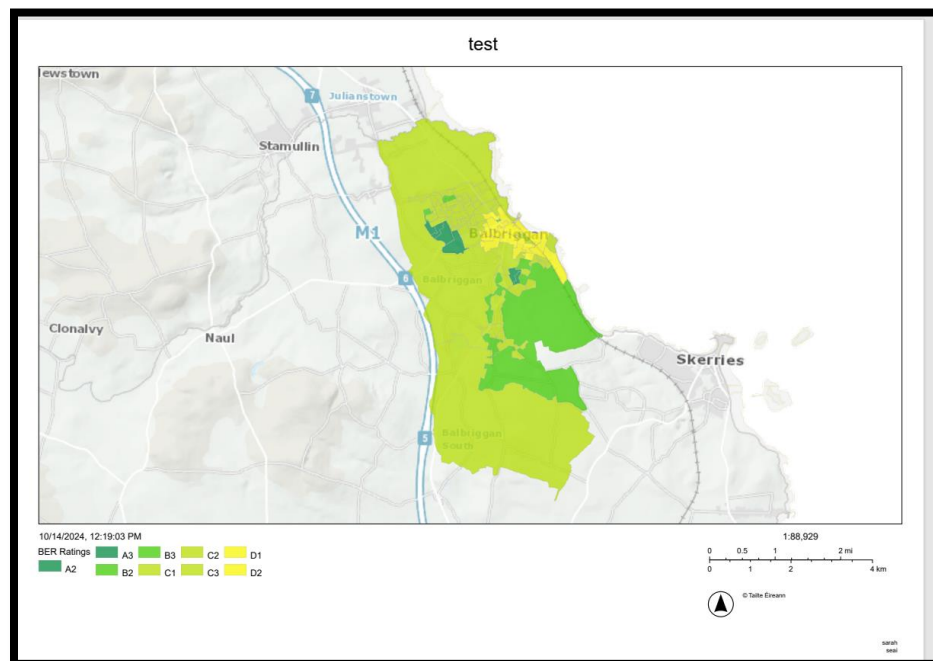


Figure 6 Showing exported printable map



## 2.5 Charts

Each Page will have an associated chart e.g. a pie chart, line graph or bar chart. Again, if you have set a filter the charts and map will automatically update for your filtered community. All slices have a label and a value, and you can hover over the slices to get the total percentage of that attribute.

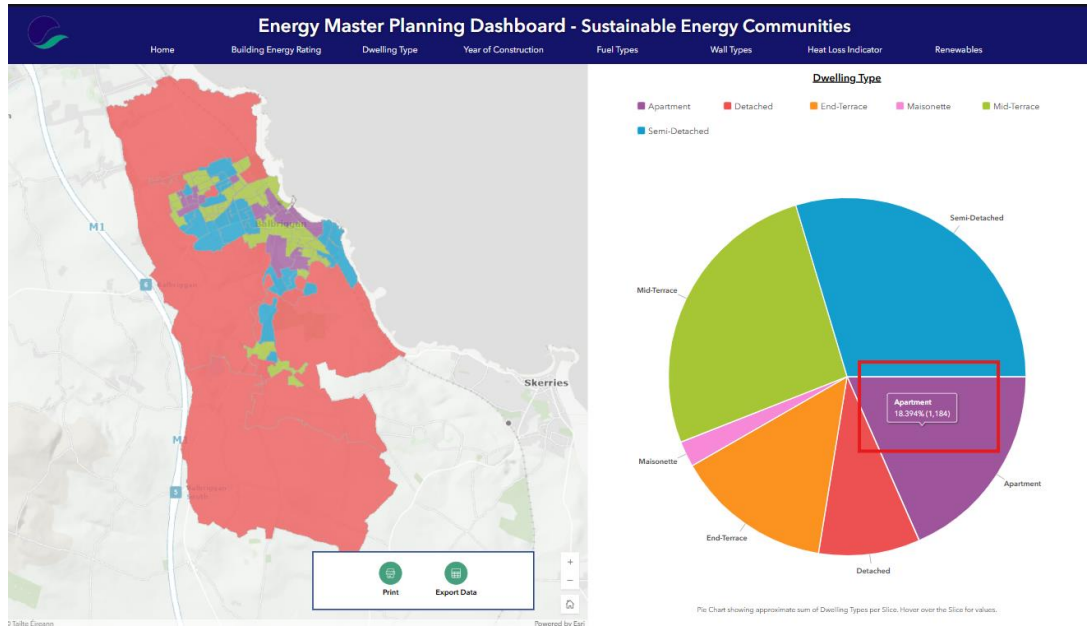


Figure 7 Chart showing value and attribute %

It is possible to turn off various layers within your pie chart and graphs. This can help visualise certain elements.

