BF Technology Case Study

BF Technology Ltd
Powerful, Visual Communications

Summary

- Worried about rising energy costs, BF Technology wanted to perform a baseline audit of energy wastage and investigate an automated energy management solution.
- A total investment of £2,896 led to an **ongoing energy saving of £1,668 per year**, i.e. £67 per employee per year.
- A saving of **2.4 tonnes of CO2 per quarter** is being achieved and the system has a financial **return on investment (ROI) of approximately 23 months**.

Method - an Enistic energy audit kit was installed in order to break down and accurately measure where energy was being used and identify where it was being wasted. Initially, no changes were made to working practice to enable a baseline usage pattern to be established.

Once the baseline had been established, the Energy Manager software was configured to control the switching of office equipment.

Device	Number found	Fully running	Standby	Fully off	Power being wasted (W)
PC base stations	24	9	15	0	1,581
Monitors	29	4	18	7	213
Laptop docks	2	2	0	0	7
TVs	3	1	2	0	94
Printers	12	12	0	0	103
Chargers & Misc	11	11	0	0	79
Photocopiers	2	1	1	0	124
Vending machines	0	0	0	0	0
Desk lights and fans	0	0	0	0	0
				Total:	2,201

Audit Results

The audit yielded the results shown in the table above. We found that whilst the management at BF were under the impression that staff turned off their PCs every night, a number of fully-running computers were found. This is not unusual and was generally put down to forgetfulness / logistics rather than any lack of desire for energy saving.

In one instance, for example, a staff member had turned on a colleague's computer to access some information and had then forgotten to turn it off again at the end of the day.

Of the computers that were shut down, the Enistic system was able to show that they were in fact still drawing some electrical current, and therefore wasting energy when not in use.

The data collected was used to calculate the energy being wasted by different types of office equipment. Enistic Energy Manager was then used to make savings, as detailed in the table below, by automatically switching off some of the office equipment when not in use.

Month	1-3	4-6	7-9	10-12	13-15	16-18	19-21	22-24	Total
Saving (kgCO2)	2,390	2,390	2,390	2,390	2,390	2,390	2,390	2,390	19,120
Saving (£)	417	417	417	417	417	417	417	417	3,336
Installation (£)	-475								-475
Equipment (£)	-1,995								-1,995
Maintenance & upgrades (£)	-355				-355				-710
Travel (£)	-71								-71
Net (£)	-2,479	417	417	417	62	417	417	417	185
Cumulative (£)	-2,479	-2,062	-1,645	-1,228	-1,166	-749	-332	85	

Conclusions

The Enistic Energy Manager performed well and lowered the base load figure by 2.2kW. BF have minimal weekend working, which means that in their typical week the system is producing this wastage for 130 hours per week.

This equates to a monthly wastage of 1,265 kWh and a financial saving of £417 per quarter.

The management at BF also commented that they felt that there were a number of **non-measurable benefits** that they experienced, as the audit brought energy saving so clearly into focus for their employees. This was typified by increased use of the recycling bins and increased acceptance of lift sharing / carbon friendly travel.

This case study was prepared in conjunction with Interior Control, one of our Platinum resellers - for more information, visit www.interiorcontrol.co.uk.