

# KNOWLEDGE IS POWER

From IoT integration to robotics, intelligent assistants and virtual reality, CAFM might appear to be moving into the realms of science fiction. But as leading vendors explain, technology is driving unprecedented CAFM functionality which will benefit users and suppliers alike – so long as it is properly managed

**COMPTON DARLINGTON**  
**BUSINESS DEVELOPMENT DIRECTOR, FSI**

The all-pervasive reach of digital applications across all areas of business is a compelling driver for CAFM providers to up their game and stake a claim at the top table for what they have to offer clients. FM now has a scope and breadth way beyond anything most industry pundits would have contemplated 15 or 20 years ago.

FM can mean a range of different functions to different clients and, with the rise of the app, CAFM technology is available in the hands of all, not just FM specialists. CAFM providers are working to offer flexible and agile digital capabilities that can sit within an organisation's IT strategy in both controlling and subsidiary support roles, depending on the way the client views its world today and may choose to shift its strategy to respond to its operating environment tomorrow.

Interoperability is now a critical 'must have' to provide real utility for clients and service providers driving their businesses via CAFM. The ability to talk to legacy systems and other digital management systems which operate in parallel should be basic, not nice-to-have, and best-of-breed should not mean elitist or proprietary.

We have passed the point where technology for technology's sake has any credibility with our markets. Users want to see a clear, real-world business benefit when they commit to a product. The impact of consumer technology, whereby ultimately every function must be able to deliver information or offer a service at some credible level via any smartphone, has removed barriers to expectation. Users will pick and mix from whichever sources most clearly satisfy their strategic goals. We added an app dimension to our capabilities last year and increased the proportion

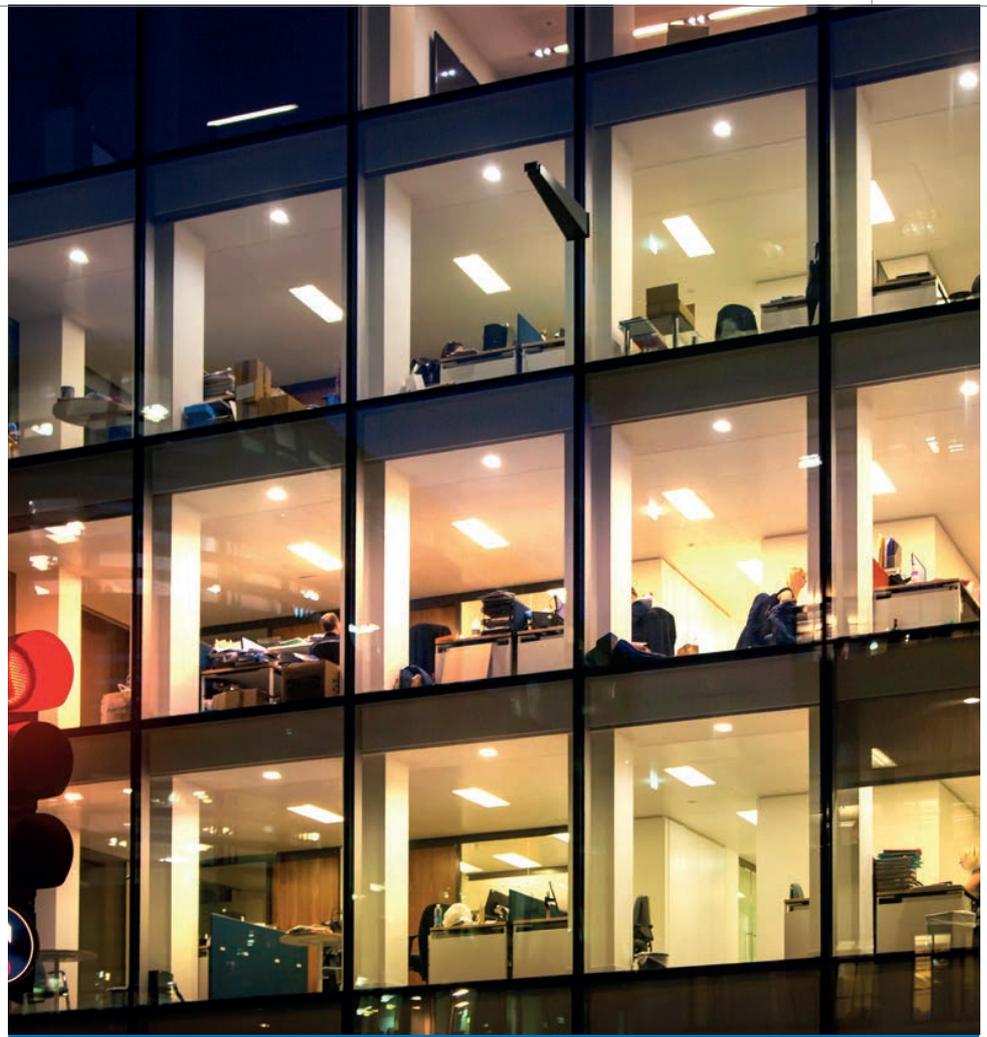
of customer business analysts in relation to the number of digital technologists.