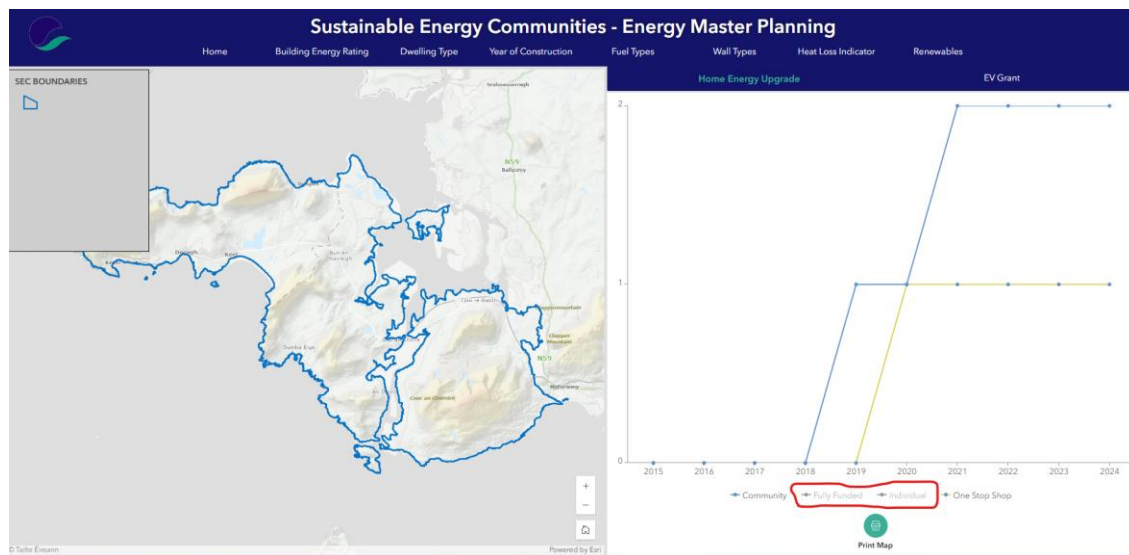


Figure 8 Showing Graph with 2 legend items hidden



## 2.6 Dashboard Tabs/ Energy Pages

Hover over the other tabs and click through them all to see the different pages. The page you have open will have a highlighted **green** colour. If you have set a filter for your SEC on the homepage, all corresponding maps, charts and tables will have filtered to the same community.

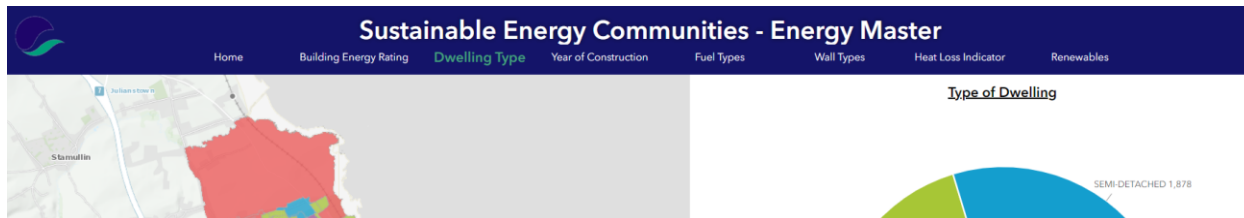


Figure 9 Image showing the different tabs to each page

## 2.7 Grant Uptake Page

There is a separate page for information on grants. Click on the button in the bottom right to navigate to the page. There will be information on:

