Explaining the Efficiency of the Element.

The Neater Heater Element is a superb conductor of heat. It is made from Extruded Aluminium, which is used in computers to conduct heat away from the processors.

The Elements are designed in such a way that they have a huge surface area. This means that there is a large direct contact between the element and the cold air passing around it within the body of the heater itself. As the cold air is super-heated, it is "convected" upwards and is replaced from below by more cold air which in turn is heated and replaced.

Compare this direct heating of the air by a Neater Heater against the usual "Competition."

Oil-filled heaters which go through three indirect stages:

- 1. The element heats up the oil (losing energy in the process)
- 2. The oil heats up the carcass of the heater (losing more energy in the process)
- 3. The carcass of the heater heats up the air around the heater. Due to the relatively small surface area of the heater this is less efficient than the Neater Heater.
- 4. Due to the inefficiency of the process many more kilowatts are needed to make the oil-filled heater produce the same amount of heat as the more efficient Neater Heater. This is why we can do with 1kw what it takes our competitors (quite often) 2KW to achieve.

Flat Panel Heaters. Often paint-able, and often called "Eco-Heaters".

I cannot stress enough how bad and inefficient these heaters usually are. If you listen to the hype you would believe that you could heat an aircraft hanger with a 400 Watt heater. It just isn't true.

We bought one to heat our son's 3m X 4m bedroom. Fortunately we read the "small print" and bought a 900 Watt heater. It was so inefficient that it hardly raised the room temperature by 2 degrees, but the heater itself became dangerously hot. My son, even wearing his outdoor clothes, could only stand doing his homework in there for about half an hour-or-so. This heater would have cost me 18 cents/hour to run, at today's prices, with no thermostat reduction.

We replaced this glorified skillet with a 1KW Beha Heater which, when the thermostat reduction was taken into consideration, cost between 12-16 cents/hour to run. But most importantly, the heater worked so well that my son is able to comfortably spend the whole evening studying in his room dressed in just jeans and a tee-shirt.

I sum this experience up by saying that with an Eco-Heater it used to cost me more to keep my son cold than it now costs me to keep him warm with a Beha Heater.

We were so impressed with them that we decided to import them and re-named them.

Neater Heater