Big data looms increasingly large on the corporate management agenda as the internet of things (IoT) begins to realise its potential, and more assets and sensors (even microchips in employees!) can provide status data to management and control systems. Context-aware services, whereby a system responds based on both who you are and where you are in a building, are also a realisable ambition. However, we are aware of a proliferation of pilots but not yet much progression to roll-outs.

There still seems to be a lack of clarity around the purpose of gathering all this extra data, and there are issues of identity security management and data protection in relation to employee and other user databases, particularly in view of the new General Data Protection Regulation requirements from May this year. To enhance corporate wellbeing it's necessary to set specific money-saving or efficiency-increasing ambitions that relate realistically to the improvement of the ecosystem in which employees operate.

FM service providers are having to become increasingly agile in getting to grips with the proliferation of new systems and digital tools. Very few have the resources to develop their own enabling technologies, so they must look to CAFM providers with the broadest skillsets. The market increasingly finds itself on a pathway where innovation is being delivered at the same rate as consumer digital technology. We are entering a space where the competitor who steals your customers could be an unknown who will offer a new digital concept in six months' time. Service providers need to embrace technologies that can envelop their clients in a comfort zone of adaptive support.





### PAUL DJURIC CEO, URGENT TECHNOLOGY

FM is constantly evolving and embracing new technologies, such as the internet of things (IoT), artificial intelligence (AI), and predictive maintenance. It's a fast-moving industry, but to truly appreciate and benefit from the business advantages that advances in facilities and maintenance technology can bring, facilities professionals need to be early adopters, driving change through their organisations.

The debate around insourcing or outsourcing FM continues, but we are witnessing a shift towards companies selecting their own CAFM system, and, more importantly, holding their own data. Even before the Carillion story broke, there seemed to be a new appreciation that such data is too valuable to be handed over to a third party. Some organisations prefer to outsource their maintenance contract for good reasons – it doesn't mean they have to automatically forfeit their right to own and hold their data.

A customer of ours did just that – they brought the management of FM data in-house, dismissed the service provider, then re-hired them as a major contractor, saving a lot of money and giving them full control of their FM and the flexibility to change

contractor as needed.

We've also noticed more customers wanting to make real use of their data, with greater reporting capabilities being the biggest development expected over the next 12 months. Most systems can provide standard reports, which are often no more than a dump of data from the CAFM system into Excel. But looking to the future, these reports will become increasingly sophisticated – they'll take data from multiple collection points (such as weather feeds, sales totals, sensors on assets, IoT devices) and present it in a way that can be used to make a real difference to a company's bottom line. The reporting of tomorrow will deliver actual business insight that will help organisations improve their competitiveness.

Data and CAFM go hand in hand. Huge amounts of data are generated daily and it's important to make use of it. Those reports of yesteryear that drown out sense with their rows and rows of data will move aside to make room for smarter, more visual reporting – reporting that will make organisations more efficient, productive and profitable. Being able to conduct meaningful analysis between the same assets used in different parts of a

business – whether it be regions, countries, brands – is a powerful proposition.

Taking this a step further, data stored on a shared cloud-based platform can be aggregated and used to develop insights that demonstrate how a business performs compared to its industry peers; such data can also be crunched to compare asset performance across different organisations.

Technological capability has improved to such an extent that organisations can now collect a meticulous and extensive array of data, offering unprecedented insight into how and when assets are used. Long positioned as the hallmark of enterprise in the 'information age', data now informs a large portion of how the workplace is organised and managed. As CAFM products evolve, FMs will be in an even better position to use that data to formulate meaningful strategic business decisions.

### KEVAN DAVEY DIRECTOR, CONCERTO - PART OF BELLROCK GROUP

In many respects CAFM is becoming part of an enterprise-wide solution of connected software solutions that include accounting, EPR solutions and HR platforms.

