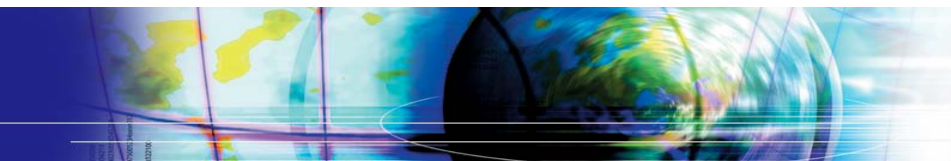


# Energy & Efficiency:

## The worldwide drive to 'green'

### Banking

**Date** : 21<sup>st</sup> August 2008  
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## Report content

Report content	2
Introduction	2
Table of figures	3
Executive Summary	4
Green strategy	6
Actual measures	14
What's going on today?	18
Data center realities	22
Consolidation and virtualization	25
Conclusion	26
Demographics	27
<i>About The Bathwick Group</i>	28

## Introduction

During April & May 2008, we interviewed 400 respondents from enterprise-scale companies across seven countries, on a range of issues around green IT. This paper examines the responses from the 102 banking industry respondents. Where appropriate, we have inserted charts to compare the banking results with respondents from the other industry sectors – energy/utilities, insurance, and the government sector.

We have developed a set of six benchmarks that cover all the issues in this paper. You can use the benchmarks to see how your organization stacks up against the respondents in this study.

To test yourself online, free of charge, with instant graphic output of your scores, visit <http://ibmgreen.bathwick.com>

## Table of figures

Figure 1	How organizations are approaching the opportunity of going 'green' in the banking industry	6
Figure 2	How organizations are approaching the opportunity of going 'green' (industry comparison)	7
Figure 3	Where green initiatives are being applied	7
Figure 4	Where green initiatives are focused within IT	8
Figure 5	Important green issues in the banking industry today	9
Figure 6	The importance of green issues today by industry	10
Figure 7	How green issues will grow in importance over the coming two years	11
Figure 8	How green issues will grow in importance over the coming two years (industry comparison)	11
Figure 9	Challenges faced in 'going green'	12
Figure 10	Challenges faced in 'going green' (industry comparison)	13
Figure 11	Agreement with environmental statements about the organization	13
Figure 12	Green PR versus overall environmental responsibility (industry comparison)	14
Figure 13	The measure most used to express green targets	15
Figure 14	The measure most used to express green targets (industry comparison)	15
Figure 15	Knowledge of data center power consumption within respondent organizations	16
Figure 16	Knowledge of data center power consumption by industry	16
Figure 17	Power consumption monitoring of individual data center components	17
Figure 18	Departments responsible for data center energy bills	17
Figure 19	Green technologies and techniques currently used in the banking industry	18
Figure 20	Top 10 green technologies or techniques being piloted today in the banking industry	19
Figure 21	Top 10 green technologies or techniques being assessed today in the banking industry	20
Figure 22	Self-assessment of overall progress in energy conservation measures	20
Figure 23	Self-assessment of overall progress in energy conservation measures (industry comparison)	21
Figure 24	Important drivers of data center strategy today	22
Figure 25	Important drivers of data center strategy today (industry comparison)	23
Figure 26	Age of data centers in the banking industry	23
Figure 27	Age of data centers (industry comparison)	24
Figure 28	Age of data center power and cooling infrastructure	24
Figure 29	Extent of consolidation projects today in the banking industry	25
Figure 30	Extent of virtualization projects today in the banking industry	26
Figure 31	Countries represented in this study	27

## Executive Summary

Environmental or 'Green IT' issues have been much in the spotlight over the past two years. Despite a rapidly growing realization that green IT encompasses a range of issues across the whole IT infrastructure and its application to the processes and supply chain of any organization, most organizations are still in the early stages of thinking, and are focused primarily on cost and energy efficiency.

This study looks primarily at that first stage – whether there is a strategy in place, and how far advanced their thinking and action is, primarily in relation to the data center.

The first thing that is clear is that despite the challenging economic conditions that beset us all today, green issues are firmly on the agenda for both corporate and public sectors. This report details the study results in relation to the banking sector, and contains a number of key findings:

- The most important green issue is saving money, followed by the sheer availability of power for data centers that continue to grow hungrier with ever more dense equipment configurations
- 50% of respondents are implementing green strategies only in a piecemeal or ad hoc fashion, which does not bode well for achieving strong results
- Surprisingly, a greater number of respondents are more focused on the desktop and networked infrastructure (or across the whole infrastructure) than on their data center, possibly as there has been relatively little progress to date on networked infrastructures
- Power availability, energy costs and having 'greening' IT as part of their overall environmental strategy are the most important green IT drivers in the banking industry
- Legislative or regulatory demands is the third fastest growing issue, after energy costs and power availability
- The main barrier to achieving change for banking respondents is budgetary constraints, although raising awareness in the organization and obtaining commitment from employees are also problematic
- More than three-quarters of respondents (79%) say that environmental projects must be linked to saving money
- Around 60% of banking respondents agree that their company does everything possible to be environmentally responsible, but nearly half (45%) agreed that their organization is only interested in green projects for PR purposes
- 45% of respondents use energy saving as the primary measure for tracking energy efficiency projects compared with 43% using cost as the measure, and just 12% carbon saving
- Despite this, only 28% of respondents actually know the real power consumption of their data center
- The four most widely used techniques for saving energy are 'Turning off obsolete equipment', 'Turning off server equipment not in use for some time', 'Virtual conferencing', 'Educating users to turn off their PCs when not in use'; three of these could be said to be relatively easy to implement; virtual conferencing would be harder from a cultural point of view
- The techniques being most piloted in the banking industry today relate to new strategies for data and storage, which is unsurprising given that the quantity of storage required is still exploding
- Only 19% of respondents have any external audit of their energy efficiency or carbon footprint
- Banking respondents had nearly the oldest data centers in the study at an average of 7.8 years (compared to, say, the energy/utilities industry at 6.1 years); 70% of data centers are five or more years old (when

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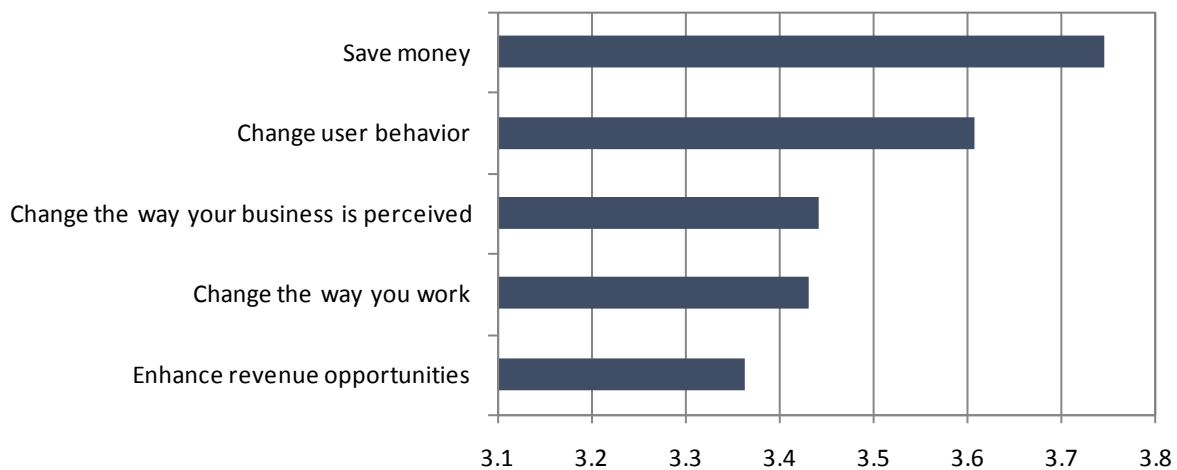
they are unlikely to have been designed with energy efficiency in mind), and just 12% of data centers are under three years old

- There is still tremendous scope for consolidation activity – just 42% have consolidated most or all of what they can on their mainframe, lower for UNIX and Intel estates

## Green strategy

We first need to establish how respondent organizations regard environmental issues ('going green'). More so than the other industries covered in this study, 'Save money' is reported to be the most important issue to banking companies. 'Change user behavior', which includes encouraging employees to switch off equipment at night, recycling paper, etc. is second most important. 'Change the way your business is perceived' means making customers and other stakeholders perceive the business in a more positive light. 'Change the way you work' describes various techniques and processes to lessen the environmental footprint of carrying out your day job – videoconferencing rather than travel, home-working rather than commute miles, and so on.

**Figure 1** How organizations are approaching the opportunity of going 'green' in the banking industry



*Respondents rated the relevance of each issue from 1 to 5 where 5 is the highest. Figure shows mean rating across the group.*

Figure 2 shows how the other three industries in this study responded. This figure looks at those respondents rating the opportunity 'critically important'. This analysis, rather than averaging the weightings in figure 1, shows which the most important issues to respondents are.

Banking and the public sector both rated saving money as the most critical factor, though the public sector were equally interested in changing the way they were perceived. That factor was rather less important for banking respondents. The insurance industry seems to be very keen on changing user behavior.

Many organizations in the energy and utilities sector don't pay for their energy, so it is not too much of a surprise that 'Save money' seems to be the least important of the options we presented to banking respondents. That doesn't mean it isn't important – green projects can save money in ways other than just the cost of energy – just that other issues are somewhat ahead of money as far as driving green strategy is concerned.

The concern within this result for the banking sector is clear – implementing sustainable practices is not, from any perspective, mainly about money. While this study does not suggest that banking respondents are **only** concerned about the financial aspect, it is a concern that otherwise useful and/or required action may be delayed or even not undertaken because those projects do not deliver hard cash outcomes in the short term.

