

SUMMER breeze

LOGICCOOL
Specialist Air Conditioning Distributor

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Logicool embrace Apprenticeship Scheme

Logicool recently appointed Disa Shearer as their first apprentice. Disa's previous experience was temporary roles in retail and office environments. The current economic climate made it very difficult for Disa

to find full time employment. When Logicool considered apprenticeships we were very pleased to find a person with the qualities that Disa portrayed in her interview, amongst the candidates. We are pleased to say that Disa has been a success and has added a new dimension of customer service to the office with her enthusiasm and passion to learn giving everyone a boost.

Disa has recently managed the website updates as well as some of our new price guides. Long term Disa will concentrate on more marketing activities but she also handles day-to-day quotations and enquiries.



F-Gas

We are pleased to announce that two of our Technical Sales team, Simon Holden and Steve Hardiman recently undertook and passed their F-Gas Assessments. Whilst we do not install equipment we felt it was important to have this qualification in place to ensure our customers have confidence in our ability.

Logicool also enforce a "No F-Gas, no sale" rule which applies to all new customer applications.



Free Commissioning Assistance

All Hitachi Set-Free installations come with free commissioning assistance. This also validates the five year warranty and gives you and your client peace of mind.

Other manufacturers charge a premium for this service so please bear this in mind when considering Hitachi in the future.

5 year warranty

Did you know that Hitachi offer a 5 year parts and labour contribution as standard on all Utopia and Set-Free products?

**5 YEAR
WARRANTY**

FOC Commissioning
Assistance on
Set Free Systems



Focus on Energy Savings

This edition of our newsletter focuses on energy efficiency, in particular the new EU Energy Labels which are dictated by seasonal efficiencies and running cost analysis.

Our experience shows us that there is clearly a renewed emphasis from the end-user towards running costs and Enhanced Capital Allowances. Quotation enquiries in the Logicool office are increasing but there now seems to be a swing away from lower cost solutions which we have witnessed in recent years towards actual energy savings.

Providing information like this is a simple procedure for our staff. We do need to know details of original installed equipment (if applicable) and the operating hours and energy costs to the end user. Much of this can be estimated if we know the type of business involved.

The case study on the back of this newsletter gives a fantastic example of how replacing old R22 equipment with ECA approved equipment can be sold to an end user when producing good, factual information which is relevant to their business.

The new EuP Lot 10 Directive and how it affects you and your business.

The Energy Using Products Directive (EuP) will have a major impact on our industry. This is a European Legislation designed to improve the overall design and operating efficiency of all air conditioning products in Europe from January 2013.

The directive changes the way that efficiency in air conditioners is measured with the current Energy Labelling system being replaced and the way we measure efficiencies changing from an overall EU based standard (EER and COP) to a more relative standard based on UK seasonal efficiencies (SEER and SCOP). This is a welcome move as we are consistently advertising (and; at times; selecting) products based on extreme European ambient and user control temperatures which have very little to do with the climate our equipment operates in.

Particular to our industry is EuP Lot 10. This covers all air conditioners up to and including typical 10.0kW cooling models, or those models which offer 12kW of cooling as per the directive. Systems outside of this scope will be covered in the future by EuP Lot 6 which has yet to be finalised.

Improvements made to the general design of Air Conditioning equipment include elimination of materials that may not be classed as being beneficial to the environment at the design and manufacturing stage. This ensures a "cradle to grave" approach for the design, manufacturing and total lifecycle of the equipment.

Overall efficiencies are to be improved and have a minimum requirement for compressor type, heat exchange area, Fan Motor (DC), and a standby power consumption of no greater than 1 watt. In addition noise will be a consideration and this will have new standards within the legislation whilst expecting improved technologies on the delivery of improved Sound Power levels also. Indoor and Outdoor Noise levels will also be evident on the new Energy Label.

