

**IDENTIFY:****HEAT PUMPS
FOR GAA CLUBS****What are heat pumps and what kind of energy do they use?**

A heat pump is an electrical device that captures heat from outside and moves it into a building. Heat pumps can heat both space and water.

Heat pumps use electricity to capture heat from outside the building but the heat energy delivered to a building is much more than the electrical energy used to power the heat pump. Typically, a heat pump will produce 3 to 4 units of heat for every unit of electricity consumed

Heat pump systems should only be considered for clubs that have excellent insulation and airtightness. Talk to an energy expert if you are considering a heat pump for your clubhouse.

What type of heat pumps are available?**AIR SOURCE**

- Extracts heat from external air
- The most common type of system and generally cheaper and easier to install than other options.
- Less efficient than other heat pumps in colder weather.

GROUND SOURCE

- Extracts heat from the ground through vertical or horizontal pipework.
- Particularly suitable for new club building developments and/or for clubs with sufficient available ground around their building.
- High levels of efficiency all year round.

WATER SOURCE

- Extracts water from open water (e.g., lakes, rivers, streams) through collector pipework.
- Potentially suitable for clubs adjacent to water bodies.
- High levels of efficiency all year round.

Why might a heat pump be a good option for our club buildings?

- In well-insulated buildings, heat pumps are a highly efficient alternative to oil, gas, solid fuels and direct electrical heating systems.
- Installing an appropriately designed heat pump system can result in significant savings in energy, operating costs and carbon emissions.
- A heat pump needs to be appropriately designed and this can be complex. Ensure your club gets independent professional advice.

SEAI Support Scheme

- Clubs in the 26-counties may be eligible for funding of their heat pump system installation under a support scheme for renewable heat. The current scheme includes up to 30% funding of installation cost for heat pumps. See <https://www.seai.ie/business-and-public-sector/business-grants-and-supports/support-scheme-renewable-heat> for more details





What is building fabric and why is it important for heat pump installation?

'Building Fabric' refers to the structure and materials of a building – e.g., walls, floors, roof, windows and doors.

Improving the building fabric insulation and airtightness (e.g., of windows, doors, seals, ventilation) to minimise heat loss from your building will allow a heat pump system to operate more efficiently. Before considering a heat pump system, your club should look at the airtightness and insulation of your building. A well-insulated building will have lower running costs and better heating efficiency. Talk to an independent energy professional for advice.



We're considering getting a heat pump for our club. What do we need to think about?

AS PART OF A NEW BUILD:

- A new building will be built to very high insulation and airtightness standards, making a heat pump system a worthwhile energy - and money-saving option for your club.
- A calculation of the heating requirements of your new club building will be needed to design the system efficiently – get independent professional advice to check that a heat pump is a good option for your club and to ensure you get the most appropriate heat pump system for your club needs.

FOR AN EXISTING CLUB BUILDING:

- Improve your building insulation and airtightness (e.g., windows, doors, seals, ventilation) first – this will allow your heat pump to operate more efficiently.
- Heat pumps work better in buildings that are frequently in use – they are less efficient where heating is needed only for short periods.
- Ensure you get an independent professional assessment as to whether a heat pump is a good option for your club building.

Kerry Club Dr Crokes recently installed a new heat pump system, along with a solar PV panel to cover some of the heat pump's electrical requirements. Find out more at:
<https://learning.gaa.ie/greenclub/casestudies>

For more information on heat pumps see

<https://www.seai.ie/publications/Homeowners-Guide-To-Heat-Pump-Systems.pdf>

or

<https://energysavingtrust.org.uk/energy-at-home/heating-your-home/heat-pumps/>