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**Figure 2** How organizations are approaching the opportunity of going 'green' (industry comparison)

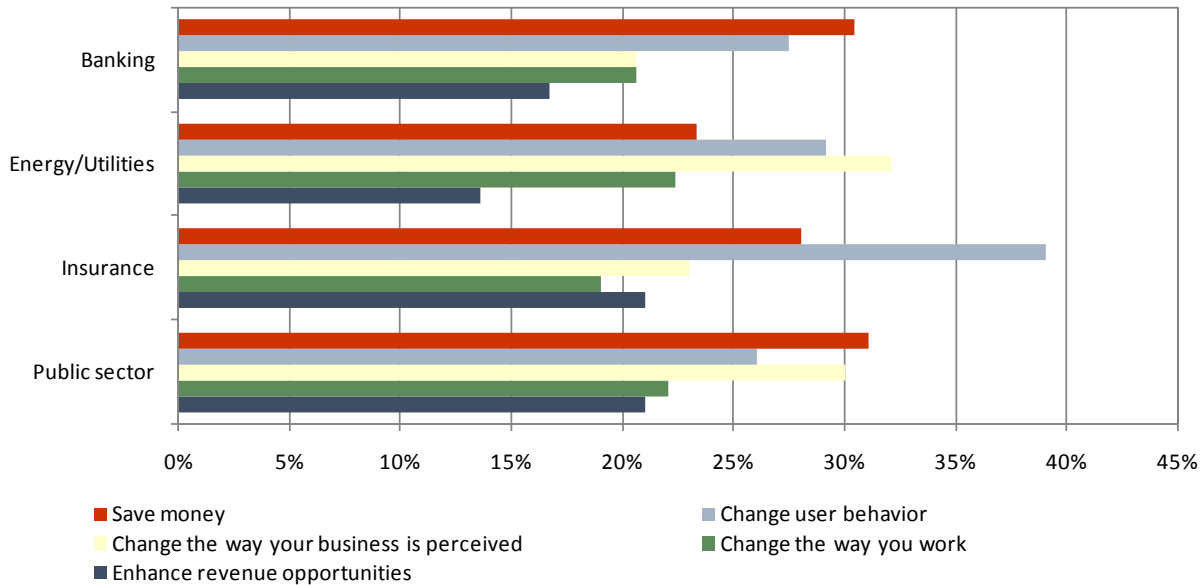
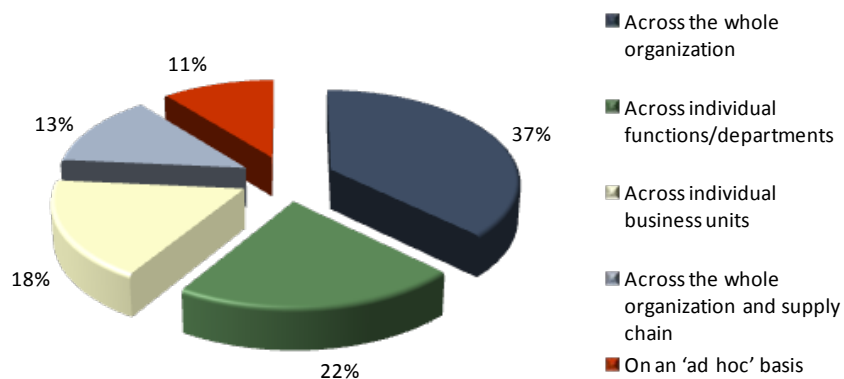


Chart shows respondents rating critical only.

Of equal interest to the primary drivers is whether environmental strategies are being coherently planned and implemented. Figure 3 below illustrates the point nicely. Fully half of banking respondents are applying their green strategy across their whole organization or also including their whole supply chain. Thirty-nine percent are executing green activities piecemeal, either in individual business units or functions. The remaining 11% is only doing things in an ad hoc manner.

**Figure 3** Where green initiatives are being applied



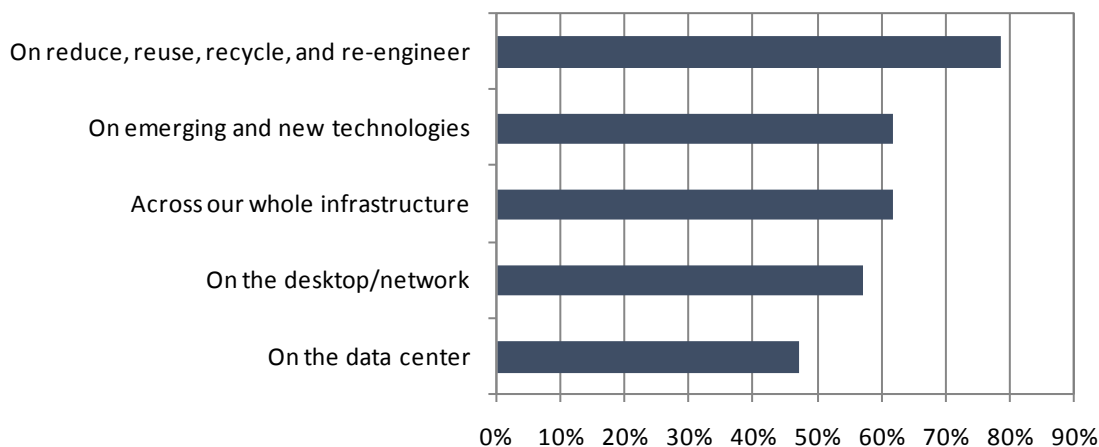
This is an important piece of information, and one which frames all the rest of the results in this paper. If organizations are not applying green strategies across their entire organization, they will be unlikely to gain the

## The Worldwide Drive to 'Green' – Banking - 2008

maximum benefit from the activity, and will find it difficult over time to demonstrate to their stakeholders that they are serious about environmental issues. Half would appear to be coordinating sustainability across their whole organization – good; however, half are not.

So how are green efforts being translated into action within the domain of IT? Figure 4 shows an unanticipated result from banking respondents. More respondents are focused on the desktop and network than on the data center, and a higher proportion still are interested in the whole infrastructure. In fact, the same result is true in each of the industries in this study.

**Figure 4** Where green initiatives are focused within IT



*Chart shows the total of respondents rating the focus area important and very important.*

Is this because much work has already been carried out in the data center, or is it because some of the 'easier' things to do are more focused on individual users and their highly underutilized equipment (including local or departmental servers)? Does it mean that respondents see sustainability as not being focused on just the IT element, but rather takes in the whole organization? This would appear to be true for those 50% in the previous chart who are considering that level. Some answers to that question may be found in the later section 'What's going on?', but it would appear from this result and those later that there has (understandably) been a focus on the 'simple' issues to date.

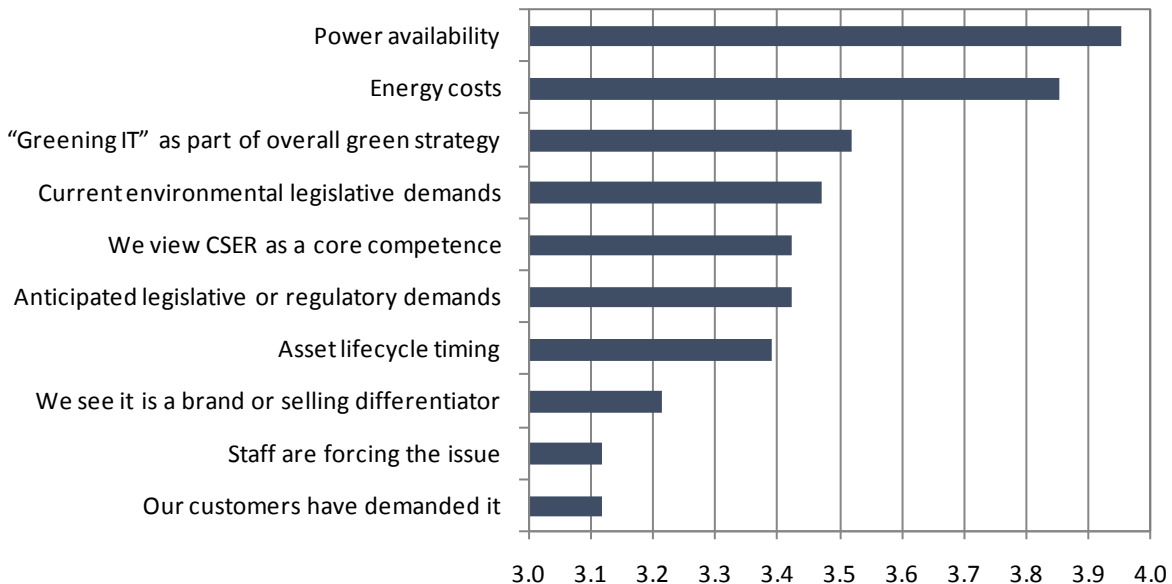
In order to understand what respondent organizations are doing, it is important to understand what is driving them to do it. Figure 5 illustrates the key issues for respondents today, and availability of power – simply being able to get enough power for needs – is the most critical concern, even (slightly) outweighing the cost of the energy, which has taken so much of the headline space in recent times. As an average response, this chart shows there is some considerable gap between these two issues and the remainder.

Interestingly though, and strengthening the 50% result in Figure 3, greening IT as a part of the organization's overall approach to sustainability scores well up the scale at third most important.



## The Worldwide Drive to 'Green' – Banking - 2008

Figure 5 Important green issues in the banking industry today



Respondents rated the relevance of each issue from 1 to 5 where 5 is the highest. Chart shows mean rating across the group.

Understandably for an industry quite used to regulatory demands, current legislation is an important factor.

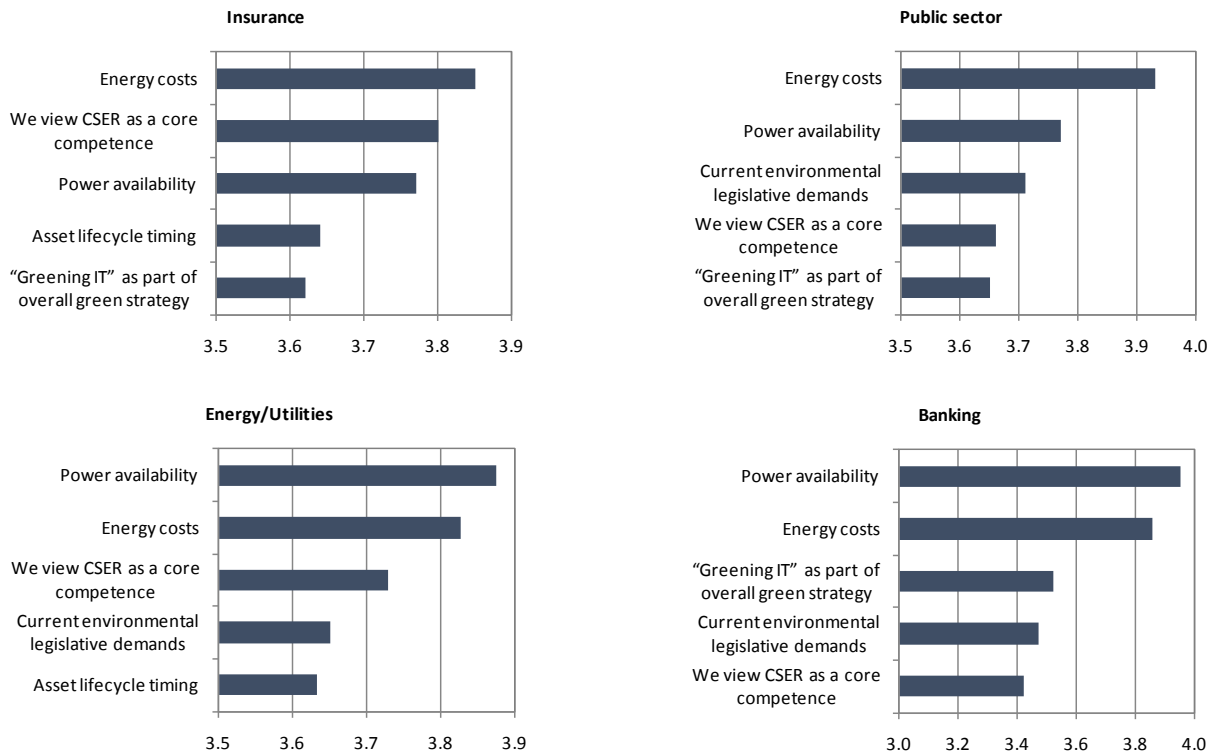
But for all the talk of a strong environmental reputation being important for attracting and/or retaining employees, respondents saw all the other issues and drivers we asked about as more important. Similarly, customer demand seems not to be an important factor to banks today.