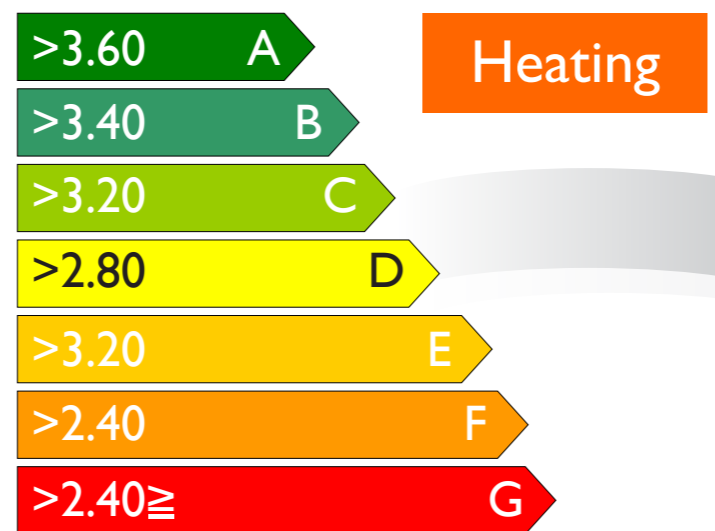
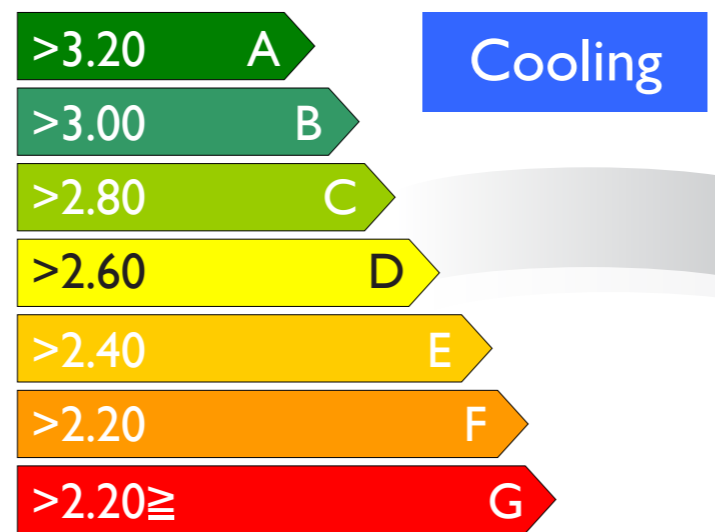
How does this affect the "typical" UK Contractor? Our industry is traditionally price-driven. Whilst there are

| | 2013 | | 2014 | |
|----------|-----------|-----------|-----------|-----------|
| | SEER | SCOP | SEER | SCOP |
| <6kw | ≥3.6 D | ≥3.4 A | ≥4.6 B | ≥3.8 A |
| 6kw≤12kw | ≥3.6 D | ≥3.4 A | ≥4.3 C | ≥3.8 A |

some end-user customers; typically the eco-savvy; or Blue-Chip who will insist on Higher Efficiencies the fact is that this legislation affects all systems up to 12kW which effectively means the small split air conditioner market which is price-aggressive. Traditional 125 and 140 models fall outside of the directive but as these products form part of a "line-up" it is likely that all products up to 14kW will be enhanced.

The fact is that the new SEER and SCOP requirements means a new method of energy labelling which is much