- **Home Energy Upgrades**
- **Electric Vehicle Grants**

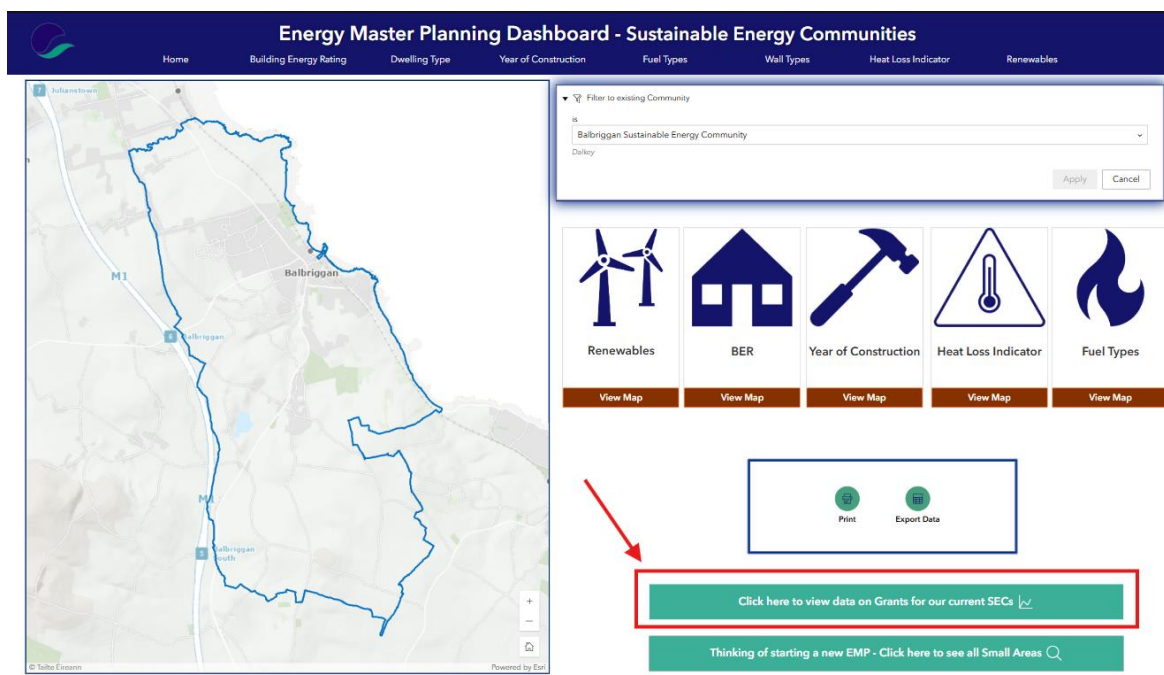


Figure 10 Button showing link to Grants page

Once directed to the grants page there will be separate page tabs for Energy Upgrades, and Electric Vehicle Grants. This data is aggregated to a community level.

There are 2 types of graphs for each page. The top graph shows the percentage breakdown of each type of Home Energy Upgrades out of 100. The second graph shows the Total number of Home Energy upgrade grants per year.