Figure 6 below shows the top five drivers for each of the four industries in this study. Comparing results across other industries, there were some interesting differences in the detail, but energy costs, power availability and CSER as a core competence are common across each industry (albeit in different positions). Assuming that many energy companies do not pay directly for energy, it is not surprising that costs are not highest on the agenda, but it is interesting that this is the case in banking. Banks have long required large and powerful data centers, not least through the absolute requirement of reliability (and therefore redundancy, which clearly multiplies energy requirements); this would appear to be having its effect now, as sheer power availability is the number one issue.

It may be that banking respondents, who have generally been able to afford redundancy (and often inefficiencies, which is a separate issue), will have to seek additional ways to guarantee uptime, and focus anew on gaining maximum performance from operational data facilities.

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Figure 6 The importance of green issues today by industry



Charts show average weighting.

How will these factors grow in importance in the coming years? Figure 7 shows the proportion of respondents rating the issues as becoming 'a bit more important' and 'much more important'. These results seem to show that every issue is becoming more important to nearly all the respondents in this study, which highlights the growing impact of environmental concerns across the board.

The issue of power availability is expected to continue growing strongly, but it is energy costs that are of most concern, with just over half the respondents expecting it to be a much more important issue in the coming two years. The remaining issues are rated in almost the same order as they are currently, which indicates that banking respondents see their analysis of green requirements changing little in the coming two years.

Figure 8 shows the split by industry, this time only showing the proportions rating each issue as 'Much more important'. Energy costs is the clear 'winner' in each industry, but power availability and 'Greening IT' as part of the organization's overall green strategy are also important.

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Figure 7 How green issues will grow in importance over the coming two years

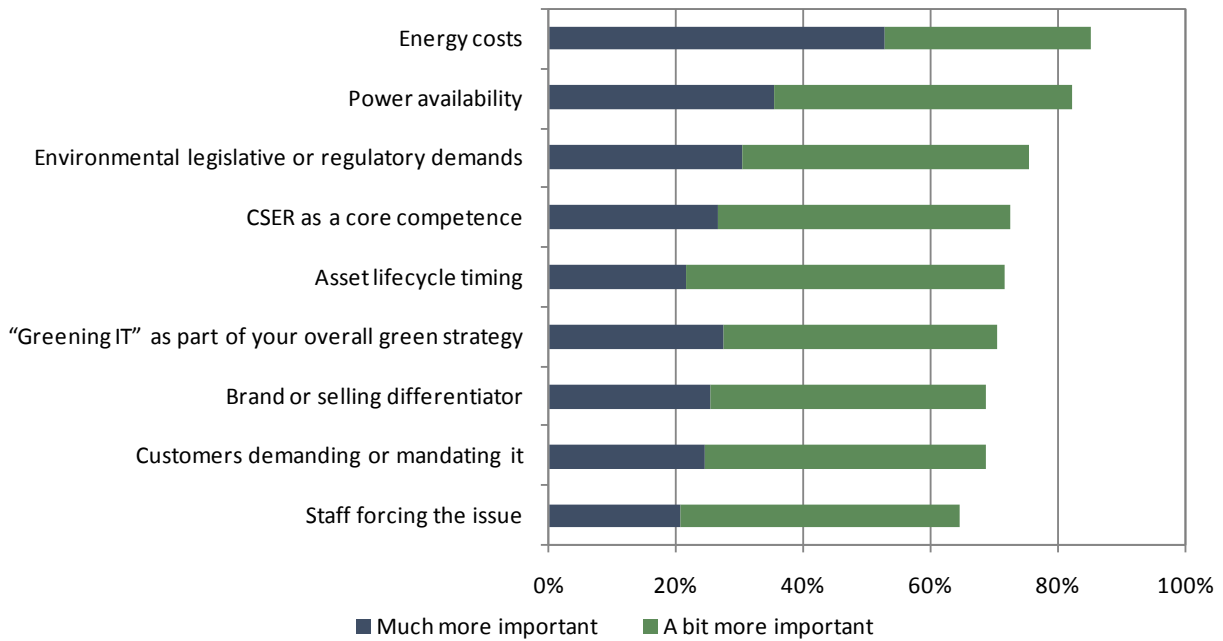


Figure 8 How green issues will grow in importance over the coming two years (industry comparison)

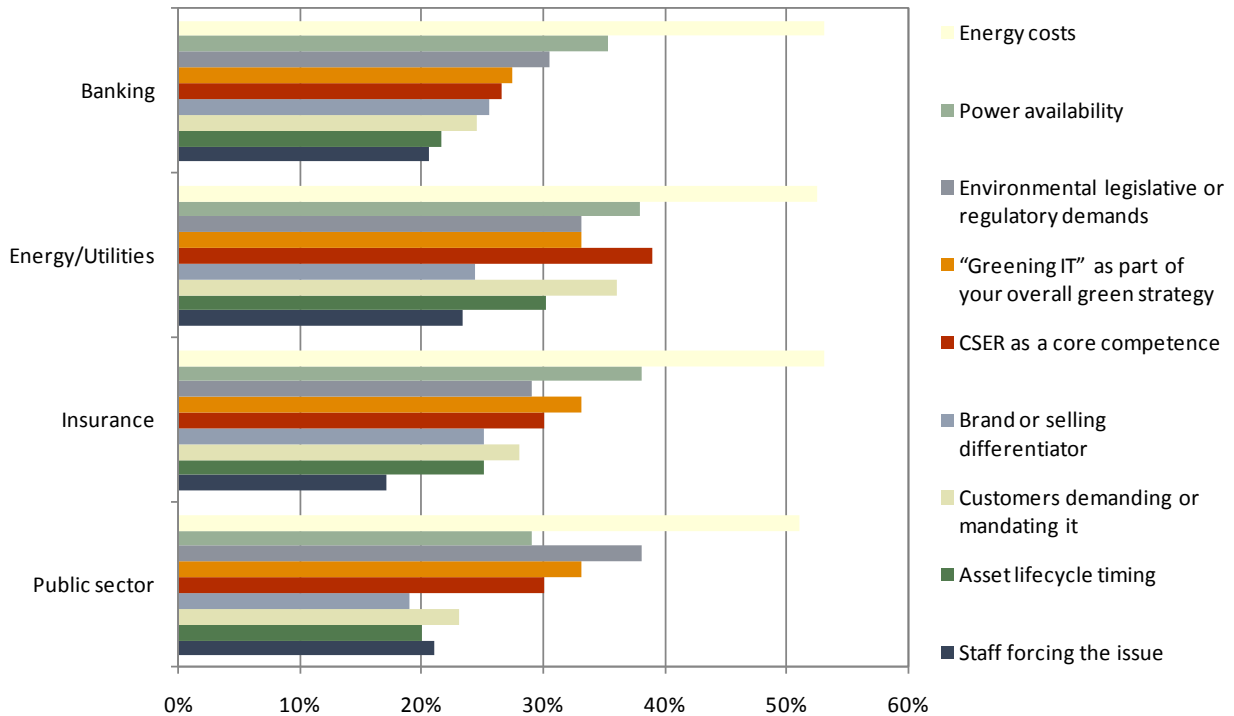


Chart shows respondents rating much more important only.

## The Worldwide Drive to 'Green' – Banking - 2008

What of the challenges that respondents face? Figure 9 shows the weighted response from respondents rating on a '1 to 5' scale of difficulty. The greatest obstacle is budgetary concerns, which may explain the focus on saving money we saw earlier. If anything, given the ongoing (and in some case, deepening, impact of the credit crunch) this primary financial concern is going to grow. Secondary, but also important, barriers would seem to be internal communication and employee commitment, although ensuring support from the board and stockholders came quite high up the list also – almost certainly another part of the budgetary issue.

**Figure 9** Challenges faced in 'going green'



*Respondents rated the relevance of each issue from 1 to 5 where 5 is the highest. Chart shows mean rating across the group.*

Again, we have compared the banking industry with other industries in figure 10, using only the data of those rating each challenge 'critical'. As in figures 5 & 6, this shows which challenges are seen as truly critical and which are generally important enough to rise up the weighted rankings. In the case of banking, there is an even clearer focus on budgets and board support, suggesting that in many of the organizations responding to this study, it is at the center of their efforts.

Across all the industries however, only raising awareness and obtaining commitment from employees are consistently in the top 5 challenges.

## The Worldwide Drive to 'Green' – Banking - 2008

Figure 10 Challenges faced in 'going green' (industry comparison)