Increasingly, systems include a range of

modules from helpdesk to cost control, asset tracking and property management. The addition of functionality for mobile (including BYO) devices streamlines resource deployment as well as enhancing the safety of the workforce and establishing more efficient means of tracking and closing jobs.

The underlying driver for more complete systems is the recognition that there is benefit in having all of the data relating to property and facilities in one place. The most powerful component that CAFM systems can deliver is the reporting dashboard.

Facilities and estate managers realise how valuable information can be in driving efficiencies, whether to cut costs or improve user experience. The data not only allows greater visibility of aspects such as compliance, but also makes supplier performance more transparent, enabling more nimble adjustments to be made to service provision as organisational requirements change.

There is an ever-present demand to broaden a CAFM system's functionality, tracking and reporting capabilities. The internet of things opens up more integration possibilities, for example with smart building monitoring systems. Pressure on workspace is driving adoption of alternative workplace strategies such as hot desking.

The net result is that the organisation knows more about the performance of its facilities services than ever before, which might change how facilities services are delivered. In a world of ubiquitous data, analysis and insightful management reports, it seems likely the long-running debate about FM service delivery models will swing in favour of the management model.

Suppliers are selected for their competence, geographic location and ability to meet the client's needs. The transparency provided by CAFM systems means their performance can be measured against cost and performance criteria, and suppliers replaced without disrupting the underlying model. Self-deliverers may find themselves asked to measure and report their own performance – but is this a mechanism for improving standards, or a case of turkeys forced to vote for Christmas?

**GARY WATKINS**  
**CEO, SWG (SERVICE WORKS GROUP)**

No man is an island and it seems the same is true of CAFM. Early results of our 2018 FM software survey in partnership with FMJ have revealed that a number of FM clients would leave their CAFM vendor if it didn't provide the capability to integrate with other organisational systems. While CAFM is continuously expanding



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in functionality, integration is the factor driving much of the innovation and opportunity in the sector.

The use of robotics and AI still seems futuristic, but organisations are making use of this technology via integration with CAFM. At a large Australian hospital, for example,

meals, linen, bulk stores, pharmacy and waste management are transported automatically by an automated guided vehicle (AGV) system, fed from information held within a CAFM system.

Mobile technology has been a huge growth area following the launch of easy-to-use, custom-built apps. Ruggedised devices allow mobile engineers to operate in harsh conditions and stay connected with both the helpdesk and their schedule of jobs for the day. The next step is integration with a conversational interface, such as Amazon's Alexa, allowing hands-free data input. This will allow engineers with gloved, dirty or otherwise full hands to access information on their FM database without needing to pause to pick up their mobile devices.

It's expected that use of speech recognition will escalate in the workplace this year, following reportedly record sales of Amazon devices. With Apple set to release its own home assistant later this year, strong sales are likely to continue. Building users will be able to use a familiar interface to report faults, book rooms or even report lost property instantly, just using their voice.

Finally, space management is another area full of innovative potential. As with Ikea's popular Place app, virtual reality (VR) tools allow the user to see an accurately shaped and sized model of an object 'placed' wherever they point the device's camera. Integrated with space management

software, building managers can visualise layouts more quickly and easily, helping to maximise space utilisation and create more appealing, productive spaces. Engineers using VR glasses integrated with BIM and CAFM software would have the ability to see behind plasterboard to identify wiring, areas of known asbestos, or building materials used.

**CLAIRE VISSER**  
**CAFM DIRECTOR, CAFM EXPLORER**

We are seeing customers experience further gains from their FM systems by bringing in more data from third-party systems and taking advantage of powerful reporting functionality within one central tool. Data can be used to trigger activities, allowing organisations to automate more of the FM process than ever before – taking care of compliance checklists and planned maintenance, for example, at the click of a button.

In an industry where time is money, being able to amalgamate several legacy systems – where previously space, property and FM may have sat independently – into one integral solution also provides an opportunity to do more with less and see the wider FM picture under one roof. Only by having this level of visibility will organisations have the intelligence they need to make more informed, strategic decisions.

Given digital innovations are advancing every day, smart building technology is already pushing the next generation of user experience – incorporating live chat into the FM helpdesk and expanding to voice recognition technology. Augmented reality for maintenance is also likely to bring opportunities for the FM industry – for example, being able to scan a wall and have full visibility of each component. Ultimately, knowledge is power – and FM technology is the key to unlocking it.