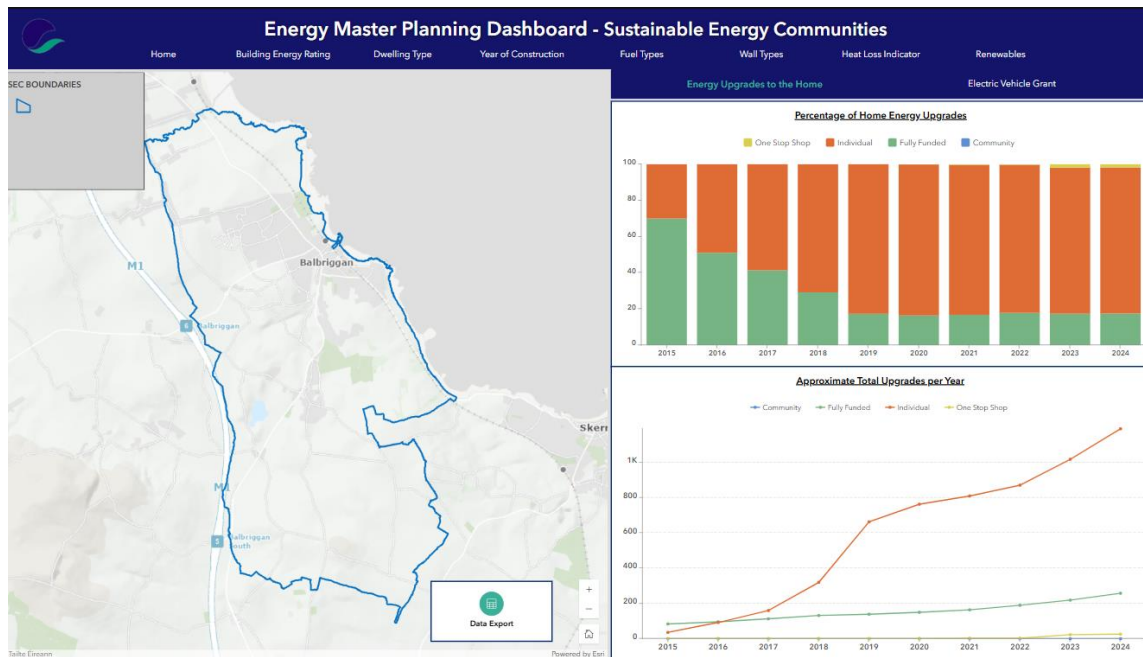


Figure 11 Grants page for Home Energy Upgrades

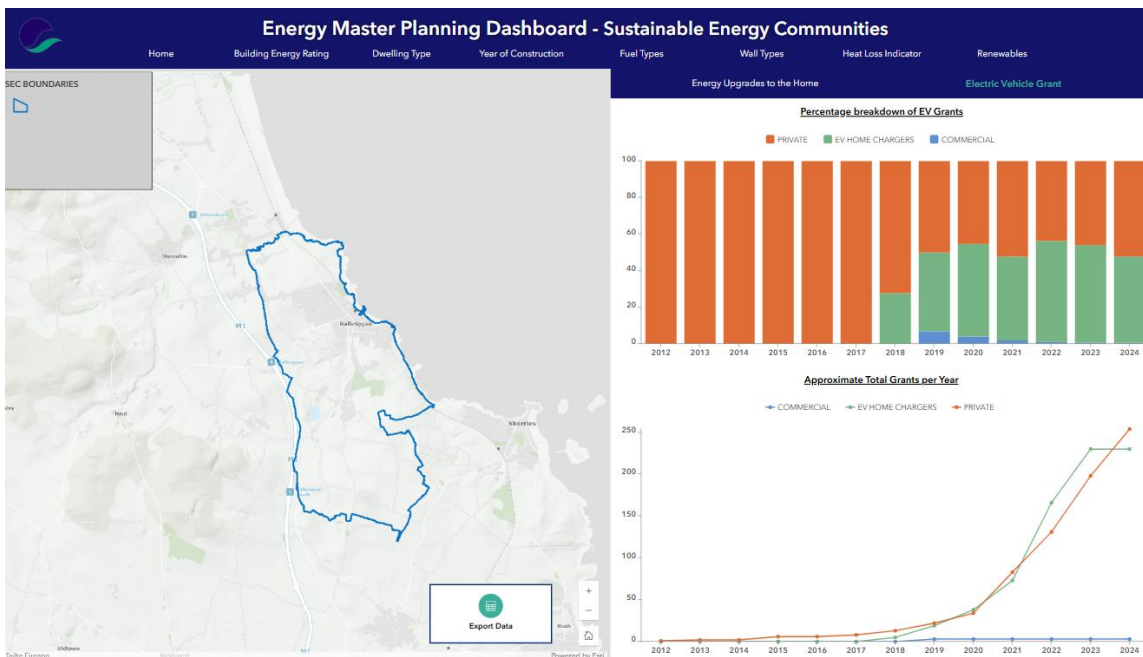


Figure 12 Page for Electric Vehicle Grant Uptakes

### 2.7.1 Home Energy Upgrades Information

A Home Energy Upgrade is any measure taken by a homeowner to improve the energy efficiency of their home.

- **Individual Energy Upgrade Grants:** formerly the Better Energy Homes grant scheme, this scheme is for homeowners and private landlords who choose to manage their own home energy upgrades. This gives them the flexibility to take a step-by-step approach, carrying out different upgrades over time to suit their budgets. With this grant route, homeowners select a SEAI registered contractor and apply for a grant which is paid directly to the homeowner once the works have been completed.
- **Fully Funded Energy Upgrades:** formerly the Warmer Homes Scheme, this scheme is for homeowners who receive certain welfare payments. Eligible applicants will have their home assessed by an SEAI surveyor who will make recommendations for certain energy upgrade measures. SEAI appoint a contractor to carry out the upgrade works, and the cost of the upgrades are fully funded by SEAI.
- **One-Stop-Shop Service:** this scheme offers homeowners all the services required for a complete home energy upgrade. A registered one-stop-shop operator manages the entire process, from initial home assessment through to the final BER assessment. Through this scheme, homeowners can avail of up to 50% of the cost of the works.
- **Community Energy Grants:** each year SEAI supports multiple community projects across Ireland. These projects are aimed at delivering energy savings to homeowners, community groups, private sector organisations and public sector bodies, and the community energy grant scheme is in place to provide financial assistance to these projects

This data is sourced through SEAI's grant scheme databases, collated and aggregated by SEAI's National Retrofit team.

### 2.7.2 Electric Vehicle Grants Information

Electric vehicles (EVs) are a low or potentially zero carbon alternative to traditional fossil-fuel vehicles and offer a means of reducing diesel and petrol use, and so lowering CO2 emissions. This chart displays EV grants awarded to SEAI. This includes the number of grants issued for domestic chargers, privately owned vehicles and commercial vehicles

This data is sourced from SEAI's grants databases.

- While most battery electric vehicles (BEVs) are new and receive an SEAI grant, an increasing share of plug-in hybrid electric vehicles (PHEVs) are pre-owned imports from the UK. Table TEM27 from the CSO provides "New and used private cars licensed for the first time by licensing authority, fuel type and month".
- Data on vehicle grants (number and euro amounts) are based on SEAI investments from 2012-to-date; Data on charger grants (number and euro amounts) are based on SEAI investments from 2018-to-date
- The number of grants and their euro amounts are given for battery electric vehicles (BEVs) and Plug-in Electric Hybrid Vehicles (PHEVs) until 2021, and BEVs only from the start of 2022

## 2.8 Map Pop-Ups / Data tables

To find details on specific zones (Small areas), click on the small area on the map. This will highlight in a light blue colour. A box will appear with data associated with that area.