Old energy label

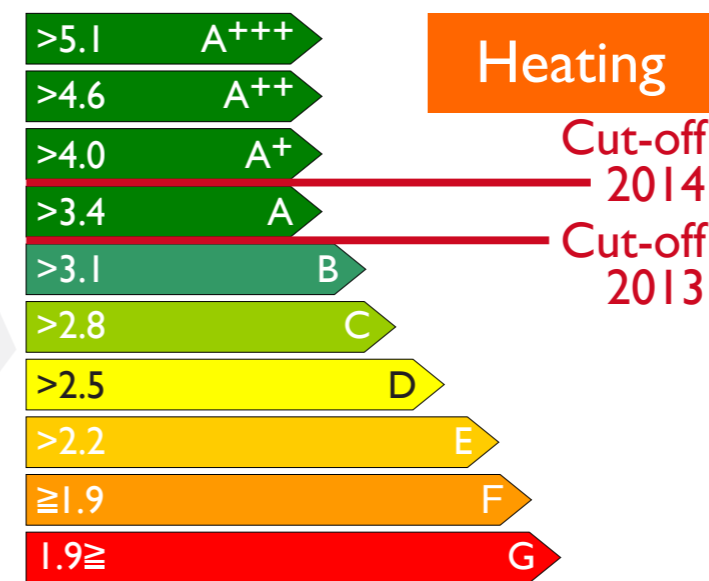
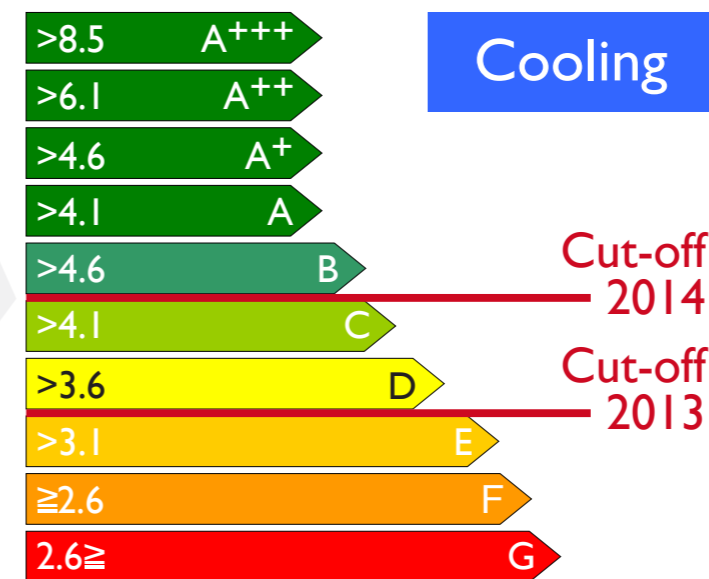


stricter than that currently in force. So strict in fact that this does not mean that an "A" or "B" label is tougher to achieve (it is) but that anything below the new A/D (Heating/Cooling) requirement for energy labels may no longer be available for sale into the EU (TBC) and, of course, as part of this, the UK. New "D" rated SEER ratings will be a more stringent energy rating than our current "A" label for EER.

This has a significant impact on price. The improved efficiencies are partly based on the requirement

for certain materials which can no longer be used in manufacturing and production. In addition we are used to our manufacturers offering "Standard" and "Premium" models. The "Standard" model in its current form will effectively be no longer available. The "Premium" model will be tweaked to ensure that every combination meets the new "A" rated standard and new "Super Premium" or "Deluxe" models will be introduced which will look to achieve the new "AA" or "AAA" ratings which will be more attractive to the larger end-user or specification

New energy label



client. These new Premium models will be expected to achieve the new Carbon Trust requirements for Enhanced Capital Allowances whose criteria typically aims to be above the minimum threshold and seeks to qualify the top 10 – 25% of the best performing products.

The question on everyone's lips will be "what about the price?" Are current "Premium" models going to be reduced in price to meet the current lower cost models? If so would this make a mockery of recent price increases

from many manufacturers based on factors such as the economy, exchange rates and the increase in Rare Earth Mineral costs used in current production?

Logicool believe the reality will be somewhere between the two. Expect entry-level inverters to increase in cost by 5%. This is reasonable considering the additional manufacturing costs incurred by the manufacturer and the fact that, until recently, equipment prices have been tumbling since the late 1990's. This will be in addition to some typical recent price increases of 3 – 5%.

There will be more focus on lifecycle/running cost analysis especially when replacing existing R22 equipment. Increases in the Capital/final installed cost can be negated by promoting Enhanced Capital Allowances and actual savings for the end-user when replacing existing equipment. Logicool have Case Studies and running cost calculators available from the Downloads section of our website.

Some manufacturers have already redesigned some product to meet the new requirements without issuing too much information about the new legislation. This is unsurprising as the legislation was only passed recently and manufacturers have to comply by January 2013. A lot of the information available from manufacturers is still "tentative". Expect wholesale product line-up changes in late 2012 coupled with "final orders" of existing models in Q1 of 2013 to allow old stock to be replaced by the new product.

What next? The directive already has a requirement for improvements effective 2014 through to 2019 which will increase efficiencies further. This is not unique to the Air Conditioning industry. The UK and the EU have strict energy reduction targets that need to be met and all industries need to meet the challenges head on. EuP Lot 10 is the small part of the legislation that affects our industry. Similar legislation is being rolled out across other industries including lighting and consumer electronics.

