

## A vision for the future role of Cost engineers and quantity Surveyors

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## A broader view for existing professionals to align with the new global, customer focused clients and ensure the profession remains relevant in a changing world

There is a saying that “what got us here will not get us there”. For professionals working in the rapidly evolving built environment sector, this is increasingly true.

Cost engineers (CEs) and quantity surveyors (Qs), in particular, are facing a critical moment in their professional lives as the traditional infrastructure project delivery practices are being disrupted by new modern, digitally enabled and data driven processes.

Like every other profession in the built environment, CEs and Qs face a major challenge to redefine their role and stay relevant in this new world; a world in which clients are more demanding, more informed, and expect greater value from every professional service that they buy.

However, they also have a major opportunity to strike out and reposition themselves in this new and evolving world; driving new levels of efficiency, creating competitive advantages and providing the value added services demanded by modern clients.

To achieve this goal, CEs and Qs will have to change their professional approach and the services they provide. While some of these changes might be considered evolutionary, others, as will require more fundamental rethinking.

## Merger of minds – birth of the CEQS profession\_

The traditional concept of employing a QS to measure quantities and a CE to provide advice on costs is becoming a relic of the past.

Today's clients expect more flexibility and broader professional advice. They will turn to the CE for advice on issues as wide as procurement management and engineering or look to Qs to estimate costs of preliminary designs without drawings but using their experiences, data sheets and rules of thumbs.

Given this blurring of responsibility, a merger of the two professions as CEQS is an obvious win. This new group of professionals would provide a range of services covering cost advice, procurement management and strategic advice, design reviews, facilitation based on risk and value, and perform value engineering exercises.

The role would be transformed from passive individual to become an effective, central contributor to the client's entire project team. With an inherent knowledge of design efficiency, combined with a deep understanding of cost drivers and structure, the CEQS will be in a unique position

to provide clients with holistic advice on project cost, time and quality.

## The need for a knowledge upgrade and networking\_

Of course, this transformation would require the CEQS to substantially increase their understanding of construction technology and basic engineering principles. In addition, they would require good knowledge of contract law to help the CEQS offer procurement advice to promote the modern partnering arrangements sought by clients as they seek to boost productivity.

And clearly enhancing skills across the professions will require an environment that actively supports learning. As such, a professional knowledge network would be critical to support and drive the development of required skills across businesses and ensure that the learning and efficiencies gained are shared across the emerging profession

Similarly, a programme of mentoring throughout the new CEQS profession would be vital to ensure that younger professionals can learn quickly from the experience and knowledge of colleagues around them.

## Facilitation and the art of collaboration\_

More often than not, the CEs and Qs find themselves at the heart of the design discussion, using and demanding information from all design disciplines and ensuring that information is correct and verified. They play a critical role to bring parties together – facilitating communication and promoting collaboration – a role that is increasingly in demand by modern clients and that should be embraced by the CEQS profession.

The roles and responsibilities of a facilitator are wide and may include conducting cross-disciplinary workshops, to help understand the emerging issues and find collaborative solutions. Again, as with other new skills required by CEQs, special training programmes for such facilitation would be required.

## The use of computational BIM\_

Technology will be central to the future role of the CEQS profession. Specifically, computational BIM, the next frontier of BIM tools, will be critical. Such advanced BIM modelling requires designers to better understand the BIM model and get the best out of the data.

For the CEQS profession this presents great opportunities due to their inherent closeness to, and familiarity with, the project data. But it also presents great challenges, not least from the need for the new profession to accelerate its own understanding of the emerging discipline.

Some form of computational BIM will have to be taught to CEQS professionals so as to expose them to the outer limits of the use of BIM. That will mean understanding how to interrogate models, how find optimum solutions for value engineering purposes or how to identify cost drivers.

It will be a big challenge as the speed of technological advancement is so rapid. What once took design team months to do, can now be carried out in minutes. The CEQS profession must evolve to keep up.

## Operating in the global environment; operating in the virtual environment\_

Meanwhile, the world is getting smaller as actual and virtual borders are being torn down. Firms are increasingly moving the main bulk of their measurement activities to more cost-effective parts of the world, leaving traditional graduate roles “outsourced”.

However, this challenge opens up great opportunities for the young CEQS who will now be tasked with acquiring the new skills required to manage these outsourced processes. They will, in effect, move further up the project value chain, adding greater client value and commanding greater reward.

## Conclusion\_

The scale and pace of change sweeping across the construction industry means that leaders must act now to embrace the new world. While the core skills of cost management and cost engineering will always remain embedded in the QS and CE professions, there is a need to broaden the vision of existing professionals and new graduates to align with the new world of intense competition, client-centricity and technology advancements.

### **Connect with us**

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