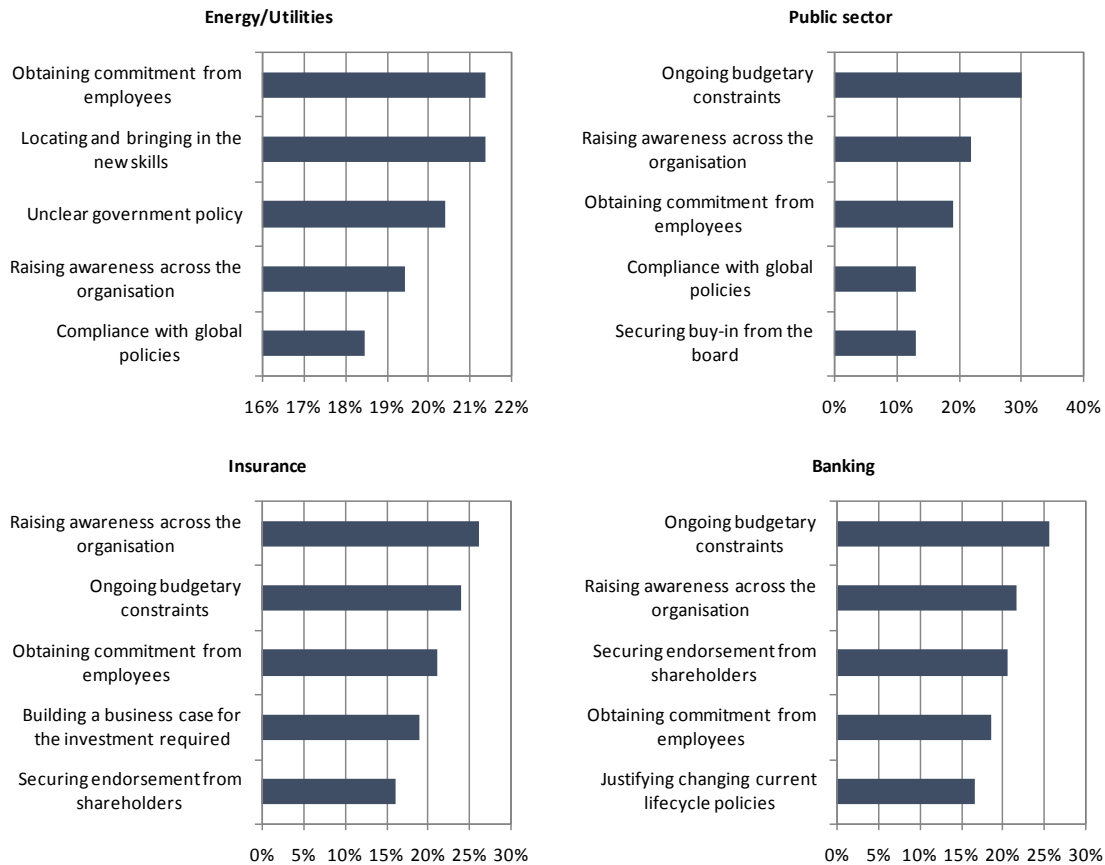
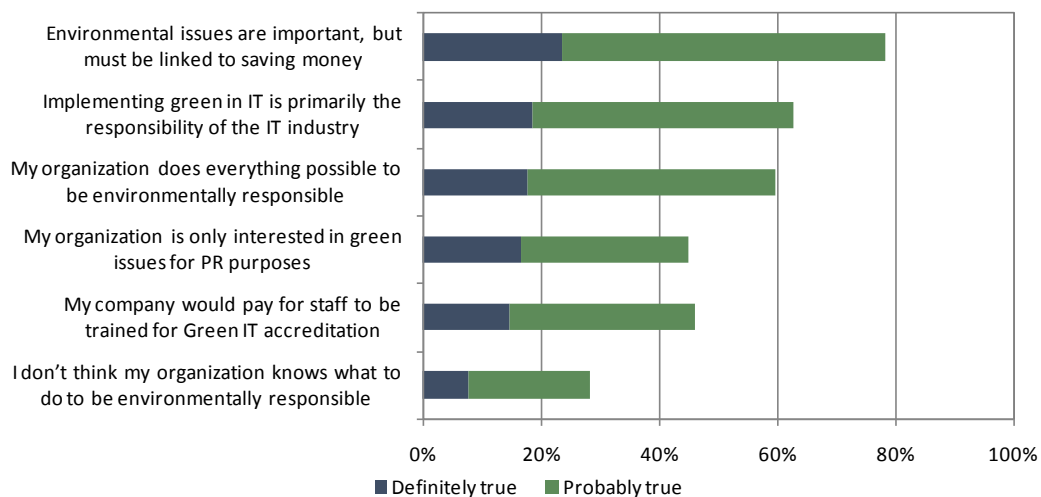


Chart shows respondents rating Critical only and the top five issues for each sector.

Figure 11 Agreement with environmental statements about the organization



## The Worldwide Drive to 'Green' – Banking - 2008

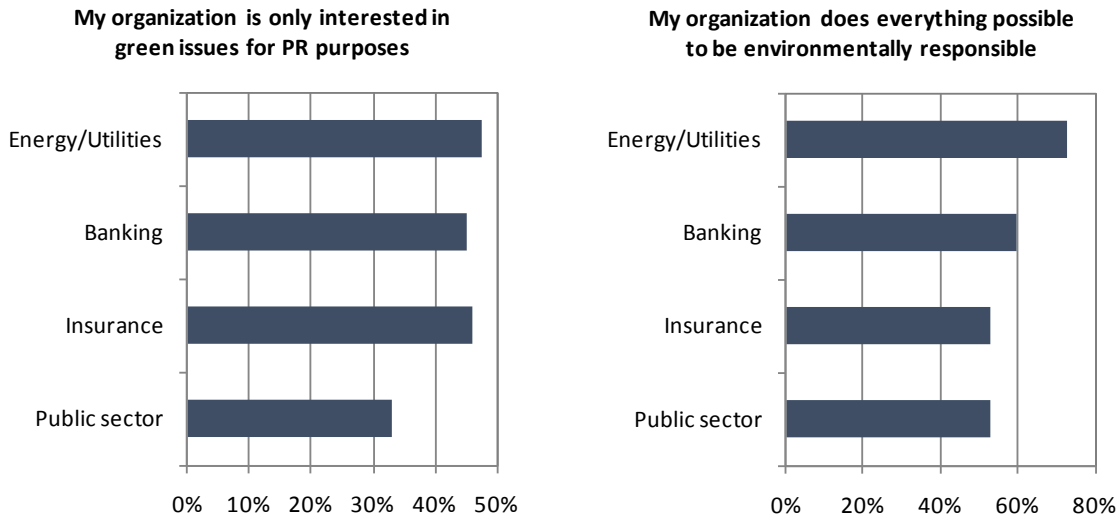
Finally in this section, we wanted to understand how respondents assessed their own organizations' attitudes to environmental efforts. The stand-out result is that 79% note that environmental projects must save money to be valued in their organization. In fact, across each of the four industries, most agreed that environmental projects needed to make money, with more than 70% of respondents agreeing with the statement in each case.

Less positively however, nearly half of banking respondents – 45% - admit that it is at least **probably** true that their companies are only interested in environmental issues for PR purposes. While this is to some extent understandable for commercial organizations, it is not an attitude or culture that will be able to endure in the long term, given the range of pressures that are present and growing today.

In fact, looking at two of the results from this question (figure 12), banking respondents are no worse than the other commercial sectors in being 'only interested in green for PR purposes'.

Banking respondents were also a little more likely to agree that their organization is doing everything possible to be environmentally responsible than at least the insurance and public sectors. The strong energy/utilities finding is likely to be a direct result of both the energy industry's direct impact on the environment through the carbon footprint of generation, and its (earlier) stated need to change its environmental image over time.

Figure 12 Green PR versus overall environmental responsibility (industry comparison)

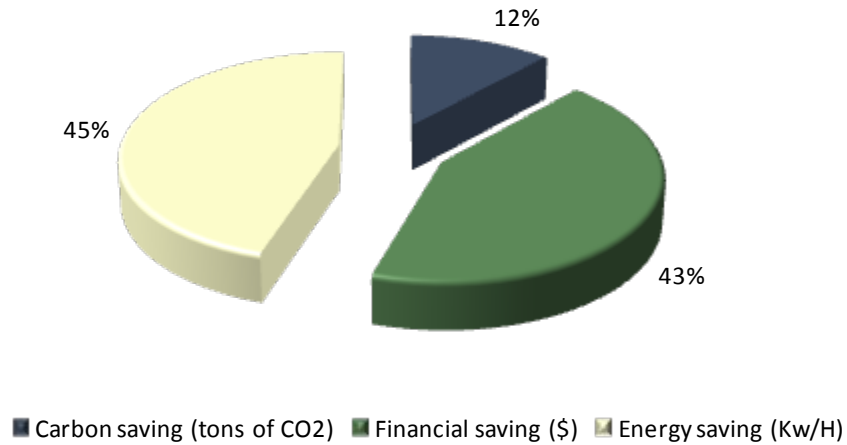


Charts show the total of respondents rating the statement as 'definitely' or 'probably' true.

## Actual measures

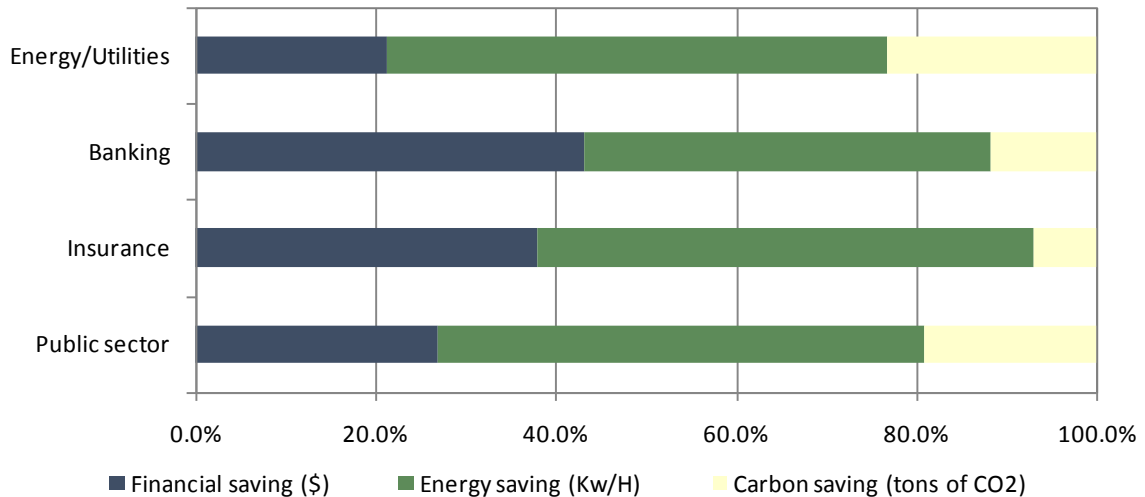
A good indicator of how organizations really feel about environmental issues is how they set the targets for and measure the outcome of environmental projects. Unsurprisingly, given earlier results, the banking industry is focused either on financial goals (requirement for green projects to save money) or on saving energy (power availability being the leading issue).

Figure 13 The measure most used to express green targets



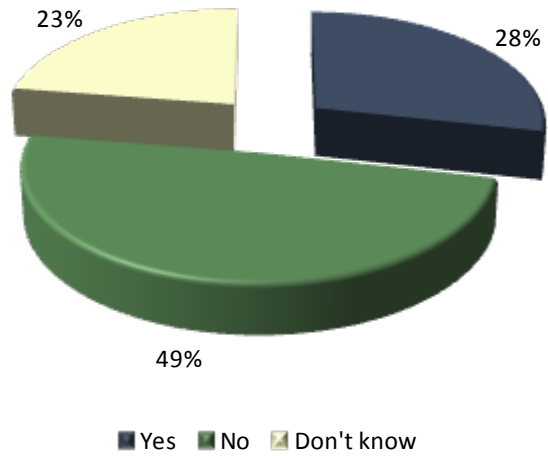
Other industries have quite different results. Energy/Utilities respondents are half as likely to use financial savings as a measure of 'green' targets, and twice as likely to consider carbon savings as the main measure, for example.

Figure 14 The measure most used to express green targets (industry comparison)



Of course, it would be easier to determine cost or energy savings if you had an idea of current energy expenditure. Given that only 28% of responding organizations know accurately the actual power consumption of their data center facilities, it may well prove challenging to clearly illustrate project success. This is an important result – clearly, banking respondents badly need to improve measurement facilities as part of their tactical planning.

Figure 15 Knowledge of data center power consumption within respondent organizations



Amazingly however, banking respondents are still better placed than those from the insurance or public sectors!