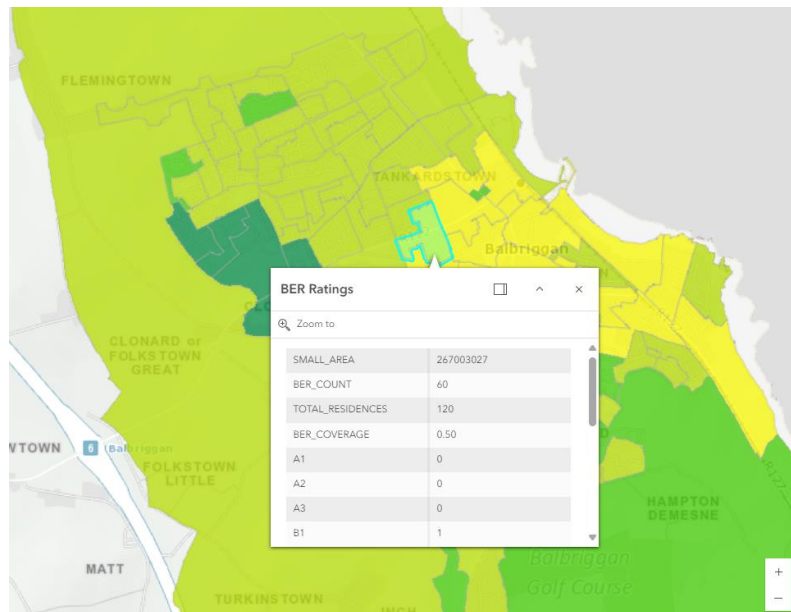


Figure 13 Pop-up showing data for one small area

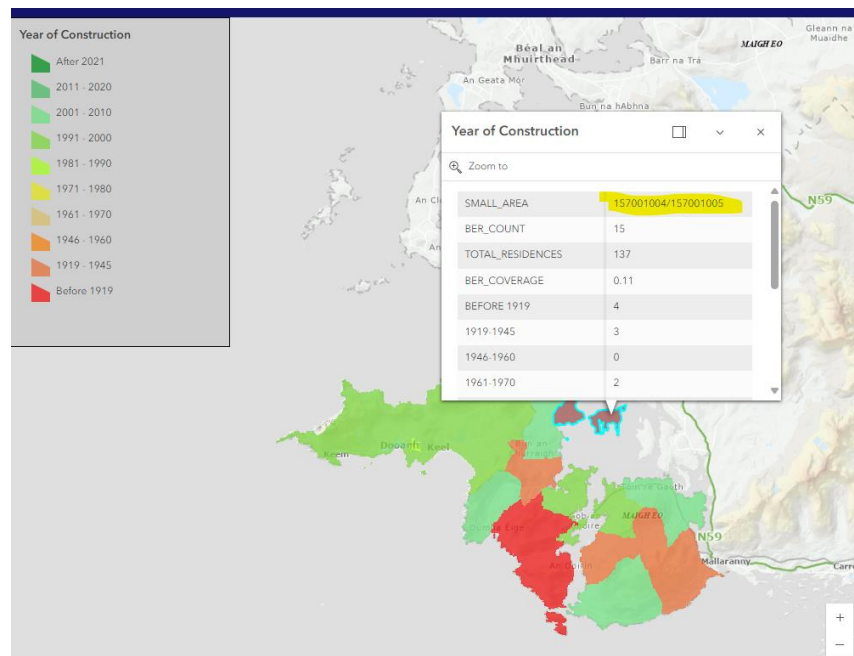


Figure 14 Pop-up for Year of Construction Page

## 2.9 Starting a New Energy Master Plan (EMP)

Click on the button “Thinking of starting a new EMP” on the bottom right to navigate to a new page.

