

Construction growth is good news for heating industry

With commercial construction projects forecast to grow between now and 2010, the heating industry can look forward to busy times - as new buildings naturally need new heating systems. According to leading commercial boiler manufacturer Potterton Commercial, the fact that these new buildings will have to be 28 per cent more efficient than those built in 2002 means heating specifiers will frequently find themselves taking on the role of energy efficiency advisor, and need to ensure they are clued up on Part L2. National sales and marketing manager Richard Walker explains.

In January 2007 the Construction Products Association forecast that, over the next three years, overall construction growth is set to outpace that of the UK economy, with an increase of 2.7 per cent in 2007 followed by growth levels of three per cent and 3.5 per cent in 2008 and 2009 respectively. This is mirrored by Construction Skills, which forecasts that construction output is set to average three per cent annually until 2010.

The good news is, according to both the Construction Products Association and Construction Skills, this growth will mainly be in the commercial sector. Whereas higher interest rates, greater consumer caution and a cooling in the housing market are forecast to dampen private new housing and refurbishment output during 2007 and 2008, resurgence in both office and retail development and public sector housing RMI (Refurbishment, Maintenance and Improvement) is forecast for the next three years. On top of this, increased investment in regional distributional facilities is set to help lift industrial building work during 2007 and, after two years of sharp decline, a modest recovery in health related output is predicted - led by a growth in PFI projects. Obviously the 2012 Olympics will have a huge impact too.

New commercial and public sector building schemes, as well as RMI projects, usually require new heating plant. Therefore, growth in the sector means busy times should lie ahead for heating manufacturers, specifiers and installers.

What's more, with the need for new buildings to be more energy efficient than their predecessors, specifiers will not only find themselves designing heating plant; they'll be helping to create holistically energy efficient buildings.

Since 45 per cent of the UK's energy is used in buildings - for heating, lighting and general power - a high level of carbon dioxide, the greenhouse gas associated with climate change and global warming, is emitted as a result. Over recent years it has become clear that the UK must generate heat more efficiently in order to reduce the amount of pollutants emitted into the atmosphere.

Commercial and public sector organisations are therefore coming under increasing pressure to adopt environmentally friendly practises, and we are likely to see the procurement process, in both new build and RMI, to be increasingly focused on energy efficiency.

Indeed, an increasing number of building projects are pledging to be 'green'; for example the 2012 Olympics is anticipated to be the most sustainable Olympics ever, with high standards of environmentally friendly design being employed.

In addition, financial incentives such as grants and tax rebates, available through schemes like the DTI's Low Carbon Buildings Programme and the Carbon Trust's Enhanced Capital Allowance, are encouraging the use of more sustainable, cleaner heating technologies.

Several government policies and programmes having been put in place to ensure that buildings do become more efficient; the Kyoto Protocol, the Climate Change Levy, the Low Carbon Buildings Programme and the Enhanced Capital Allowance Scheme to name just a few. However, it was the EU Directive - Energy Performance of Buildings - which really had an impact on the Part L Building Regulations review, and resulted in the latest revisions.

Part L2 of the Building Regulations was introduced in 2006. It offers a holistic approach to building design; taking things like insulation and controls into consideration as well as the actual heating system. Part L2 encourages different disciplines to collaborate in order to achieve an overall goal; working together to improve insulation, air tightness, energy usage for heating, cooling, ventilation, lighting, controls, commissioning, metering, monitoring and maintenance. A 28 per cent improvement compared to 2002 building programmes is required, and it is hoped that by 2010 changes to Part L will have delivered a saving of 1.4m tonnes of carbon per annum.

Part L2 of the Building Regulations is supported by approved documents ADL2A and ADL2B, which relate to new and existing buildings respectively. The documents require new buildings, and in some instances existing ones, to be assessed for total annual energy usage and carbon emissions using National Calculation Methodology.

Detailed guidance on the minimum acceptable performance of heating, cooling, ventilation and hot water systems is contained within a Department for Communities & Local Government document, entitled The Non-domestic Heating, Cooling and Ventilation Compliance Guide. Since this guide does not deal with the requirements applying to the whole building, specifiers and building managers must also consult the appropriate approved document, ADL2A or ADL2B, to ensure heating systems fully comply with the regulations.

Right now, energy efficiency and sustainability are hot topics, and this is reflected in the availability of environmentally friendly products, for example condensing boilers and technologies which use renewable energy. At Potterton Commercial we are investing in research and development to deliver energy efficient, low emission heating solutions, and we are seeing ongoing growth in sales of our environmentally friendly condensing boilers.

An increasing number of commercial buildings will be constructed between now and 2010 - and they must be built efficiently. To help commercial and public sector organisations to achieve this goal, it will become increasingly important for designers

and specifiers to understand Part L2, and to be able to recommend that efficient condensing boiler technology and, where possible, renewable energy sources, are incorporated into the overall design of a building. Specifiers have a crucial role to play, and will be more frequently called upon to provide energy efficient solutions, rather than just specify products.

With this in mind, Potterton Commercial has produced a leaflet - entitled Summary of Minimum Provisions for Central Heating Boiler Systems in Non-domestic Buildings According to the Revised Building Regulations - to help specifiers and building managers to understand the new requirements. For a copy please call 08706 050607.