Figure 16 Knowledge of data center power consumption by industry

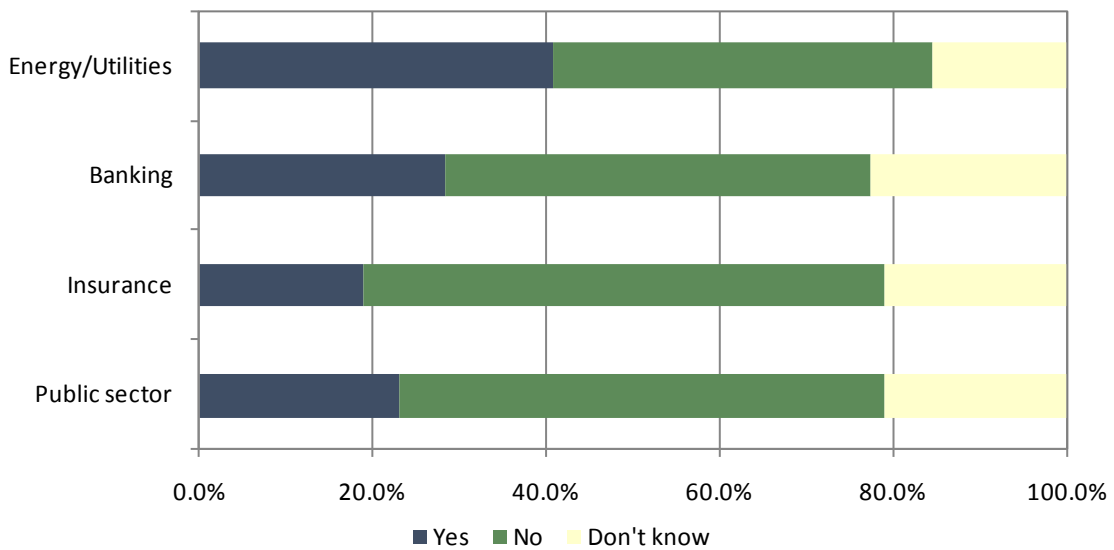


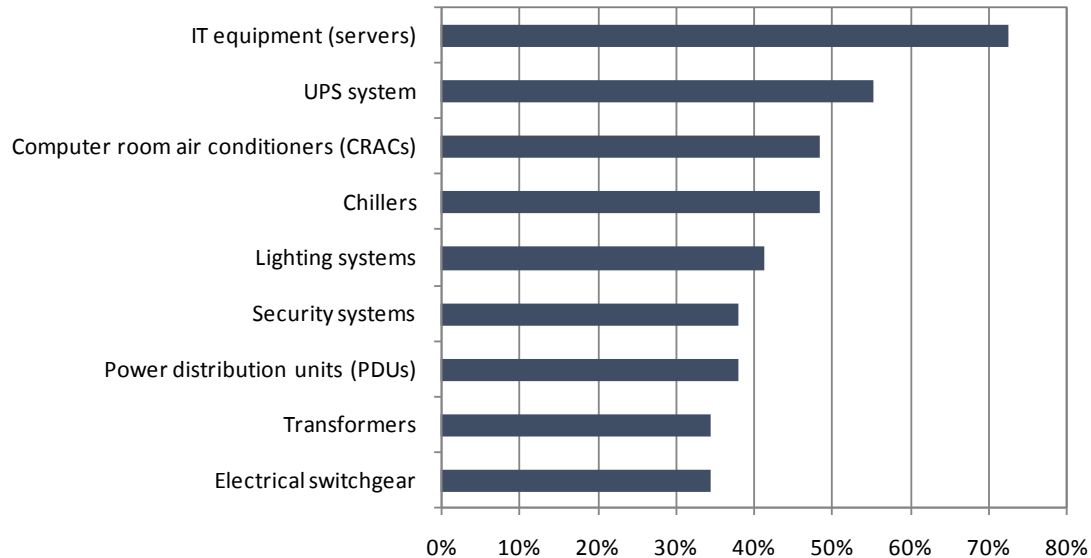
Figure 17 shows for which pieces of data center equipment energy usage is monitored (banking industry only). It seems clear that in addition to being unaware of overall power consumption few companies know how and where their power is being used – the only equipment monitored by a majority of respondents are servers and UPS



## The Worldwide Drive to 'Green' – Banking - 2008

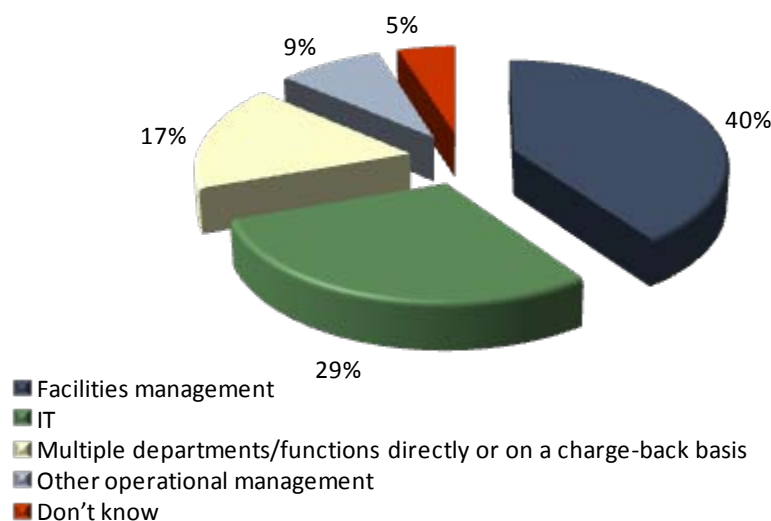
systems. Measurement is a key part of assessing and planning projects, and assessing success, and the ability to measure is something that is evidently lacking.

**Figure 17 Power consumption monitoring of individual data center components**



Perhaps there would be more of a motivation if more IT departments paid their own energy bill. Only 29% do so directly. When this number rises, as it must do when organizations become more aware of their energy expenditure overall, power measurement will surely follow. Of the other industries, only energy/utilities respondents equal this result. The insurance industry only has 21% of IT departments paying their own energy bill, and in the public sector, only 16%.

**Figure 18 Departments responsible for data center energy bills**



## What's going on today?

Figure 19 Green technologies and techniques currently used in the banking industry

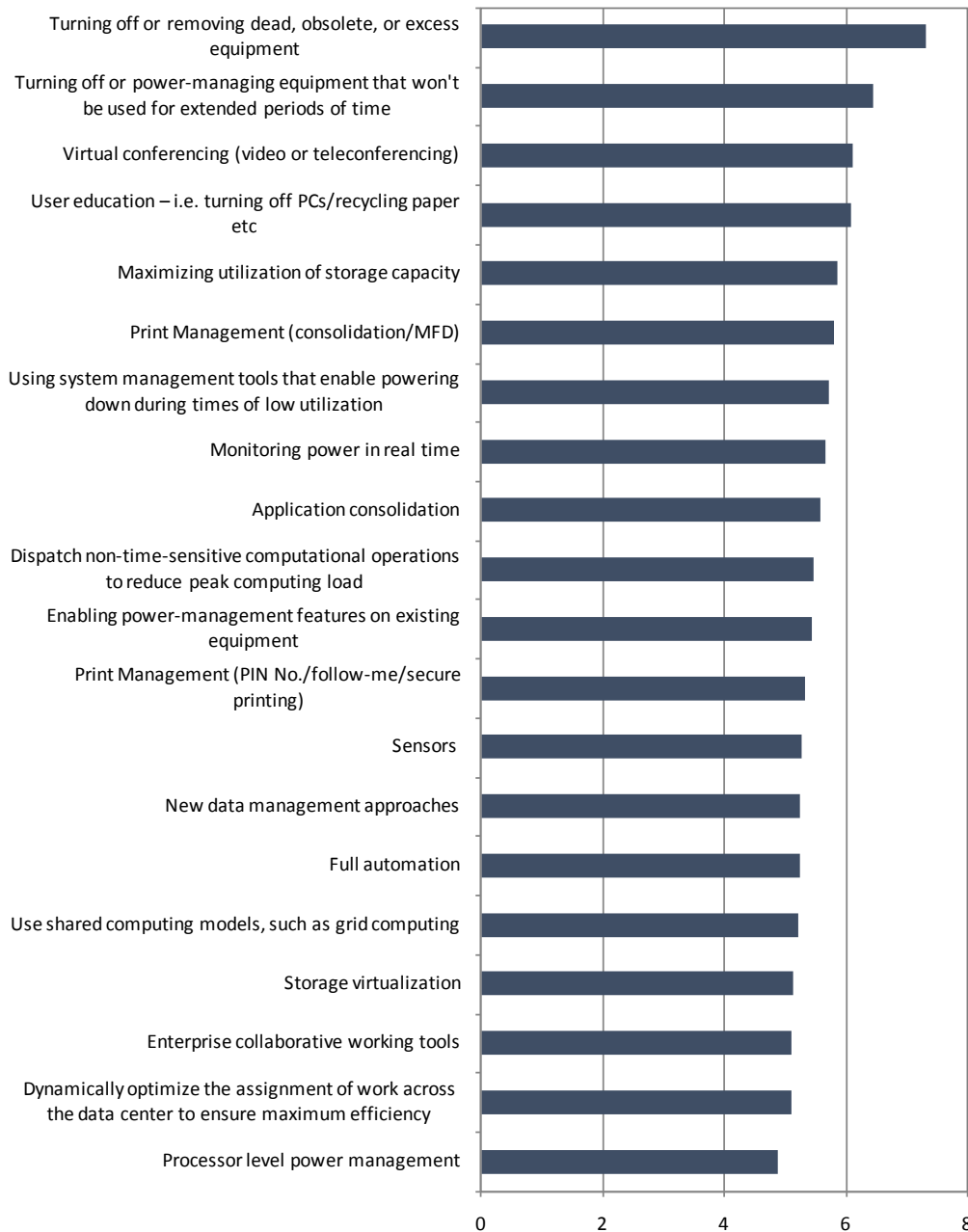
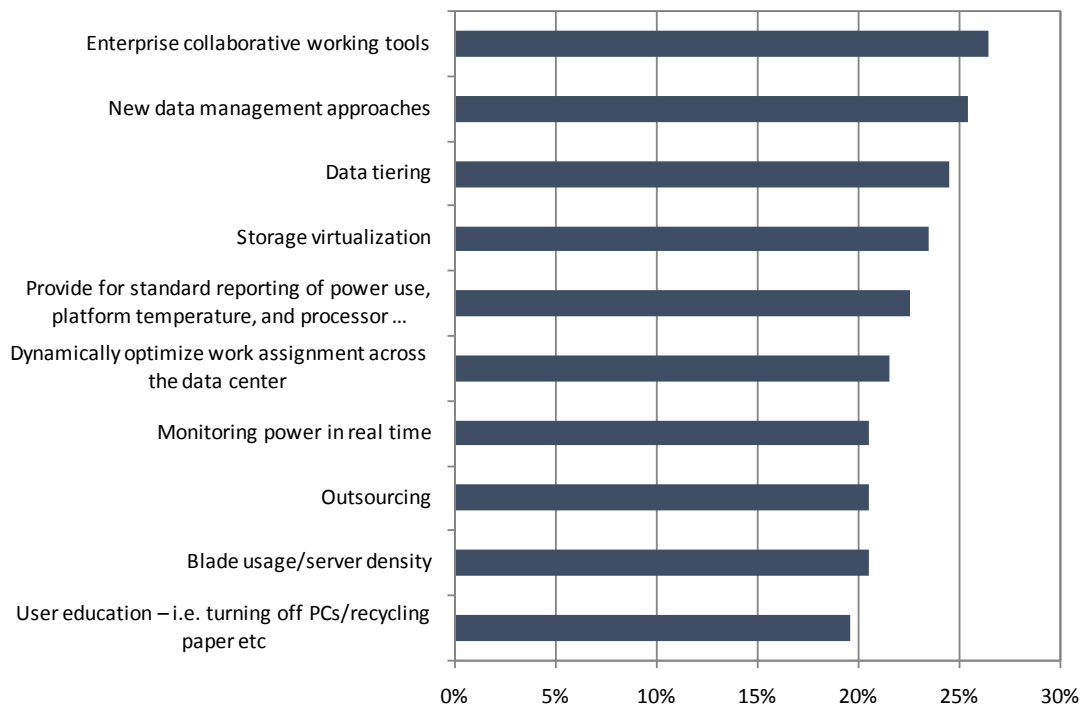