There is one part of the new legislation which looks to promote the use of low GWP refrigerants. If the GWP is lower than 150 then the threshold for SEER and SCOP is lowered. R410a has a GWP of 1725 whilst natural refrigerants have a significantly lower GWP. R290a (Propane) for example has a GWP of only 3.

This can point to a number of scenarios. Could we see lower cost Split Systems using new refrigerants and related new technology at lower prices? Possibly but that would require retraining throughout the industry again as well as new tooling.

Our opinion on the future of Split Systems is much more extreme. Our advice is to embrace new technologies and look to diversify your business. Prepare for the future by investing in training sooner rather than later. Logicool will be happy to talk to you about how we feel this and future changes will impact both our industry and our businesses.

Case Study

Problem

A server solutions hosting specialist were faced with the taxing problem of installing new equipment from their data centre in Nottingham.

As a host premises responsible for the servers and hosting for many local businesses this site is critical. Even considering replacing a new cooling system is a problem due to the potential downtime that this would cause.

The problem the customer faced was threefold. Firstly the existing air conditioning system was old and inefficient. The end user was in a position where a "quick fix" was easier and the cost of new plant seemed prohibitive (the system is a 25 - 28kW triple split). Therefore spares were regularly purchased to try and repair the system quickly but in the end it was clear that this was no longer possible.

Solution

The installing contractor approached Logicool with the problem. A cost analysis was prepared by looking at the existing equipment and making a running cost calculation based on the rated power input for the existing installed plant. This was found to be £11,452.80 per annum based on 24/7 operation 365 days a year. This did not take into account increased running costs from the coil degradation and related lower heat exchange efficiency the system would have suffered.

New Hitachi IVX system with ECA (Enhanced Capital Allowances) approval was proposed. The ECA tax benefits in this instance are applicable to the whole cost of the installation including labour.

The contractor proposed installing the equipment at night to ensure low ambient conditions.

End user costs/payback

The installation cost was £6,800.00

The projected energy saving costs of the new Hitachi plant based on the same conditions is £4,044.67

The ECA benefit to the end user is £2,040.00. This is based on 30% of installation cost based on expected corporation tax of a profit making business.

Based on the first year energy consumption saving and the ECA rebate the actual net installation cost is £715.33

The payback period for this installation is first year savings plus 65.7 days

(Note - all figures based on worse-case scenario with maximum power inputs and full compressor speed and does not allow for projected spares/repair costs)

Enhanced Capital Allowances

The Enhanced Capital Allowance (ECA) scheme enables businesses to claim a 100% first year capital allowance on investments in certain energy saving equipment, against the taxable profits of the period of investment.

Capital allowances enable businesses to write off the capital cost of purchasing new plant or machinery (e.g. boilers, motors, heat-pumps), against their taxable profits.

The Enhanced Capital Allowance (ECA) Scheme is a key part of the Government's programme to manage climate change. It provides businesses with enhanced tax relief for investments in equipment that meets published energy-saving criteria.

Their website (www.eca.gov.uk) provides background information about the scheme and its benefits.

For purchasers of equipment, the website provides information on which products are eligible for ECAs, and provides details on how to claim the enhanced tax relief when you have made a purchase of eligible equipment.

| INDOOR UNIT > / NO. DE MODELO < UNIDAD EXTERIOR > | | HEAT PUMP - BOMBA DE CA CU-280MX51XP | | |
|---|---------------|---|------|------|
| SOURCE / NTACION | PHASE/FASE | 3N~ | 3N~ | 3N~ |
| | V | 380 | 400 | 415 |
| INPUT / MAXIMA | Hz | 50 | 50 | 50 |
| | COOL/FRIO kW | 15.2 | 15.2 | 15.2 |
| CURRENT / S MAXIMA | HEAT/CALOR kW | 11.5 | 11.5 | 11.5 |
| | COOL/FRIO A | 26.2 | 25.8 | 25.3 |
| INPUT / BOMBA | HEAT/CALOR A | 19.2 | 18.6 | 18.2 |
| | COOL/FRIO kW | 11.5 | 11.5 | 11.5 |
| CURRENT / PRESENT | HEAT/CALOR kW | 10.5 | 10.5 | 10.5 |
| | COOL/FRIO kW | 18.1 | 18.5 | 18.1 |