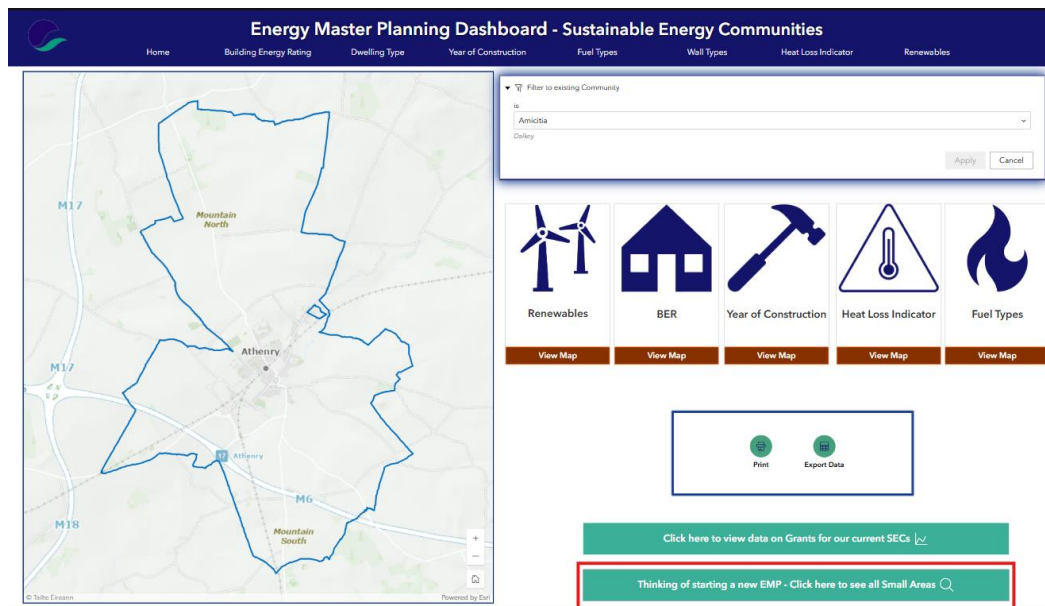


Figure 15 Homepage highlighting button for new EMP

When you open this page, you will see a map with all the current SEC boundaries. There is a table with Individual BER records and a “Select” tool. Zoom in to map to display the census small area boundaries.

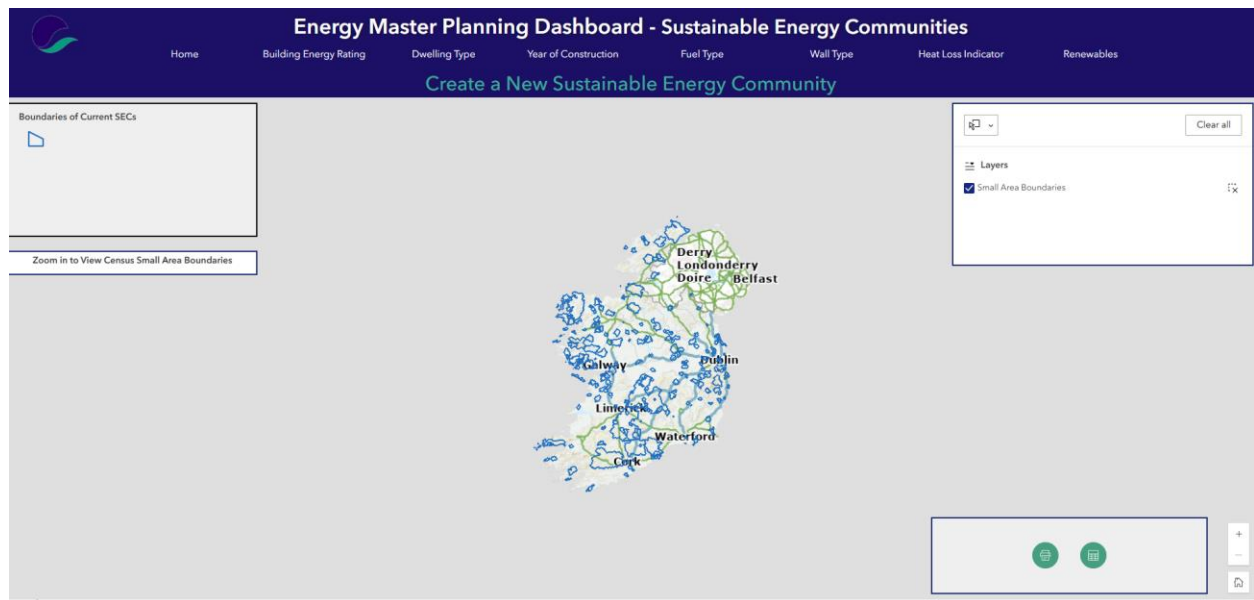



Figure 16 Starting EMP Page with various widgets



Once you have zoomed into the map small area boundaries will have appeared on the screen. To select multiple small areas, click on the button highlighted in the top right corner (the button turns blue when

active):  Click on a small area and drag the select box over the area of your choosing. You will see the area you have selected in a lighter blue colour. The Select tool will tell you how many small areas you have selected.