Figure 19 is a composite result; we have synthesized a weighted rating based what proportions of banking respondents said they had done the maximum possible (high weighting), carried out some projects (medium weighting), are piloting, or are actively assessing (lower ratings) each of the 40 green technologies and techniques about which we asked. The chart is therefore a combination of what has already been done modified by the momentum of what is being assessed and planned.

## The Worldwide Drive to 'Green' – Banking - 2008

It is apparent that the relatively 'easy' options have garnered the most attention up to now – simply turning things off! There is a mix of other activities including work with servers, management techniques, storage strategies, minimizing printer estate wastage, and so on. To more clearly understand which technologies and techniques are growing most rapidly in respondents' organizations, we have also highlighted the top 10 being piloted today (figure 20) and the top 10 being assessed today (figure 21).

**Figure 20 Top 10 green technologies or techniques being piloted today in the banking industry**



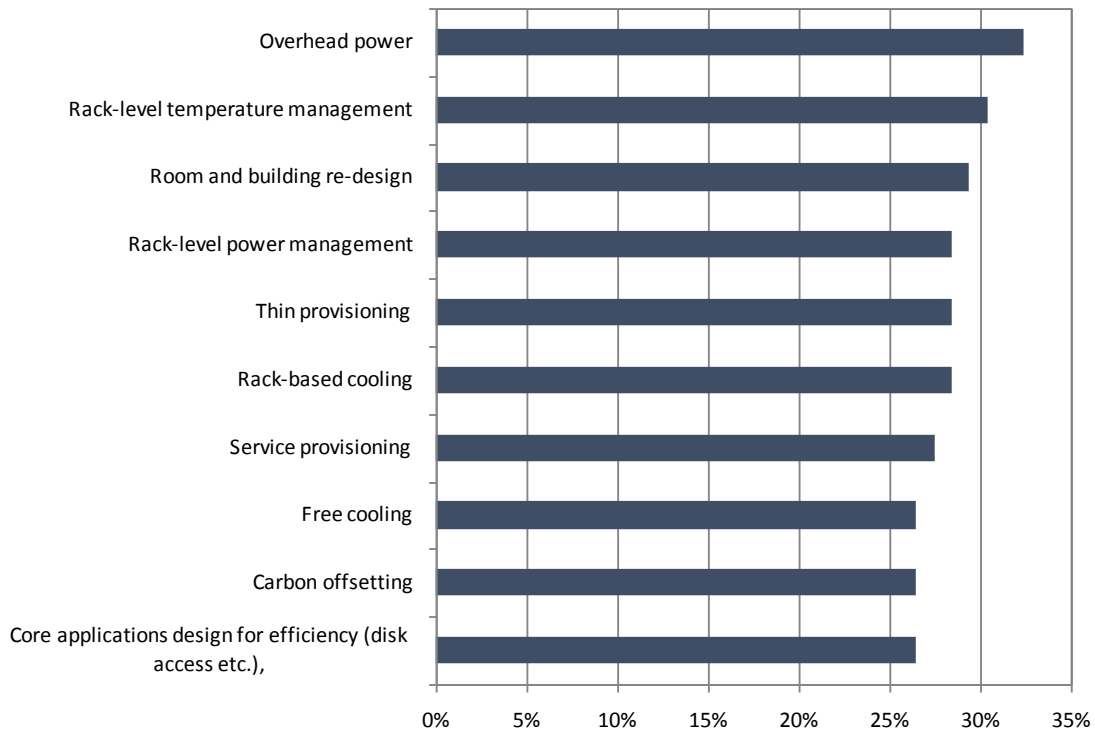
It seems clear that both figures show that much of the simplest actions have already been taken, and organizations have turned their thoughts to harder technologies and more complex projects to achieve their goals. Most notable in the 'piloting' list are the results relating to data and storage – the 2<sup>nd</sup>, 3<sup>rd</sup>, and 4<sup>th</sup> most piloted techniques today.

The growing importance of racks is evident in the 'assessing' phase in figure 21, from both temperature and power management points of view. Energy delivery and data center re-design are also important in a list dominated by power and cooling management.

Virtually no technology or technique appears in more than one of the three lists, which would seem to indicate that the industry is approaching the problem in a fairly consistent manner, moving each approach through the discover-assess-pilot-implement phases in a similar order.

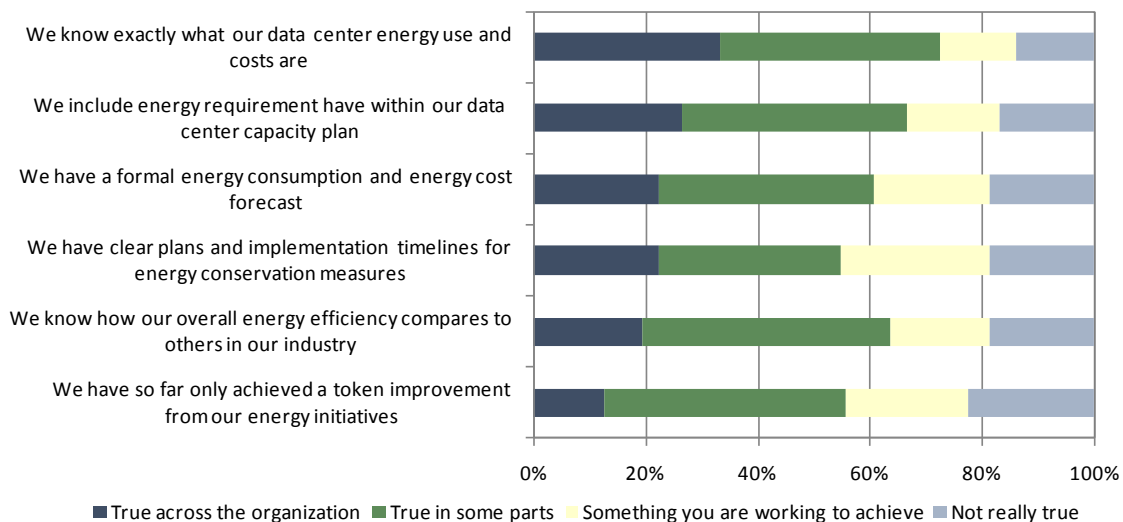
## The Worldwide Drive to 'Green' – Banking - 2008

Figure 21 Top 10 green technologies or techniques being assessed today in the banking industry



So how do respondents themselves rate their organizations' performance in the field of energy conservation and data center operational improvements?

Figure 22 Self-assessment of overall progress in energy conservation measures



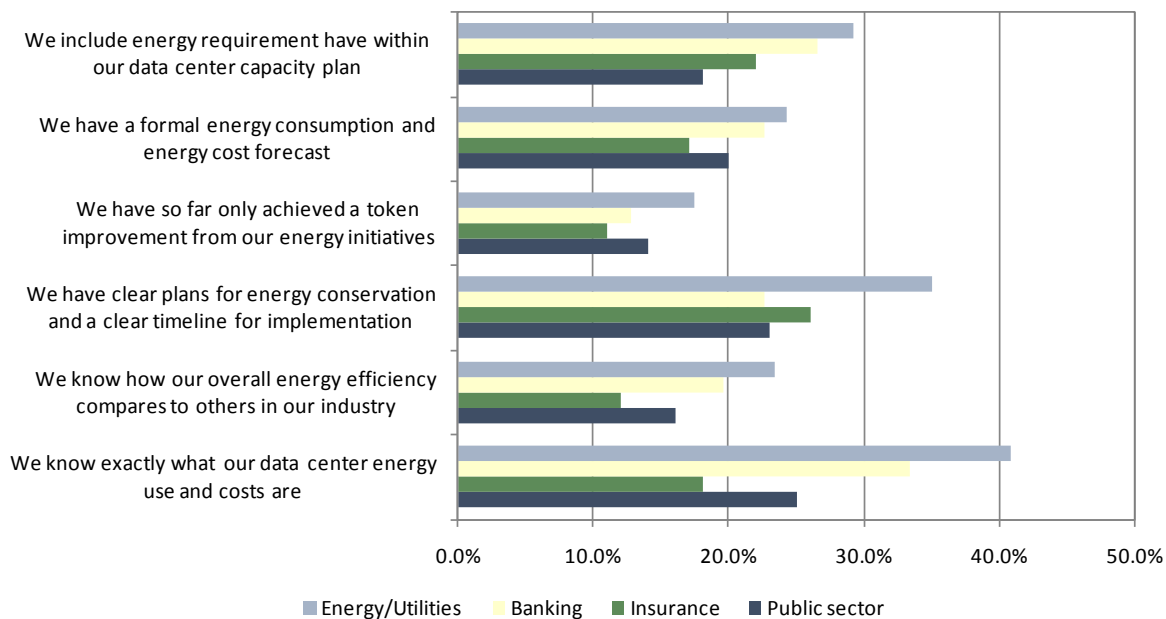
## The Worldwide Drive to 'Green' – Banking - 2008

Figure 22 shows some relatively positive results, not least the confirmation of the result about how many banking companies know what their energy consumption is. Of most concern are the 56% of respondents that believe that they have only achieved a token improvement (in some cases or across the organization) from energy initiatives so far. Of course, this does mean that the majority of organizations have a great deal of opportunity if they have the internal will and support to grasp it.

Only 19% of respondents (not shown in the figure) have obtained any external assessment or audit of their organizational carbon footprint (although a further 37% are 'planning to') so it is not clear whether the majority of respondents have any clear idea of how they are really doing. Perhaps it is this proportion that knows how their energy efficiency compares with others in their industry in figure 22.

