

# Most frequently asked questions about the CarbonCost Calculator

**Q. What does the CarbonCost Calculator actually do?**

A. The **CarbonCost Calculator** applies the same principles that a greenhouse emissions market will apply in fixing the cost of emission permits and through that function, the **additional cost of energy**. The **CarbonCost Calculator** then multiplies the total energy embodied in an existing or planned building by the **additional cost of energy** to produce the estimated **additional cost of a specified building**.

**Q How does it calculate the embodied energy of a building?**

A It uses well established scientific principles to calculate the energy expended in producing all major materials and in carrying out building processes in the construction phase of the building and the likely source of that energy (eg petroleum, electricity or natural gas).

**Q. Does the CarbonCost Calculator provide special benefit for Architects, Designers and Engineers?**

A. Yes. Architects, Designers and Engineers can use the **CarbonCost Calculator** to compare a range of materials and/or a range of building designs in order to determine which combination gives the best result for a new building or the alteration of an existing building.

**Q. Does the CarbonCost Calculator provide any special benefit for Valuers and Real Estate Agents?**

A. Yes. The **CarbonCost Calculator** will assist Valuers and Real Estate Agents to calculate the likely cost of replacing or adding to an existing or planned building. It is anticipated that the **CarbonCost Calculator** will shortly be upgraded to calculate the estimated cost of major refurbishment.

**Q What about the owners of existing buildings?**

A They also will benefit from using the **CarbonCost Calculator** because of its ability to forecast a building's future value and consequently assists in ascertaining its highest and best use. Those who deal in the Built Environment will value this ability.

**Q. Does the CarbonCost Calculator assist me in calculating the sustainability of a building**

A. Yes. Buildings that require less embodied energy to construct, repair, refurbish and demolish are more energy sustainable. Under greenhouse abatement they will become more cost effective than other buildings. The **CarbonCost Calculator** forecasts a building's future energy sustainability now.

**Q Can I use the CarbonCost Calculator to calculate the additional cost of my home?**

A Not at present although it is intended to add this facility to the Calculator as soon as possible. If your home is a high rise Unit the **CarbonCost Calculator** can calculate the additional cost of the whole building

**Q Can the CarbonCost Calculator assist me in planning the future use of a building?**

A Yes. The **CarbonCost Calculator** is designed to look at the future and to 'predict' building costs, as they will vary according to the cost of emission permits (ie the additional cost of fossil fuel energy).

**Q Will the additional building cost vary between identical buildings in separate locations?**

A This is possible. The **CarbonCost Calculator** is designed to differentiate between states and between urban and rural areas. That is because energy sources vary between states and districts and the production of some energy requires the purchase of more emission permits than other energy.

**Q Can the information provided by the CarbonCost Calculator vary over time?**

A Yes. It is anticipated that the production of materials and construction processes will alter over time. The likelihood is that rising energy costs will give an incentive to use less energy. The **CarbonCost Calculator** will be updated when these alterations become sufficiently established to warrant it.