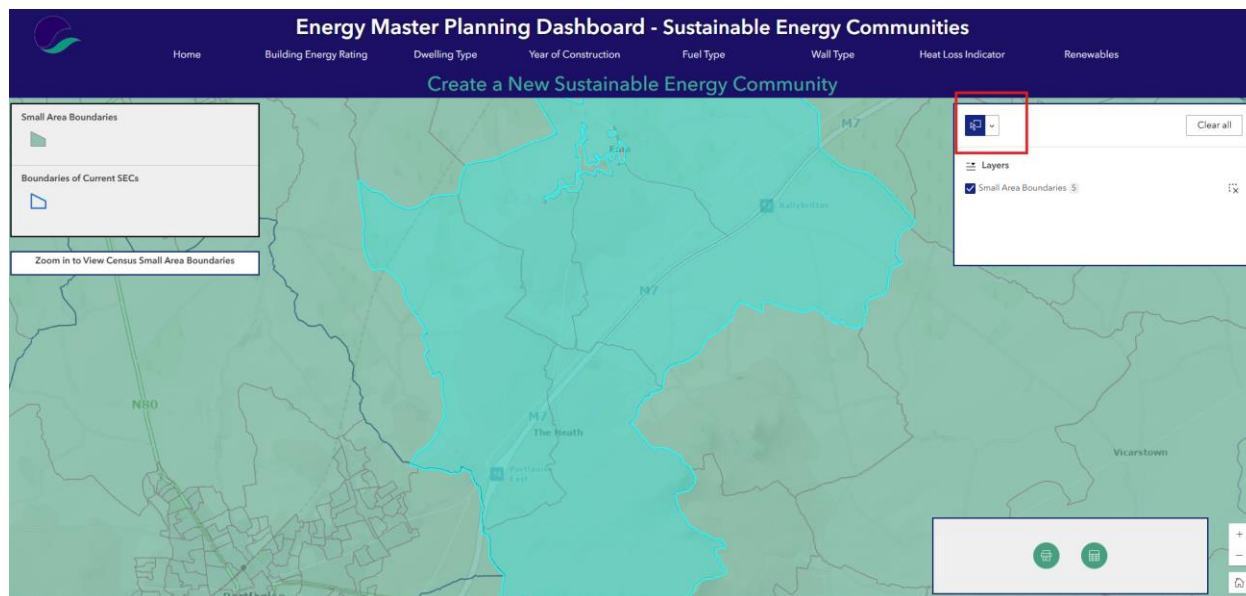


Figure 17 Small Areas with highlighted select tool

The select tool has the ability to select small areas in different ways. You are able to manually select areas using a point selection. This will allow you to select specific areas. Click on the drop down arrow in the select tool and click on “select by point”. Click on a small area you want to select and then hold down the “shift” key to select multiple areas with the point. If you need to deselect any areas click the “ctrl” key and then an area.

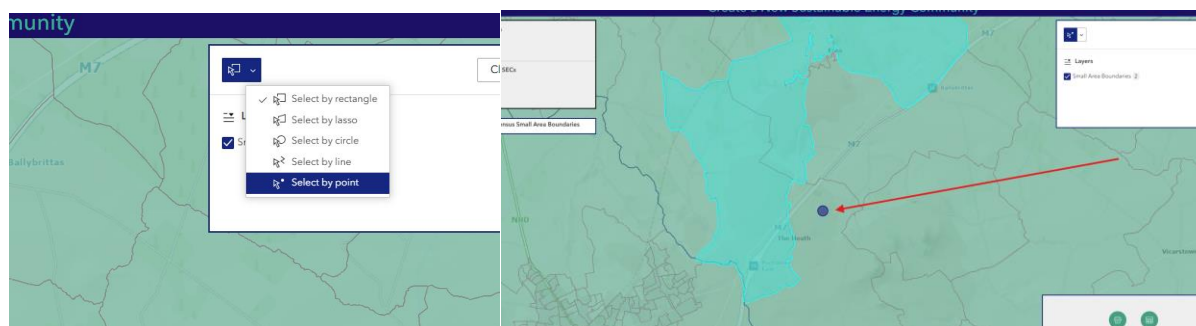


Figure 18 Select by Point Tool

*Tip: You will need to unselect the “select tool” to move your map extent. Click on the blue select icon again to unselect*



When you are happy with the selected Small Areas – use the export to csv tool to view your table in excel. Use the highlighted tool at the bottom right of the page in the table and select Export > Export to CSV. The table below will highlight the total individual BER records within those areas.