Figure 23 shows how the self-assessment results vary across the industries in this study. It would appear that the energy/utilities industry is outperforming the other three across the board in progress assessment.

**Figure 23 Self-assessment of overall progress in energy conservation measures (industry comparison)**



*Chart shows respondents rating 'true across the organization' only.*

Most significantly, because they are much more likely to know how much energy they are using, they are equally much more likely to have clear plans for conservation, and timelines for execution. This surely must be an area in which all other respondents should be focusing more resources.

## Data center realities

It is important to understand how environmental priorities are driving actual data center strategies. While the figures in figure 24 seem paradoxical in comparison with the green drivers in figure 5, we believe that they are not. Figure 5 shows what is driving *environmental* strategy; figure 24 shows what is driving *overall* data center strategy. Systems availability is the most critical issue – as it has been since data centers were first implemented, particularly in mission-critical applications such as banking. The next three are all about energy consumption and costs, showing just how important energy has become as a financial issue. Cooling is of top importance to more than a quarter, compared with 18% citing shortage of space, reflecting the growth of high-density server equipment.

Figure 24 Important drivers of data center strategy today

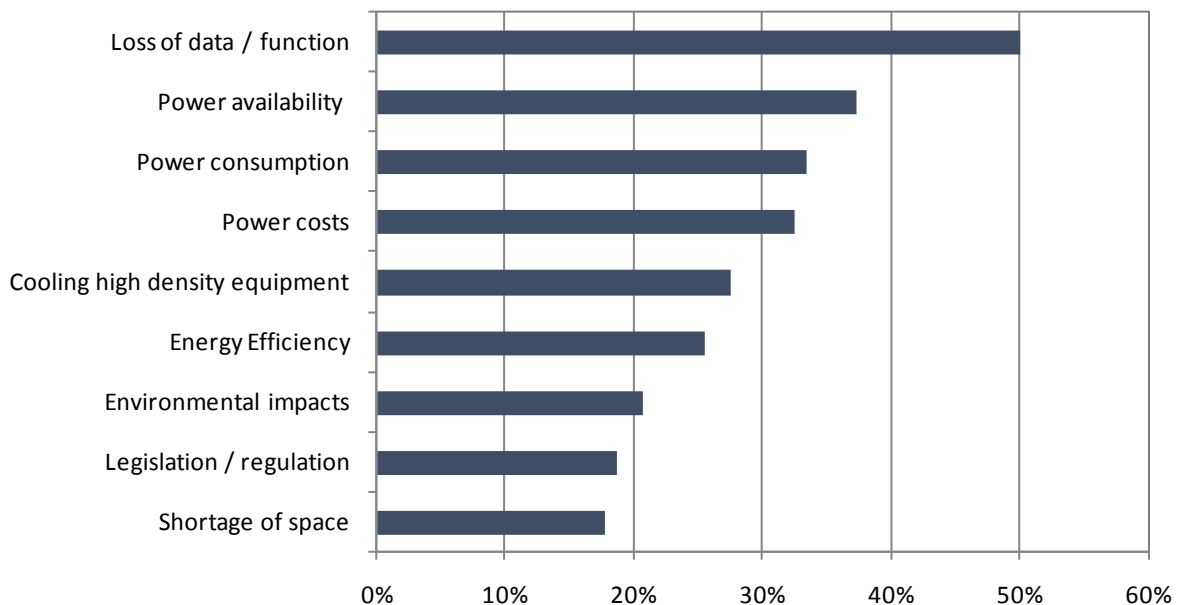


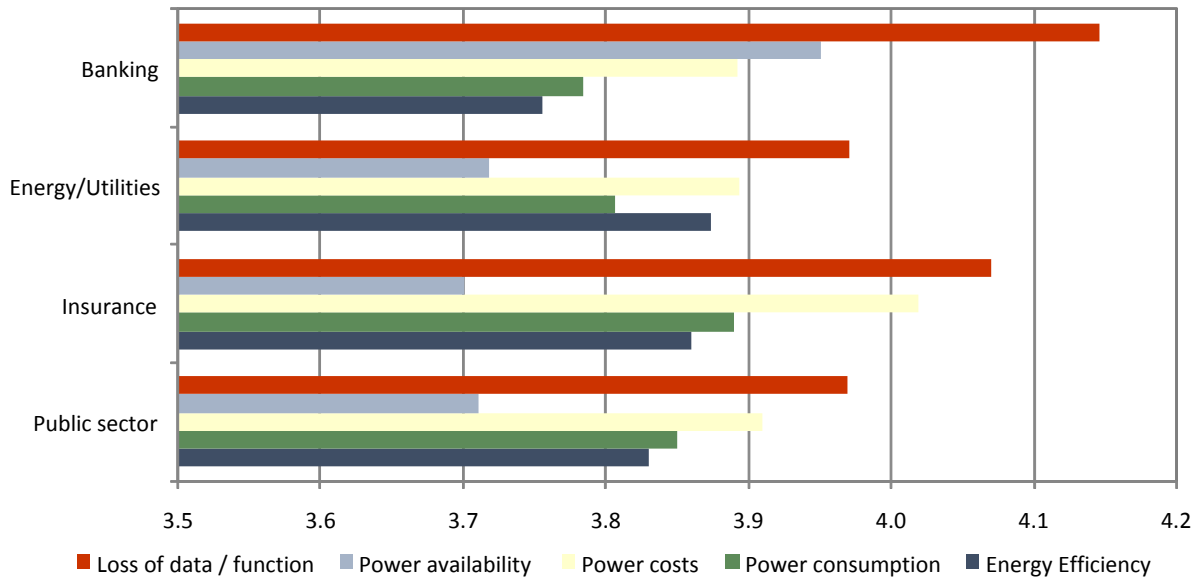
Chart shows respondents rating issues of most importance. Closed option list.

Environmental impact was still rated as critical by a fifth of respondents; five years ago, environmental impact was not on anyone's radar, so it is interesting how far the issue has come in a short space of time.

Figure 25 shows how these overall data center drivers compare across the industries in the study. For this chart, we have considered only the five most important drivers overall and looked at the average importance rating. Clearly, systems availability is the most important issue in all, and in the banking industry dwarfs almost every other issue. Power availability is a far more important an issue in banking than other industries, knocking energy efficiency into last place. This makes sense given that banking respondents, who historically have enjoyed more generous IT budgets than any other industry, are much more closely concerned with availability than cost control, but it might be seen as a little short-sighted. Perhaps if energy efficiency received more direct attention, the power availability problem might, over time, be mitigated.

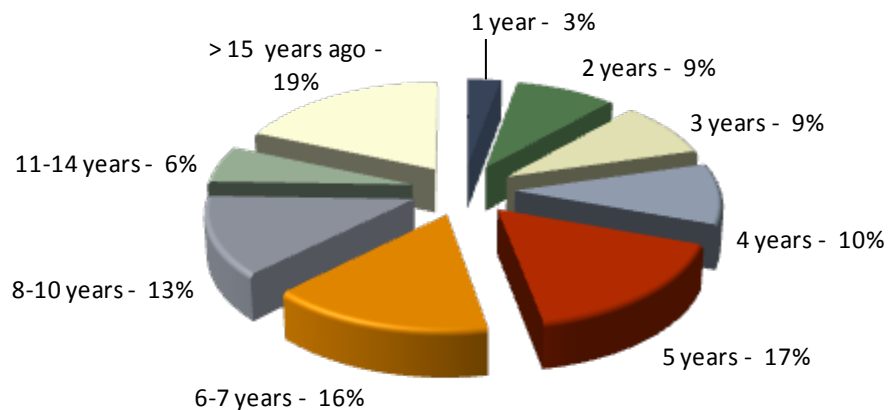
## The Worldwide Drive to 'Green' – Banking - 2008

Figure 25 Important drivers of data center strategy today (industry comparison)



It was also important to establish the age of respondents' data center facilities, to frame some of the responses in this study, particularly those relating to which projects are being considered or executed.

Figure 26 Age of data centers in the banking industry

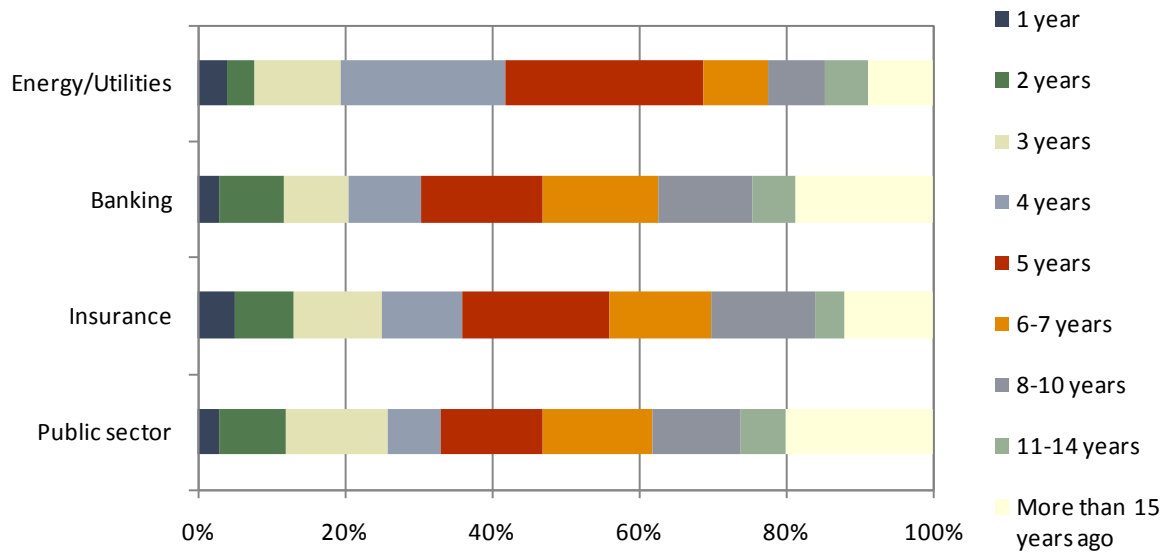


Fully 70% of data centers in the banking industry are five or more years old, which is an age at which we can be fairly certain that energy and environmental issues were not viewed as particularly important. Consequently, their design and layout will not necessarily be ideal now that those issues are important.