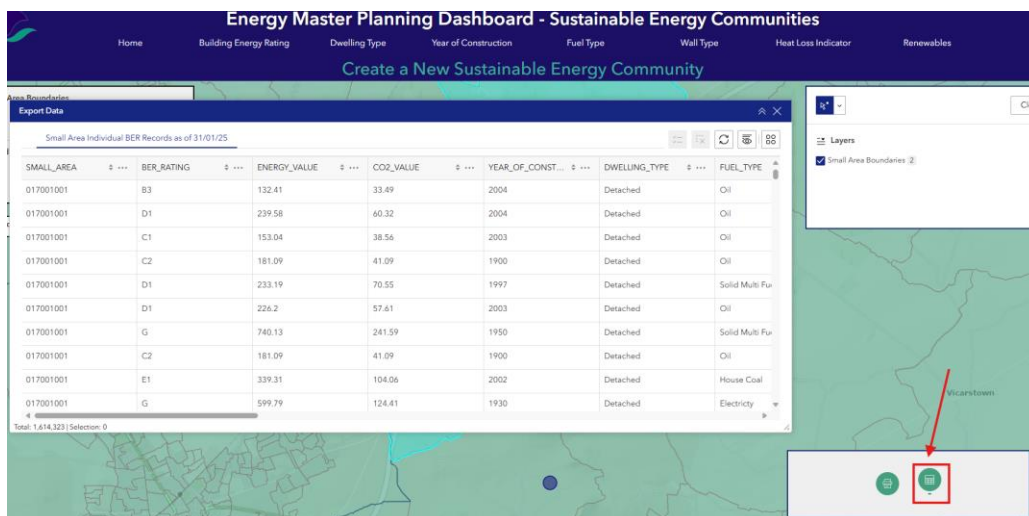


Figure 19 Showing where to export table of selected records

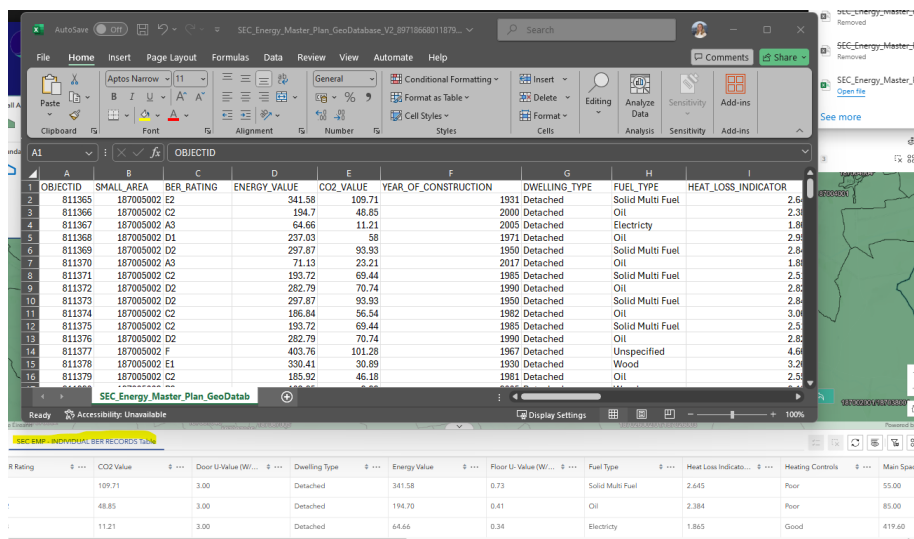


Figure 20 Showing exported csv file

### 3. Data Available

Individual BER Records (One Record per Dwelling)	Small Area Aggregates
Small Area Code	Small Area Code
EMP ID	BER Count
SEC Name	Total Residences
BER Rating	BER Coverage
Energy Value	Individual BER ratings: A1, A2, A3, B1, B2, B3, C1, C2, C3, D1, D2, E1, E2, F, G, Median BER
CO2 Value	Individual Year of Construction: Before 1919, 1919-1945, 1946-1960, 1961-1970, 1971-1980, 1981-1990, 1991-2000, 2001-2010, 2011-2020, After 2021. Year Predominant Category
Year of Construction	Individual Dwelling Types: Apartment, Detached, semi-detached, mid-terrace, end-terrace, maisonette, Dwelling Predominant Category
Dwelling Type	Individual Fuel Type: Gas, Oil, Electric, Anthracite, Bottled LPG
Fuel Type	Individual Wall Types: Solid Concrete, 225mm Solid Brick, 325mm solid Brick, Timber Frame, Concrete Hollow Block
Heat Loss Indicator	Open Chimneys
Predominant Wall Type	Solar PV
Wall U-Value	Heat Pump
Roof U-Value	Heating Controls predominant category
Window U-Value	Individual Heating Controls: Ideal, Good, Poor
Door U-Value	Main Water Heating Efficiency Predominant category
Floor U-Value	Individual Water Heating: Very Good, Good, Fair, Poor, Very Poor
Main Space Heating Efficiency	
Main Water Heating Efficiency	
Heating Controls	
Open Chimneys	
Number of Storeys	
Room in Roof Area	
Room in Roof Height	