## The Worldwide Drive to 'Green' – Banking - 2008

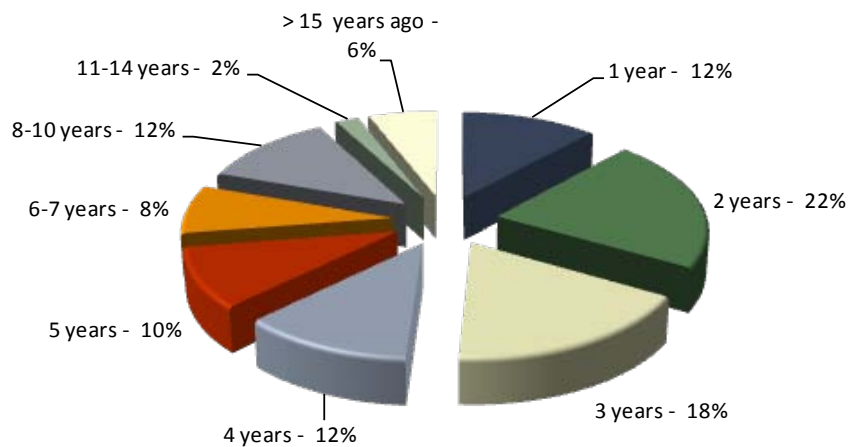
Only 12% are less than three years old, and the average age is 7.8 years. It is not surprising therefore, that so many organizations are looking at cooling and power management technologies today. Despite the historic levels of investment, banking data centers seem to be quite old compared with the other three industries in the study – the average age of data centers in the other industries are 6.1 years (energy/utilities), 6.9 years (insurance), and 8.1 years (public sector). Figure 27 shows the age breakdown by industry.

Figure 27 Age of data centers (industry comparison)



According to figure 28 below, the average age of power and cooling infrastructures is only 4.8 years, which would suggest that many data centers have had in-life upgrades over the past few years. The proportion of cooling infrastructures five or more years old drops to just 37% - but is still (just) the oldest in the study.

Figure 28 Age of data center power and cooling infrastructure





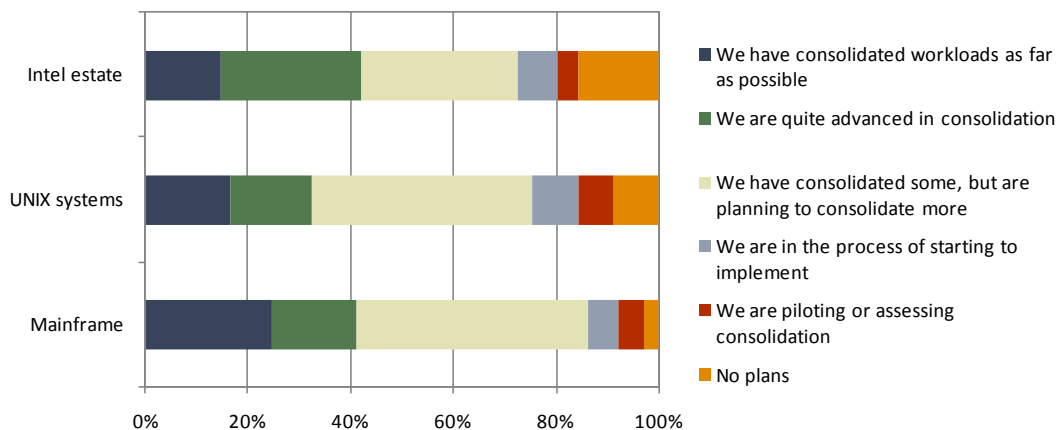
Unlike the overall data center age results, the power and cooling infrastructure ages are more uniform, with average ages by industry ranging from 4.2 years (insurance) to 4.8 years (banking).

## Consolidation and virtualization

Perhaps the key technologies/techniques that can be used by organizations to save both money and energy are consolidation (fewer servers and storage), and virtualization – both cut real energy usage per application or transaction through higher hardware utilization. Although both have been talked about extensively for a number of years, there is clearly a long way to go to reach maximum efficiency goals.

Consolidation projects are mostly driven by poor utilization and high management overheads of multiple, heterogeneous and distributed server estates. As such, it is the lowest utilization servers that should be the prime targets, but as figure 29 shows, Intel-based server estates are (just) the least consolidated compared with mainframe facilities. This must be because the required technologies have, until recently, lagged some way behind market need.

Figure 29 Extent of consolidation projects today in the banking industry



The same is true for efforts in virtualization. Consolidating workloads and system images seamlessly onto larger more energy-efficient and manageable servers requires the abstraction that virtualization technologies provide. Mainframes have had advanced consolidation and virtualization capabilities for many years (decades), but true virtualization has only been available for Intel servers in recent years, and on the Windows platform very recently.

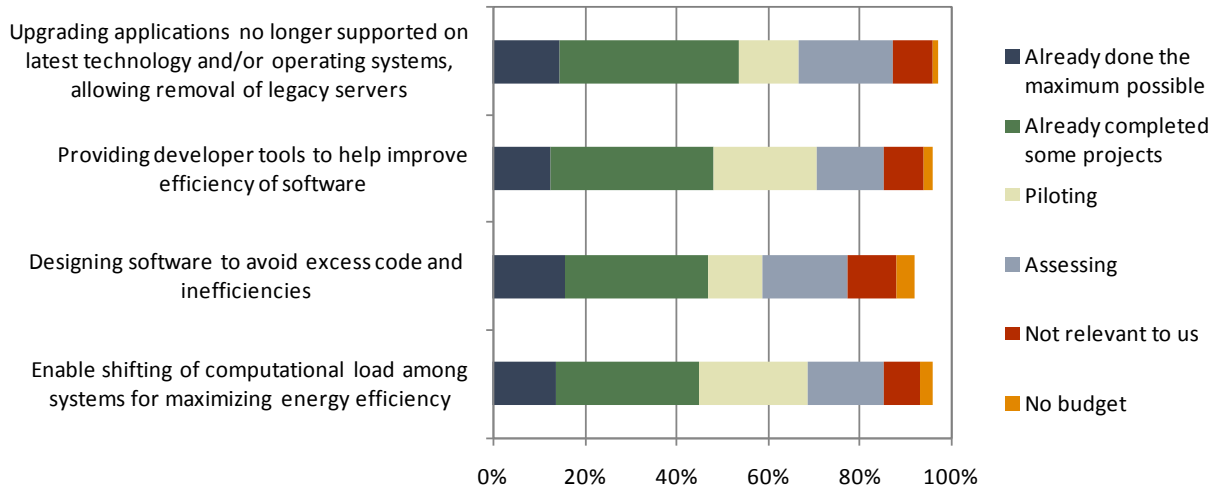
Nevertheless, the will to considerably expand both the consolidation and virtualization of all three server estates that we asked respondents about is clearly there.

Finally, adjacent to the consolidation and virtualization stories is the effect of software, which has generally not been a focus in considering green issues despite having a major role to play in gaining operational efficiencies. Figure 30 shows attitudes to a number of project possibilities in the software arena. In the same way that simpler approaches have taken precedence in the hardware arena, upgrading older applications to support the renewal of

**The Worldwide Drive to 'Green' – Banking - 2008**

the server estate has been executed to some extent by more than half of the banking respondents. But of greater interest here is the extent to which software design has been considered in the search for greater efficiencies. 'Bloatware' has long been recognized as a problem in its use of hardware resources; by definition therefore, it could have a significant detrimental effect on energy utilization.

**Figure 30 Extent of virtualization projects today in the banking industry**



## Conclusion

This study shows that environmental issues have climbed rapidly up the corporate agenda in recent years to be amongst the most important considerations for both the business and IT. Despite this fact, efficiency is still dwarfed as an issue for banking respondents by the requirements to maintain mission-critical reliability and availability.

The twin drivers of cost control and sheer availability of the power required by ever more dense facilities are accelerating however, and banking organizations would appear to be responding at an increasing rate.

There is not yet a belief that customers' views on energy efficiency are an important issue, possibly because there is not yet a perception that banking services and their effect on the environment are linked – customers are more likely to be impressed with reducing paper usage through electronic statements than on energy usage in IT. But that situation is changing – consumer perceptions are evolving rapidly and, combined with legislative demands (which are clearly recognized today), will add pressure to banks already struggling with a credit crisis and general economic slowdown.

Perhaps because of these observations, the majority of companies are implementing green projects in a piecemeal or ad hoc fashion, don't know what their actual IT-related usage of power is, and have no external audit of energy efficiency or carbon footprint. More than three-quarters also require green projects to present significant cost savings to gain approval.

## The Worldwide Drive to 'Green' – Banking - 2008

On the positive side however, this leaves a great deal of room for improvement, and it is evident from the results pertaining to what companies are already doing, piloting, or assessing, that a large variety of green-related technologies and techniques are coming down the pipeline in the next few years. In addition, the majority of organizations have still not done all they can with tried and tested approaches to optimization, such as workload consolidation and virtualization, or even the simplest things, like turning off obsolete or unused equipment.

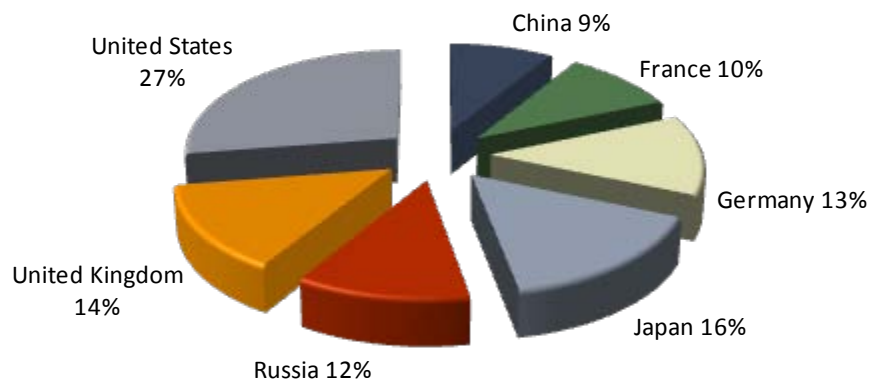
Therefore, despite the challenging economic conditions which much of the world is now experiencing, we would expect strong progress to be made in IT-related energy efficiency over the next 2-3 years in the banking sector, particularly in projects that exhibit a clear and rapid financial return.

## Demographics

102 respondents from the banking industry responded to this study, from a total 405 respondents overall.

Organizations responding to this study were all of enterprise scale, which in this case mean that they employ more than 2,000 people. Respondents were drawn from a range of seven countries around the world, split as illustrated in the chart below.

Figure 31 Countries represented in this study



Respondents were all senior managers, drawn mostly from the IT/CIO side of companies, although around a fifth were senior business managers with line responsibility for IT.

## About The Bathwick Group

*Bathwick researches how businesses actually buy and apply IT to their business, how they innovate using technology, and how IT is supporting changes in market and organizational models. Our research framework is split into four key domains, each focusing on a feature that client organizations aspire to be: Dynamic, Smart, Open, and Green.*

*Combining primary research with trend analysis in enterprise, mid-market and small business sectors, Bathwick provides research models, benchmarking tools, market analysis, and strategic consultancy services to a variety of IT, communications, government and media clients, and helps enterprise organizations plan for technology-driven change.*

*The Bathwick Group also includes:*

- **The ThinkAgain Partnership LLP**, a global collaborative research network, which brings together academics, writers, business and political leaders to generate new insights into business productivity and performance, geo-political and environmental issues
- **Bathwick Press LLP**, which publishes books designed to help business leaders gain insight into how IT can help to change and drive value in their organizations.